



PONTE SULLO STRETTO DI MESSINA



PROGETTO DEFINITIVO

EUROLINK S.C.p.A.

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<p><i>Unità Funzionale</i></p> <p><i>Tipo di sistema</i></p> <p><i>Raggruppamento di opere/attività</i></p> <p><i>Opera - tratto d'opera - parte d'opera</i></p> <p><i>Titolo del documento</i></p>	<p>COLLEGAMENTI SICILIA</p> <p>INFRASTRUTTURE STRADALI – OPERE CIVILI</p> <p>ELEMENTI DI CARATTERE GENERALE</p> <p>SOTTOPASSO – SOTTOVIA RFI</p> <p>RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD</p>	<p>SS0558_F0</p>
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CODICE	C	G	0	7	0	0	P	C	L	D	S	S	C	0	0	S	P	S	4	0	0	0	0	2	F0
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		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011

INDICE

INDICE	3
PREMESSA.....	7
1 RIFERIMENTI NORMATIVI	7
2 RIFERIMENTI BIBLIOGRAFICI	8
3 CARATTERISTICHE MATERIALI.....	10
3.1 Calcestruzzi (Secondo UNI 11104 - 2004).....	10
3.1.1 Acciaio per armature (Secondo NTC 2008 – D.M. 14/01/2008)	12
4 DESCRIZIONE DELLA STRUTTURA.....	13
4.1 CARATTERISTICHE GEOMETRICHE E UBICAZIONE DELLA STRUTTURA.....	13
4.2 CARATTERIZZAZIONE GEOTECNICA DEL LUOGO.....	14
4.2.1 Descrizione delle litologie.....	14
4.2.2 Indagini previste.....	14
4.2.3 Caratterizzazione geotecnica.....	15
4.3 CARATTERIZZAZIONE DELLA SISMICITA' DEL LUOGO	19
4.4 CRITERI GENERALI DI PROGETTAZIONE	21
Verifiche di resistenza.....	21
4.4.1.1 Verifiche di resistenza agli stati limite ultimi.....	21
Verifiche agli stati limite di esercizio	21
4.4.1.2 Definizione degli stati limite di fessurazione	21
4.4.1.3 Condizioni ambientali	22
4.4.1.4 Sensibilità delle armature alla corrosione	22
4.4.1.5 Scelta degli stati limite di fessurazione	22
4.4.1.6 Verifiche allo stato limite di fessurazione.....	23
4.4.1.7 Verifiche delle tensioni in esercizio.....	23
Azioni sismiche	24
4.4.1.8 Vita nominale	25
4.4.1.9 Classe d'uso	25
4.4.1.10 Periodo di riferimento per l'azione sismica	25
4.4.1.11 Parametri di progetto.....	25
4.4.1.12 Classificazione sismica del terreno	27
4.4.1.13 Spettro di risposta elastico in accelerazione.....	28

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011

4.4.1.14	Spettro di risposta elastico in accelerazione delle componenti orizzontali	28
4.4.1.15	Spettro di risposta elastico in accelerazione delle componenti verticali	30
4.4.1.16	Spettro di progetto	31
5	FASI COSTRUTTIVE.....	32
6	ELABORATI DI RIFERIMENTO.....	33
7	ANALISI STRUTTURA	34
7.1	Modellazione della struttura.....	34
7.2	Analisi dei carichi.....	39
7.2.1	Peso proprio strutturale	39
7.2.2	Permanenti non strutturali.....	39
7.2.3	Accidentali da traffico.....	41
7.2.4	Carico da Frenamento	45
7.2.5	Determinazione della forza sismica orizzontale del terreno.....	46
7.3	Schemi di carico delle spinte del terreno.	48
	Statiche.....	48
	Sismiche.....	49
8	VERIFICHE DI RESISTENZA.....	51
8.1	COMBINAZIONE DELLE SOLLECITAZIONI.....	51
8.2	MASSIME SOLLECITAZIONI.....	53
	Verifiche asta 19 (soletta superiore)	132
	Verifiche aste 7 e 8 (cordoli)	135
	Verifiche aste 6 e 9 (pali laterali)	137
9	BERLINESI PALI	139
9.1	BERLINESI UN ORDINE.....	139
9.1.1	VERIFICHE	173
9.2	BERLINESI DUE ORDINI.....	175
9.2.1	VERIFICHE	231
9.3	BERLINESI DUE ORDINI – RISVOLTO PERPENDICOLARE ALLO SCATOLARE	233
9.3.1	VERIFICHE	307
10	FONDAZIONI.....	309
10.1	ANALISI DEL SISTEMA FONDAZIONALE.....	309
10.2	COMBINAZIONE DELLE SOLLECITAZIONI.....	309
10.3	MASSIME AZIONI SUI PALI	311

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO					
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<table border="1" style="width: 100%; border-collapse: collapse;"> <thead> <tr> <th style="text-align: left;"><i>Rev</i></th> <th style="text-align: left;"><i>Data</i></th> </tr> </thead> <tbody> <tr> <td style="text-align: center;">F0</td> <td style="text-align: center;">20/06/2011</td> </tr> </tbody> </table>	<i>Rev</i>	<i>Data</i>	F0	20/06/2011
<i>Rev</i>	<i>Data</i>						
F0	20/06/2011						

10.4	VERIFICHE GEOTECNICHE	313
10.4.1	MODELLO DI CALCOLO.....	313
10.4.1.1	DESCRIZIONE DEL MODELLO DI CALCOLO	313
	Normative di riferimento	313
	Norme Tecniche per le costruzioni in zone sismiche.....	313
	Istruzioni per l'applicazione delle Norme Tecniche di cui al D.M. 9 Gennaio 1996	314
	Determinazione della capacità portante	314
	$Q_T = Q_P + Q_L - W_P$	314
	$Q_T = Q_L + W_P$	314
	$Q_A = Q_P/\gamma_b + Q_L/\gamma_s - W_P$	315
	$Q_A = Q_L/\gamma_s + W_P$	315
	Capacità portante di punta	315
	$Q_P = A_P (c N_c + q_b N_q)$	315
	Capacità portante per attrito laterale	316
	$Q_L = \int (\tau_a) dS$	316
	$\int^L (C(c_a + K_s \sigma_v \operatorname{tg} \delta) dz)$	316
	Analisi del palo soggetto a forze orizzontali (Portanza trasversale)	317
	$K_h(z) = A + B z^n$	317
	$K_m = d y_e D K_k$	317
	$P_u = q K_{pq} + c K_{pc}$	318
	<i>Simbologia adottata</i>	318
	Materiali palo	319
	<i>Calcestruzzo</i>	319
	Coefficienti di sicurezza sui materiali.....	319
	Caratteristiche pali	319
	Descrizione terreni e falda	319
	<i>Simbologia adottata</i>	320
	<i>Parametri caratteristici</i>	320
	<i>Parametri minimi</i>	320
	<i>Parametri medi</i>	320
	Descrizione stratigrafia	320
	<i>Simbologia adottata</i>	320
	Normativa	321

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO	
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD	<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011

N.T.C. 2008	321
Calcolo secondo: Approccio 1	321
<i>Simbologia adottata</i>	321
Coefficienti parziali combinazioni statiche	321
Coefficienti parziali per le azioni o per l'effetto delle azioni:	321
Coefficienti parziali per i parametri geotecnici del terreno:	322
Coefficienti parziali combinazioni sismiche	322
Coefficienti parziali per le azioni o per l'effetto delle azioni:	322
Coefficienti parziali per i parametri geotecnici del terreno:	322
PALI DI FONDAZIONE	322
CARICHI VERTICALI. Coefficienti parziali γ_R per le verifiche dei pali	322
Pali trivellati	322
Coefficienti di riduzione ξ per la determinazione della resistenza caratteristica dei pali.....	323
11 TABULATI.....	324
11.1 ANALISI SCATOLARE COMBINAZIONI STR, SISMICA E GEO.....	324
11.1.1 Dati di input.....	324
11.1.2 Dati di output.....	328

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011

PREMESSA

La presente relazione tratta il sottopasso denominato RFI, ideato come opera con finalità di attraversamento della carreggiata autostradale facente parte dei collegamenti lato Sicilia del ponte sullo stretto di Messina; tale opera d'arte risulta necessaria per il raggiungimento tramite una strada di servizio dei binari posti tra i rilevati delle due carreggiate dell'asse principale dell'Autostrada.

Alla progressiva che caratterizza il sottopasso i binari ferroviari RFI sono posti esattamente tra le carreggiate dell'asse principale dell'Autostrada caratterizzati da rilevati di altezza piuttosto elevata e sorretti da appositi muri di sostegno; tale morfologia, vista la necessità di avere una strada di servizio in grado di raggiungere i binari da entrambe le direzioni, comporta la necessità di avere 2 sottopassi distinti, denominati quindi Lato Sud e Lato Nord.

La presente relazione di calcolo tratta il sottopasso denominato RFI LATO NORD, ideato come opera con finalità di attraversamento della carreggiata autostradale.

L'opera in questione risulta totalmente interrata, in coerenza con i presupposti logici di tale tipologia strutturale.

1 RIFERIMENTI NORMATIVI

I calcoli delle strutture sono stati eseguiti in base alle seguenti disposizioni:

- Legge 5/11/1971 n° 1086: "Norme per le discipline delle opere di conglomerato cementizio armato normale e precompresso ed a struttura metallica".
- Legge 2 febbraio 1974, n. 64 "Provvedimenti per le costruzioni con particolari prescrizioni per le zone sismiche".
- D.M. del 14/01/2008 - "Norme Tecniche per le Costruzioni 2008"
- Istruzioni per l'applicazione delle norme tecniche per le costruzioni di cui al DM 14/01/2008 – Circolare 2 febbraio 2009 n. 617.
- Norma UNI EN 206-1 : 2006 "Calcestruzzo. Parte 1 : specificazione, prestazione, produzione e conformità"
- Norma UNI EN 10025 – 2005 – "Prodotti laminati a caldo di acciai per impieghi strutturali.
- C.N.R. - U.N.I. 10016 - 00: "Travi composte di acciaio e calcestruzzo. Istruzioni per l'impiego"

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011

nelle costruzioni".

- C.N.R. – DT 207/2008: "Istruzioni per la valutazione delle azioni e degli effetti del vento sulle costruzioni".
- C.N.R. 10018/99 – “Apparecchi d’appoggio per le costruzioni. Istruzioni per l’impiego”
- C.N.R. - U.N.I. 10011 - 97: "Costruzioni in acciaio. Istruzioni per il calcolo, l'esecuzione, il collaudo e la manutenzione".
- C.N.R. - U.N.I. 10016 - 00: "Travi composte di acciaio e calcestruzzo. Istruzioni per l'impiego nelle costruzioni".

2 RIFERIMENTI BIBLIOGRAFICI

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- [2] Gruppo di Lavoro (2004). Redazione della mappa di pericolosità sismica prevista dall’Ordinanza PCM 3274 del 20 marzo 2003. Rapporto Conclusivo per il Dipartimento della Protezione Civile, INGV, Milano-Roma, aprile 2004, 65 pp. + 5 appendici).
- [3] Priestley M.J.N., Seible F. e Calvi G.M. “Seismic Design and Retrofit of Bridges”, J. Wiley & Sons, Inc. (1996).
- [4] Migliacci A. e Mola F., “Progetto agli stati limite delle strutture in c.a.”. Parte prima e seconda, Ed. Masson. 1996.
- [5] FEMA 440 – “Improvement of Nonlinear Static Seismic Analysis Procedures”, prepared by ATC, ATC-55 Project, Redwood City CA, June 2005.
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- [7] M. W. O’Neill and L. C. Reese “Drilled shafts: construction procedures and design methods”, prepared for U.S. Department of Transportation Federal Highway Administration; printed by ADSC: The International Association of Foundation Drilling, pub. n. ADSC-TL 4, August 1999.
- [8] CALTRANS “Seismic Design Criteria” Version 1.1; California department of transportation, USA, July 1999.
- [9] ATC-32 “Improved Seismic Design Criteria for California Bridges: Provisional Recommendations” Version 1.1; California, USA, June 1996.
- [10] ATC-49 “Recommended LRFD guidelines for the seismic design of highway bridges. Part I: Specifications. Part II: Commentary and Appendices”, ATC/MCEER Joint Venture, USA, June

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD	<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011	

2003.

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[12] Mylonakis G. [2001] "Simplified model for seismic pile bending at soil layer interfaces", The Japanese Geotechnical Society, Vol. 41, No. 4(20010815), pp. 47-58.

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO					
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<table border="1" style="width: 100%; border-collapse: collapse;"> <thead> <tr> <th style="text-align: left;"><i>Rev</i></th> <th style="text-align: left;"><i>Data</i></th> </tr> </thead> <tbody> <tr> <td style="text-align: center;">F0</td> <td style="text-align: center;">20/06/2011</td> </tr> </tbody> </table>	<i>Rev</i>	<i>Data</i>	F0	20/06/2011
<i>Rev</i>	<i>Data</i>						
F0	20/06/2011						

3 CARATTERISTICHE MATERIALI

3.1 Calcestruzzi (Secondo UNI 11104 - 2004)

Per sottofondazioni

classe di resistenza

C12/15

classe di esposizione

XC0

Per pali gettati in opera

classe di resistenza

C25/30

modulo elastico

$E_c = 31.476 \text{ N/mm}^2$

resistenza caratteristica a compressione cilindrica

$f_{ck} = 25,00 \text{ N/mm}^2$

resistenza media a compressione cilindrica

$f_{cm} = 33,00 \text{ N/mm}^2$

resistenza di calcolo a compressione

$f_{cd} = 14,17 \text{ N/mm}^2$

resistenza a trazione (valore medio)

$f_{ctm} = 2,56 \text{ N/mm}^2$

resistenza caratteristica a trazione

$f_{ctk} = 1,79 \text{ N/mm}^2$

resistenza caratteristica a trazione per flessione

$f_{ctk} = 2,15 \text{ N/mm}^2$

tensione a SLE – combinazione rara

$\sigma_C = 14,94 \text{ N/mm}^2$

tensione a SLE – combinazione quasi permanente

$\sigma_C = 11,20 \text{ N/mm}^2$

copriferro

$C = 40 \text{ mm}$

classe di esposizione

XC2

classe di consistenza slump

S4

max dimensione aggregati

$D_{max} = 32 \text{ mm}$

rapporto A/C massimo

0,50

Fondazioni

classe di resistenza

C25/30

modulo elastico

$E_c = 31.476 \text{ N/mm}^2$

resistenza caratteristica a compressione cilindrica

$f_{ck} = 25,00 \text{ N/mm}^2$

resistenza media a compressione cilindrica

$f_{cm} = 33,00 \text{ N/mm}^2$

resistenza di calcolo a compressione

$f_{cd} = 14,17 \text{ N/mm}^2$

resistenza a trazione (valore medio)

$f_{ctm} = 2,56 \text{ N/mm}^2$

resistenza caratteristica a trazione

$f_{ctk} = 1,79 \text{ N/mm}^2$

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<i>Rev</i>	<i>Data</i>						
F0	20/06/2011						

resistenza caratteristica a trazione per flessione	$f_{ctk} =$	2,15	N/mm ²
tensione a SLE – combinazione rara	$\sigma_C =$	14,94	N/mm ²
tensione a SLE – combinazione quasi permanente	$\sigma_C =$	11,20	N/mm ²
copriferro	$C =$	40	mm
classe di esposizione			XC2
classe di consistenza slump			S4
max dimensione aggregati	$D_{max} =$	32	mm
rapporto A/C massimo			0,50

Elevazioni, muri, solette

classe di resistenza		C32/40	
modulo elastico	$E_c =$	33.346	N/mm ²
resistenza caratteristica a compressione cilindrica	$f_{ck} =$	32,00	N/mm ²
resistenza media a compressione cilindrica	$f_{cm} =$	40,00	N/mm ²
resistenza di calcolo a compressione	$f_{cd} =$	18,13	N/mm ²
resistenza a trazione (valore medio)	$f_{ctm} =$	3,02	N/mm ²
resistenza caratteristica a trazione	$f_{ctk} =$	2,11	N/mm ²
resistenza caratteristica a trazione per flessione	$f_{ctk} =$	2,65	N/mm ²
tensione a SLE – combinazione rara	$\sigma_C =$	19,92	N/mm ²
tensione a SLE – combinazione quasi permanente	$\sigma_C =$	14,94	N/mm ²
copriferro	$C =$	40	mm
classe di esposizione	XC4	XS1	XF2
classe di consistenza slump			S4
max dimensione aggregati	$D_{max} =$	32	mm
rapporto A/C massimo			0,50

Per il calcestruzzo ordinario armato si assume il seguente peso per unità di volume:

$$\rho'_{cls} = \boxed{25} \text{ kN/m}^3$$

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011

3.1.1 Acciaio per armature (Secondo NTC 2008 – D.M. 14/01/2008)

		B450C	
tensione caratteristica di snervamento	$f_{yk} =$	450	N/mm ²
tensione caratteristica di rottura	$f_{tk} =$	540	N/mm ²
resistenza di calcolo a trazione	$f_{yd} =$	391,30	N/mm ²
modulo elastico	$E_s =$	206.000	N/mm ²
deformazione caratteristica al carico massimo	ϵ_{uk}	7,50	%
deformazione di progetto	ϵ_{ud}	6,75	%
Coeff. resistenza a instabilità delle membrature	$\gamma_m =$	1,10	

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO					
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<table border="1" style="width: 100%; border-collapse: collapse;"> <thead> <tr> <th style="text-align: left;"><i>Rev</i></th> <th style="text-align: left;"><i>Data</i></th> </tr> </thead> <tbody> <tr> <td style="text-align: center;">F0</td> <td style="text-align: center;">20/06/2011</td> </tr> </tbody> </table>	<i>Rev</i>	<i>Data</i>	F0	20/06/2011
<i>Rev</i>	<i>Data</i>						
F0	20/06/2011						

4 DESCRIZIONE DELLA STRUTTURA

4.1 CARATTERISTICHE GEOMETRICHE E UBICAZIONE DELLA STRUTTURA

La presente relazione di calcolo tratta il sottopasso denominato RFI LATO NORD ideato come opera con finalità di attraversamento della carreggiata autostradale.

L'opera in questione risulta totalmente interrata, in coerenza con i presupposti logici di tale tipologia strutturale. Geometricamente essa è schematizzabile come uno scatolare a sezione quadrata realizzato in c.a.. Lateralmente corrono due muri laterali formati da berlinesi di pali $\varnothing 1000$ disposti con interasse 1.200 mm di lunghezza totale 16,00 m dotati di 2 ordini di tiranti provvisori. Il completamento dello schema scatolare è quindi realizzato previa interposizione tra la sommità dei muri laterali e il terreno sovrastante di una soletta superiore spessa 0,80 m.

A nord dello scatolare sono infine previsti delle berlinesi di sostegno del terreno in adiacenza alla sede della strada di servizio suddivisi in tratti a 2 ordini di tiranti e a 1 ordine di tiranti.

Per quanto concerne le specifiche tecniche adottate nell'ambito della progettazione, si fa riferimento alla presente relazione, e alle normative di riferimento indicate nel seguito.

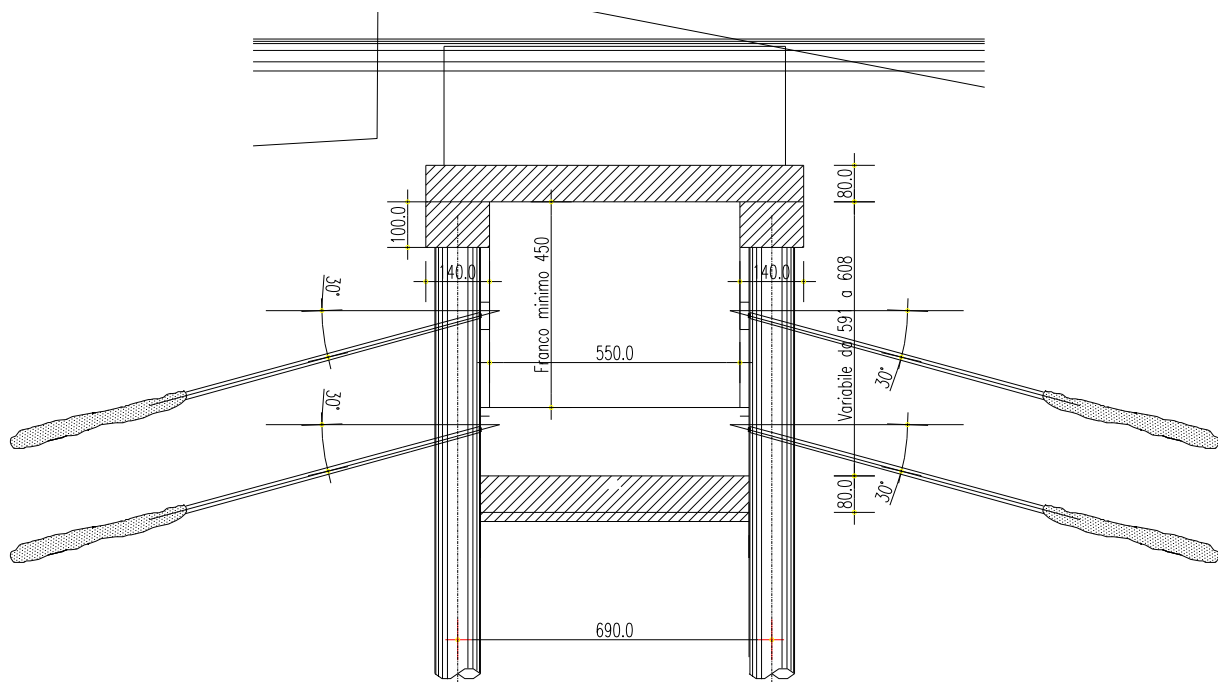


Figura 1.1 – Sezione tipo sottopasso RFI lato Nord.

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011

4.2 CARATTERIZZAZIONE GEOTECNICA DEL LUOGO

4.2.1 Descrizione delle litologie

Le litologie presenti sono le Sabbie e Ghiaie di Messina e i Depositi Terrazzati Marini.

La litologia prevalente è costituita dalla formazione delle Sabbie e Ghiaie di Messina.

I materiali in oggetto sono granulometricamente descritti come ghiaie e ciottoli da sub arrotondati ad appiattiti con matrice di sabbie grossolane.

Si rilevano strati di ghiaie cementate, come si evidenzia nei rilievi effettuati nelle aree di imbocco della galleria stradale Faro Superiore; in questi rilievi la ghiaia si presenta più o meno debolmente cementata e molto addensata. Lo scheletro si presenta costituito da ghiaie e ciottoli eterometrici arrotondati ed appiattiti.

I Depositi Terrazzati Marini sono invece rappresentati da depositi marini sabbiosi e sabbioso ghiaiosi fortemente pedogenizzati in prossimità della superficie. I depositi dei terrazzi marini rappresentano terre da sciolte a debolmente coesive con cementazione da debole ad assente.

L'età attribuibile ai terrazzi cartografati nell'area di intervento copre l'intervallo Pleistocene medio-superiore.

La falda non risulta interferente con le opere.

4.2.2 Indagini previste

Data l'esiguità delle prove (S408), si è scelto di tenere conto anche delle prove effettuate nei sondaggi utilizzati per caratterizzare la zona dell'ancoraggio della tratta stradale e ferroviaria da 0 ad 1+0 km.

I sondaggi di riferimento per la presente tratta sono S9 (campagna del 1984), S13 (campagna del 1987), AS-BH4, SPT8-AS, DMT1-AS, DMT2-AS (campagna del 1988), S102pz, S103pz e S104pz (campagna del 1992), SPPS00 e SPPS09 (campagna del 2002), S407,S408,S408bis, S409, S409bis, S411, ASLPT2508, ASCH1501, ASLPT3503, ASLPT3506, ASCH1504 (campagna del 2010).

Data l'esiguità di indagini che raggiungano i primi 30 m di profondità per la caratterizzazione sismica del suolo, alla zona in esame si assegna cautelativamente la categoria di suolo sismico (secondo N.T.C. 2008) di classe **C**.

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011

Le prove localmente utilizzate nella caratterizzazione sono:

Sabbie e Ghiaie di Messina

- Prove granulometriche (sondaggio SPPS00 e SPPS09) ;
- SPT (sondaggi S9, S408, S409, S409bis, S411, SPPS00 ,SPPS09, ASLPT2508, ASCH1501, ASLPT3503, ASLPT3506, ASCH1504, SPT8-AS, S102pz,S103pz, S104pz) ;
- prove sismiche in foro (S408, SPPS00, SPPS02, S108pz, BH4-AS, ASCH1504, ASCH1501) ;
- prove pressiometriche (sondaggi S409);
- prove dilatometriche (S408, DMT1-AS, DMT2-AS) ;
- 6 prove Le Franc (sondaggi S408, S409).

Depositi terrazzati marini

- Prove granulometriche (sondaggio S411, da PE101 a PE109) ;
- SPT (sondaggio S409) ;
- 1 prova Down Hole (sondaggio ASCH1504) ;
- 1 prova dilatometrica (DMT2-AS) .

4.2.3 Caratterizzazione geotecnica

Sabbie e Ghiaie di Messina

In questa tratta la formazione si presenta, dalle prove SPT analizzate, in egual misura composta da sabbie e ghiaie con densità relative che sembrerebbero diminuire con la profondità mostrando uno stato di addensamento medio.

Con riferimento al fuso medio (155 prove granulometriche) si ha che: $d_{50}=2.2\text{mm}$, $d_{60}=4\text{mm}$ e $d_{10}=0.03\text{mm}$. Le percentuali medie di ghiaia, sabbia e limo sono rispettivamente di 51%, 36%, 11%.

- **Dr:** I valori di N_{spt} sono stati corretti con il fattore correttivo $C_{\text{sg}}=0.55$ corrispondente al $d_{50}=2.2\text{mm}$

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011

- e_o : a partire dal d_{50} stimato si ottiene di $e_{max}-e_{min}$ pari a 0.26, non dissimile dai valori reperibili in letteratura ($0.17 < e_{max}-e_{min} < 0.29$) Stimando per e_{max} un valore pari a 0.7 a partire dai valori di D_r è stato possibile determinare i valori di e_o in sito.
- γ_d : in base a tali valori di e_o e da γ_s si può stimare $\gamma_{d_s} = 18-20 \text{KN/m}^3$
- K_0 : si considera la relazione di Mesri (1989) per tenere conto degli effetti di “aging”.

I primi 20 m sembrerebbero maggiormente addensati soprattutto nella porzione sabbio-ghiaiosa, probabilmente a causa dell'influenza del grado di sovraconsolidazione che ha caratterizzato alcune zone erose e/o del debole grado di cementazione.

Per i parametri di resistenza si ha:

z(m)	Dr(%) sabbie e ghiaie	ϕ'_p (pff=0-272KPa) (°)	ϕ'_{cv} (°)	K_0
0-20	40-70	38-42	33-35	0.45-0.5
>20	35-60	37-39	33-35	0.45-0.5

Come parametri operativi per l'angolo d'attrito si utilizzerà $\phi' = 38-40$.

I parametri di deformabilità ricavabili dall'interpretazione delle prove sismiche in foro presentano una grande dispersione anche nell'ambito del medesimo contesto (da 300m/s ad oltre 800m/s).

Valori generalmente crescenti con la profondità si sono registrati nelle sismiche in foro ASCH1504 e ASCH1501 che comunque hanno evidenziato valori localmente molto variabili, non sempre correlabili, in base ai dati ricavabili dalle colonne stratigrafiche, con la variazione granulometrica; ad esempio nei primi 15m÷20m le Vs appaiono maggiori di quelle misurate fino a 30-35m di profondità, e risultano mediamente pari a circa 400m/s, in analogia a quanto rilevabile dai maggiori valori di densità relativa.

La variabilità locale rende una correlazione delle Vs sismiche con quelle ricavate dalle correlazioni di prove SPT alquanto difficoltosa; si ottiene comunque una buona correlazione con i valori medi o minimi delle Vs sismiche (tranne che nel caso della sismica ASCH1504) per profondità tra 20 e

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011

50m.

Una stima dei moduli, considerando anche l'esito delle prove sismiche è riportata in tabella.

z(m)	G_0 (MPa)	E_0 (MPa)	E' (MPa)
0-20	200-400	480-960	65-160 / 128-320
20-50	$G_0 = 25 z^{0.64}$	$E_0 = 60 z^{0.64}$	9-23 $z^{0.64}$

I Le prove pressiometriche forniscono valori molto discordanti (S408, ramo di scarico e ricarico, $E' = 170$ MPa e 300 MPa a 26 e a 34m di profondità e circa 400MPa in S409 contro il range 30-100 MPa nelle dilatometriche DMT1AS e DMT2AS) .

Depositi terrazzati marini

Per la definizione delle categorie di suolo si rimanda all'Elab. CG0800PRBDSSBC8G000000001A ed alla relazione sismica di riferimento.

In presenza di un esiguo numero di indagini locali per le caratteristiche granulometriche si fa riferimento alla caratterizzazione generale:

- Il valore di D_{50} è pari a 0.8 mm
- Il valore di D_{60} è pari a 2 mm
- Il valore di D_{10} è pari a 0.01 mm

Le percentuali medie di ghiaia, sabbia e limo e argilla sono rispettivamente di 39%, 45%, 12% e 8%.

Il peso di volume dei grani medio γ_s è risultato pari a circa 26 kN/m³.

Per quanto concerne stato iniziale e parametri di resistenza si ha:

- **Dr:** I valori di N_{spt} sono stati corretti con il fattore correttivo $C_{sg} = 0.75$ corrispondente al $d_{50} = 0.8$ mm,

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011

- e_o : a partire dal d_{50} stimato si ottiene di $e_{max}-e_{min}$ pari a 0.36 stimando per e_{max} un valore pari a 0.8 a partire dai valori di D_r è stato possibile determinare i valori di e_o in sito. Si ottiene il valore di e_o pari a 0.5-0.7.
- γ_d : si ottiene un pari a 17-19 KN/m³.
- K_0 : si considera la relazione di Jaky.

z(m)	Dr(%) Sabbie	ϕ'_p (pff=0-272KPa) (°)	ϕ'_{cv} (°)	K_0
0-10	60-80	38-40	35-37	0.4-0.35

Come parametri operativi per l'angolo d'attrito si utilizzerà $\phi' = 38-40$.

Per i parametri di deformabilità non si hanno localmente a disposizione prove sismiche dalle quali ricavare leVs, e di conseguenza i parametri di deformabilità.

Il range di variazione ottenuto in base alle correlazioni dalle prove SPT della tratta per il modulo G_0 , per z che varia da 2 a 10 metri, è :

$$G_0 \approx 20 \div 100 \text{ MPa}$$

$$E_0 \approx 50 \div 250 \text{ MPa}$$

$$E' \approx 10 \div 20 / 40 \div 80 \text{ MPa (da 2 a 10 metri)}$$

Quest'ultimo range è relativo rispettivamente ad $1/10 \div 1/5 E_0$ ed ad $1/3 E_0$ corrispondenti rispettivamente a medie-grandi deformazioni ed a piccole deformazioni.

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011

4.3 CARATTERIZZAZIONE DELLA SISMICITA' DEL LUOGO

Le azioni di progetto si ricavano, ai sensi delle NTC, dalle accelerazioni a_g e dalle relative forme spettrali.

Le forme spettrali previste dalle NTC sono definite, su sito di riferimento rigido orizzontale, in funzione dei tre parametri:

- a_g accelerazione orizzontale massima del terreno;
- F_0 valore massimo del fattore di amplificazione dello spettro in accelerazione orizzontale;
- T_C^* periodo di inizio del tratto a velocità costante dello spettro in accelerazione orizzontale.

Per ciascun nodo del reticolo di riferimento e per ciascuno dei periodi di ritorno T_R considerati dalla pericolosità sismica, i tre parametri si ricavano riferendosi ai valori corrispondenti al 50esimo percentile ed attribuendo ad:

a_g il valore previsto dalla pericolosità sismica;

F_0 e T_C^* i valori ottenuti imponendo che le forme spettrali in accelerazione, velocità e spostamento previste dalle NTC scartino al minimo dalle corrispondenti forme spettrali previste dalla pericolosità sismica.

Le forme spettrali previste dalle NTC sono caratterizzate da prescelte probabilità di superamento e vite di riferimento. A tal fine occorre fissare:

- la vita di riferimento V_R della costruzione;
- le probabilità di superamento nella vita di riferimento P_{V_R} associate agli stati limite considerati, per individuare infine, a partire dai dati di pericolosità sismica disponibili, le corrispondenti azioni sismiche.

A tal fine è conveniente utilizzare, come parametro caratterizzante la pericolosità sismica, il periodo di ritorno dell'azione sismica T_R , espresso in anni. Fissata la vita di riferimento V_R , i due parametri T_R e P_{V_R} sono immediatamente esprimibili, l'uno in funzione dell'altro, mediante

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
		RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD	<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0

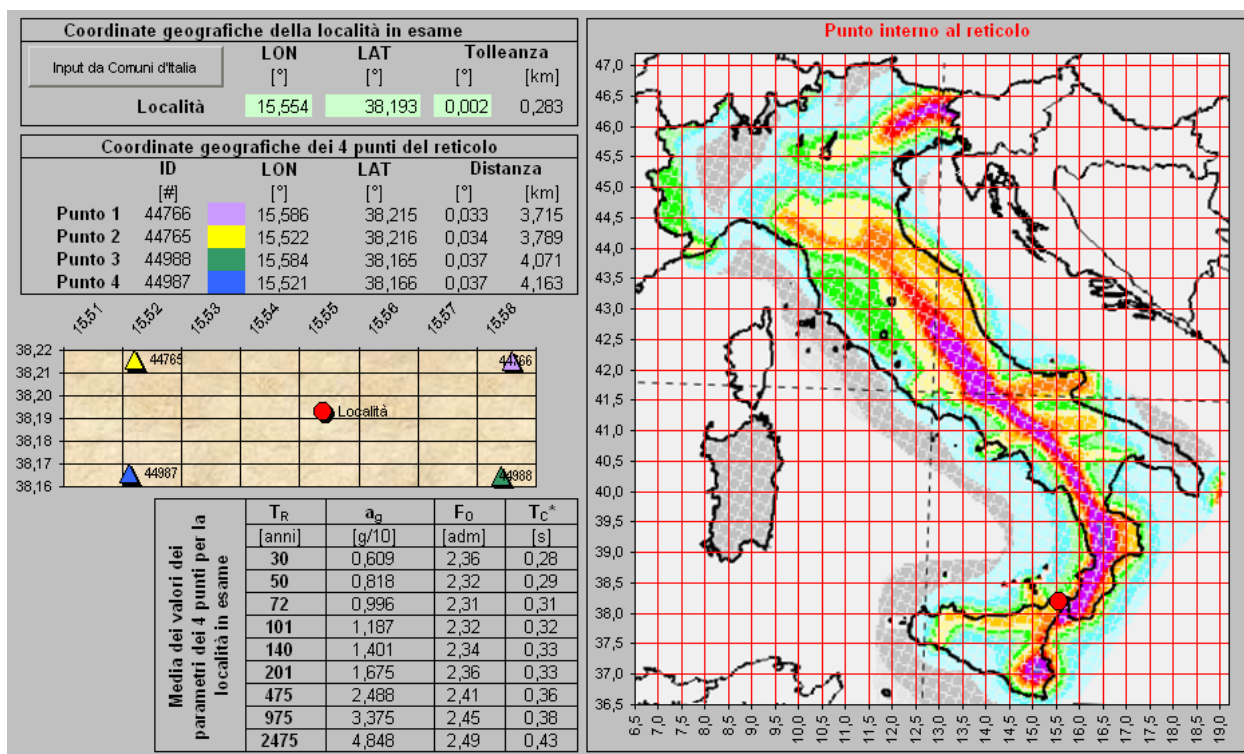
l'espressione:

$$T_R = -\frac{V_R}{\ln(1 - P_{VR})} = -\frac{200}{\ln(1 - 0.1)} = 1.898 \text{ anni}$$

I valori dei parametri a_g , F_0 e T_C^* relativi alla pericolosità sismica su reticolo di riferimento nell'intervallo di riferimento sono forniti nelle tabelle riportate nell'ALLEGATO B delle NTC.

I punti del reticolo di riferimento sono definiti in termini di Latitudine e Longitudine ed ordinati a Latitudine e Longitudine crescenti, facendo variare prima la Longitudine e poi la Latitudine. L'accelerazione al sito a_g è espressa in $g/10$; F_0 è adimensionale, T_C^* è espresso in secondi.

Nel seguito si riporta una tabella riassuntiva dei parametri che caratterizzano il Comune di Messina:



		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011

4.4 CRITERI GENERALI DI PROGETTAZIONE

Verifiche di resistenza

Le verifiche delle sezioni più sollecitate sono state condotte seguendo le prescrizioni del D.M.14/01/08 e seguendo le indicazioni della norma UNI EN 1992-2005.

Più specificatamente la verifica di resistenza delle sezioni nei vari elementi strutturali, viene condotta tenendo conto della verifica agli stati limite ultimi, e delle verifiche nei riguardi della fessurazione e delle tensioni di esercizio.

4.4.1.1 Verifiche di resistenza agli stati limite ultimi

Si è verificato che il valore di progetto degli effetti delle azioni, ovvero delle sollecitazioni flettenti M_d sia minore dei corrispondenti momenti resistenti M_r delle sezioni di progetto.

La verifica di resistenza delle sezioni nei vari elementi strutturali, viene condotta tenendo conto delle condizioni più gravose che si individuano dall'involuppo delle sollecitazioni agenti nelle diverse combinazioni di carico.

Le combinazioni e i coefficienti moltiplicativi delle singole azioni vengono definiti in base a quanto indicato nel D.M. 14 gennaio 2008.

Per quanto riguarda le verifiche a taglio ultimo, si è fatto riferimento al paragrafo 4.1.2.1.3 "Resistenza nei confronti di sollecitazioni taglianti" del D.M. 14 gennaio 2008.

Verifiche agli stati limite di esercizio

4.4.1.2 Definizione degli stati limite di fessurazione

In ordine di severità crescente si distinguono i seguenti stati limite:

- a) stato limite di decompressione nel quale, per la combinazione di azioni prescelta, la tensione normale è ovunque di compressione ed al più uguale a 0 ;
- b) stato limite di formazione delle fessure, nel quale, per la combinazione di azioni prescelta, la tensione normale di trazione nella fibra più sollecitata è:

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011

$$\sigma_t = \frac{f_{ctm}}{1,2}$$

c) stato limite di apertura delle fessure nel quale, per la combinazione di azioni prescelta, il valore limite di apertura della fessura calcolato al livello considerato è pari ad uno dei seguenti valori nominali:

$$w_1 = 0,2 \text{ mm}$$

$$w_2 = 0,3 \text{ mm}$$

$$w_3 = 0,4 \text{ mm}$$

Lo stato limite di fessurazione deve essere fissato in funzione delle condizioni ambientali e della sensibilità delle armature alla corrosione.

4.4.1.3 Condizioni ambientali

Le condizioni ambientali, ai fini della protezione contro la corrosione delle armature metalliche, possono essere suddivise in ordinarie, aggressive e molto aggressive in relazione a quanto indicato nella tabella seguente:

CONDIZIONI AMBIENTALI	CLASSE DI ESPOSIZIONE
Ordinarie	X0, XC1, XC2, XC3, XF1
Aggressive	XC4, XD1, XS1, XA1, XA2, XF2, XF3
Molto aggressive	XD2, XD3, XS2, XS3, XA3, XF4

Nel caso in esame si considera l'opera sottoposta a condizioni aggressive.

4.4.1.4 Sensibilità delle armature alla corrosione

Le armature si distinguono in due gruppi:

- armature sensibili;
- armature poco sensibili.

Appartengono al primo gruppo gli acciai da precompresso. Appartengono al secondo gruppo gli acciai ordinari. Per gli acciai zincati e per quelli inossidabili si può tener conto della loro minor sensibilità alla corrosione.

4.4.1.5 Scelta degli stati limite di fessurazione

Nella tabella sottostante sono indicati i criteri di scelta dello stato limite di fessurazione con

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011

riferimento alle esigenze sopra riportate.

Gruppi di esigenze	Condizioni ambientali	Combinazione di azioni	Armatura			
			Sensibile		Poco sensibile	
			Stato limite	w_d	Stato limite	w_d
a	Ordinarie	frequente	ap. fessure	$\leq w_2$	ap. fessure	$\leq w_3$
		quasi permanente	ap. fessure	$\leq w_1$	ap. fessure	$\leq w_2$
b	Aggressive	frequente	ap. fessure	$\leq w_1$	ap. fessure	$\leq w_2$
		quasi permanente	decompressione	-	ap. fessure	$\leq w_1$
c	Molto aggressive	frequente	formazione fessure	-	ap. fessure	$\leq w_1$
		quasi permanente	decompressione	-	ap. fessure	$\leq w_1$

4.4.1.6 Verifiche allo stato limite di fessurazione

Stato limite di decompressione e di formazione delle fessure

Le tensioni sono calcolate in base alle caratteristiche geometriche e meccaniche della sezione omogeneizzata non fessurata.

Stato limite di apertura delle fessure

Il valore caratteristico di calcolo di apertura delle fessure (w_d) non deve superare i valori nominali w_1 , w_2 , w_3 secondo quanto riportato nella Tabella sopra riportata.

Il valore caratteristico di calcolo è dato da:

$$w_d = 1,7 \cdot w_m$$

dove w_m rappresenta l'ampiezza media delle fessure.

L'ampiezza media delle fessure w_m è calcolata come prodotto della deformazione media delle barre d'armatura ε_{sm} per la distanza media tra le fessure Δ_{sm} :

$$w_m = \varepsilon_{sm} \cdot \Delta_{sm}$$

Per il calcolo di ε_{sm} e Δ_{sm} vanno utilizzati criteri consolidati riportati nella letteratura tecnica. ε_{sm} può essere calcolato tenendo conto dell'effetto del "tension stiffening" nel rispetto della limitazione:

$$\varepsilon_{sm} \geq 0,6 \cdot \frac{\sigma_s}{E_s}$$

con σ_s tensione nell'acciaio dell'armatura tesa (per sezione fessurata) nelle condizioni di carico considerate ed E_s è il modulo elastico dell'acciaio.

4.4.1.7 Verifiche delle tensioni in esercizio

Valutate le azioni interne nelle varie parti della struttura, dovute alle combinazioni caratteristica e

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011

quasi permanente delle azioni, si calcolano le massime tensioni sia nel calcestruzzo sia nelle armature; si deve verificare che tali tensioni siano inferiori ai massimi valori consentiti di seguito riportati.

Tensione massima di compressione del calcestruzzo nelle condizioni di esercizio

La massima tensione di compressione del calcestruzzo σ_c , deve rispettare la limitazione seguente:

$\sigma_c < 0.6 \cdot f_{ck}$ per la combinazione caratteristica (rara);

$\sigma_c < 0.45 \cdot f_{ck}$ per la combinazione caratteristica quasi permanente.

Nel caso di elementi piani (solette, pareti, ...) gettati in opera con calcestruzzi ordinari e con spessori di calcestruzzo minori di 50 mm i valori limite sopra scritti vanno ridotti del 20%.

Tensione massima dell'acciaio in condizioni di esercizio

Per l'acciaio la tensione massima, σ_s , per effetto delle azioni dovute alla combinazione caratteristica deve rispettare la limitazione seguente:

$$\sigma_s < 0.8 \cdot f_{yk}$$

Azioni sismiche

Le azioni sismiche di progetto, in base alle quali valutare il rispetto dei diversi stati limite considerati, si definiscono a partire dalla "pericolosità sismica di base" del sito di costruzione, che costituisce l'elemento di conoscenza primario per la determinazione delle azioni sismiche.

La pericolosità sismica è definita in termini di accelerazione orizzontale massima attesa a_g in condizioni di campo libero su sito di riferimento rigido con superficie topografica orizzontale di categoria A, nonché di ordinate dello spettro di risposta elastico in accelerazione ad essa corrispondente $S_e(T)$, con riferimento a prefissate probabilità di eccedenza P_{VR} nel periodo di riferimento V_R .

Nel presente progetto è stata verificata la combinazione di carico sismica con riferimento allo stato limite ultimo di salvaguardia della vita (SLV): a seguito del terremoto la struttura subisce rotture e crolli dei componenti non strutturali ed impiantistici e significativi danni dei componenti strutturali cui si associa una perdita significativa di rigidità nei confronti delle azioni orizzontali; mentre conserva invece una parte della esistenza e rigidità per azioni verticali e un margine di sicurezza

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011

nei confronti del collasso per azioni sismiche orizzontali.

4.4.1.8 Vita nominale

La vita nominale di un'opera strutturale è intesa come il numero di anni nel quale la struttura, purché soggetta alla manutenzione ordinaria, deve poter essere usata per lo scopo al quale è destinata. Nel caso in oggetto, l'opera ricade all'interno del tipo di costruzione: "Grandi opere ordinarie, ponti, opere infrastrutturali e dighe di grandi dimensioni o di importanza strategica" (paragrafo 2.4 delle 'Nuove Norme tecniche per le costruzioni – D.M. 14 gennaio 2008").

La vita nominale si assume pertanto pari a **$V_N = 100$ anni**.

4.4.1.9 Classe d'uso

In presenza di azioni sismiche, con riferimento alle conseguenze di una interruzione di operatività o di un'eventuale collasso, le costruzioni sono suddivise in classi d'uso. Nel caso in oggetto si fa riferimento alla Classe IV: costruzioni con funzioni pubbliche o strategiche importante, anche con riferimento alla gestione della protezione civile in caso di calamità..... Ponti e reti ferroviarie di importanza critica per il mantenimento delle vie di comunicazione, particolarmente dopo un evento sismico."

Il coefficiente d'uso si assume pertanto pari a **$c_U = 2,0$ anni**.

4.4.1.10 Periodo di riferimento per l'azione sismica

Le azioni sismiche su ciascuna costruzione vengono valutate in relazione ad un periodo di riferimento V_R che si ricava, per ciascun tipo di costruzione, moltiplicandone la vita nominale V_N per il coefficiente d'uso C_U . Tale coefficiente è funzione della classe d'uso.

$$V_R = V_N \times C_U = 100 \text{ anni} \times 2 = 200 \text{ anni}$$

Le probabilità di superamento P_{VR} nel periodo di riferimento V_R , cui riferirsi per individuare l'azione sismica agente, sono pari al 10% nel caso dello stato limite SLV.

4.4.1.11 Parametri di progetto

Le azioni di progetto si ricavano, ai sensi delle NTC, dalle accelerazioni a_g e dalle relative forme

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011

spettrali.

Le forme spettrali previste dalle NTC sono definite, su sito di riferimento rigido orizzontale, in funzione dei tre parametri:

- a_g accelerazione orizzontale massima del terreno;
- F_0 valore massimo del fattore di amplificazione dello spettro in accelerazione orizzontale;
- T_C^* periodo di inizio del tratto a velocità costante dello spettro in accelerazione orizzontale.

Per ciascun nodo del reticolo di riferimento e per ciascuno dei periodi di ritorno T_R considerati dalla pericolosità sismica, i tre parametri si ricavano riferendosi ai valori corrispondenti al 50esimo percentile ed attribuendo ad:

a_g il valore previsto dalla pericolosità sismica;

F_0 e T_C^* i valori ottenuti imponendo che le forme spettrali in accelerazione, velocità e spostamento previste dalle NTC scartino al minimo dalle corrispondenti forme spettrali previste dalla pericolosità sismica.

Le forme spettrali previste dalle NTC sono caratterizzate da prescelte probabilità di superamento e vite di riferimento. A tal fine occorre fissare:

- la vita di riferimento V_R della costruzione;
- le probabilità di superamento nella vita di riferimento P_{VR} associate agli stati limite considerati, per individuare infine, a partire dai dati di pericolosità sismica disponibili, le corrispondenti azioni sismiche.

A tal fine è conveniente utilizzare, come parametro caratterizzante la pericolosità sismica, il periodo di ritorno dell'azione sismica T_R , espresso in anni. Fissata la vita di riferimento V_R , i due parametri T_R e P_{VR} sono immediatamente esprimibili, l'uno in funzione dell'altro, mediante l'espressione:

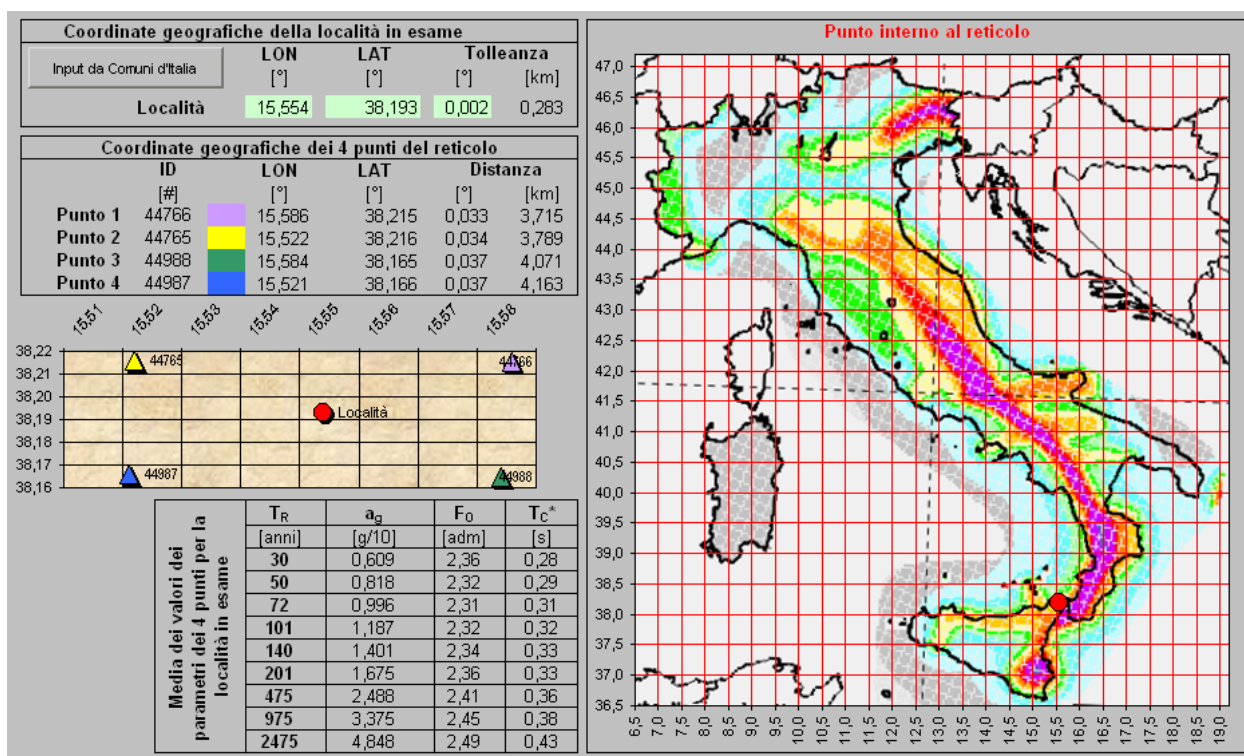
$$T_R = -\frac{V_R}{\ln(1 - P_{VR})} = -\frac{200}{\ln(1 - 0.1)} = 1.898 \text{ anni}$$

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
		RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD	<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0

I valori dei parametri a_g , F_0 e T_C^* relativi alla pericolosità sismica su reticolo di riferimento nell'intervallo di riferimento sono forniti nelle tabelle riportate nell'ALLEGATO B delle NTC.

I punti del reticolo di riferimento sono definiti in termini di Latitudine e Longitudine ed ordinati a Latitudine e Longitudine crescenti, facendo variare prima la Longitudine e poi la Latitudine. L'accelerazione al sito a_g è espressa in g/10; F_0 è adimensionale, T_C^* è espresso in secondi.

Nel seguito si riporta una tabella riassuntiva dei parametri che caratterizzano il Comune di Messina:



4.4.1.12 Classificazione sismica del terreno

Ai fini della definizione dell'azione sismica di progetto, in accordo con le NTC, si fa riferimento all'approccio semplificato che si basa sulla individuazione di categorie di sottosuolo di riferimento.

Data l'esiguità di indagini che raggiungano i primi 30 m di profondità per la caratterizzazione sismica del suolo, alla zona in esame si assegna cautelativamente la categoria di suolo sismico (secondo N.T.C. 2008) di classe **C**.

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO					
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<table border="1" style="width: 100%; border-collapse: collapse;"> <tr> <td style="width: 50%;"><i>Rev</i></td> <td style="width: 50%;"><i>Data</i></td> </tr> <tr> <td>F0</td> <td>20/06/2011</td> </tr> </table>	<i>Rev</i>	<i>Data</i>	F0	20/06/2011
<i>Rev</i>	<i>Data</i>						
F0	20/06/2011						

4.4.1.13 Spettro di risposta elastico in accelerazione

Lo spettro di risposta elastico in accelerazione è espresso da una forma spettrale (spettro normalizzato) riferita ad uno smorzamento convenzionale del 5%, moltiplicata per il valore della accelerazione orizzontale massima a_g su sito di riferimento rigido orizzontale. Sia la forma spettrale che il valore di a_g variano al variare della probabilità di superamento nel periodo di riferimento P_{VR} .

4.4.1.14 Spettro di risposta elastico in accelerazione delle componenti orizzontali

Lo spettro di risposta elastico della componente orizzontale è definito dalle espressioni seguenti:

$$0 \leq T \leq T_B \quad S_e(T) = a_g \cdot S \cdot \eta \cdot F_0 \left[\frac{T}{T_B} + \frac{1}{\eta \cdot F_0} \cdot \left(1 - \frac{T}{T_B} \right) \right]$$

$$T_B \leq T \leq T_C \quad S_e(T) = a_g \cdot S \cdot \eta \cdot F_0$$

$$T_C \leq T \leq T_D \quad S_e(T) = a_g \cdot S \cdot \eta \cdot F_0 \cdot \frac{T_C}{T}$$

$$T_D \leq T \quad S_e(T) = a_g \cdot S \cdot \eta \cdot F_0 \cdot \left(\frac{T_C \cdot T_D}{T^2} \right)$$

nelle quali T ed S_e sono, rispettivamente, periodo di vibrazione ed accelerazione spettrale orizzontale.

Inoltre:

- S : è il coefficiente che tiene conto della categoria di sottosuolo e delle condizioni topografiche mediante la relazione seguente: $S = S_S \cdot S_T$
- essendo S_S il coefficiente di amplificazione stratigrafica e S_T il coefficiente di amplificazione topografica riportati nelle tabelle seguenti;

CATEGORIA SOTTOSUOLO	S _S	C _C
A	1,00	1,00

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011

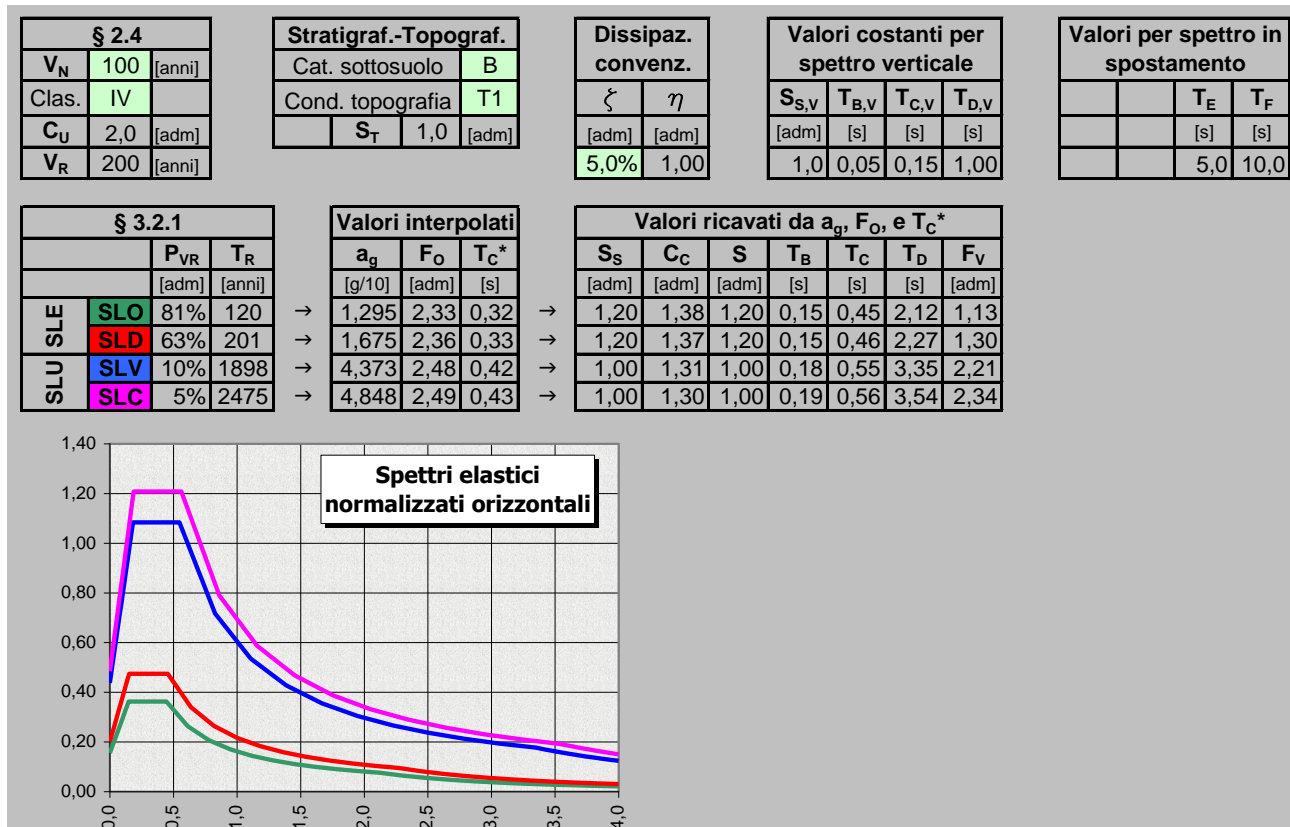
B	$1,00 \leq 1,40 - 0,40 \cdot F_0 \cdot \frac{a_g}{g} \leq 1,20$	$1,10 \cdot (T^*_C)^{-0,20}$
C	$1,00 \leq 1,70 - 0,60 \cdot F_0 \cdot \frac{a_g}{g} \leq 1,50$	$1,05 \cdot (T^*_C)^{-0,33}$
D	$0,90 \leq 2,40 - 1,50 \cdot F_0 \cdot \frac{a_g}{g} \leq 1,80$	$1,25 \cdot (T^*_C)^{-0,50}$
E	$1,00 \leq 2,00 - 1,10 \cdot F_0 \cdot \frac{a_g}{g} \leq 1,60$	$1,15 \cdot (T^*_C)^{-0,40}$

CATEGORIA TOPOGRAFICA	Ubicazione dell'opera o dell'intervento	S _T
T1	-	1,00
T2	In corrispondenza della sommità del pendio	1,2
T3	In corrispondenza della cresta del rilievo	1,2
T4	In corrispondenza della cresta del rilievo	1,2

- η : è il fattore che altera lo spettro elastico per coefficienti di smorzamento viscosi convenzionali ξ diversi dal 5%, mediante la relazione: $\eta = \sqrt{\frac{10}{(5 + \xi)}} \geq 0,55$
- dove ξ (espresso in percentuale) è valutato sulla base di materiali, tipologia strutturale e terreno di fondazione;
- F_0 : è il fattore che quantifica l'amplificazione spettrale massima, su sito di riferimento rigido orizzontale, ed ha valore minimo pari a 2,2;
- T_C : è il periodo corrispondente all'inizio del tratto a velocità costante dello spettro, dato da: $T_C = C_C \cdot T^*_C$; dove C_C è un coefficiente funzione della categoria di sottosuolo;
- T_B : è il periodo corrispondente all'inizio del tratto dello spettro ad accelerazione costante; $T_B = T_C / 3$
- T_D : è il periodo corrispondente all'inizio del tratto a spostamento costante dello spettro, espresso in secondi mediante la relazione: $T_D = 4,0 \cdot \frac{a_g}{g} + 1,6$

Nel seguito si riportano gli spettri elastici orizzontali relativi al sito ed al terreno.

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO	
		RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD	Codice documento SS0558_F0.doc



4.4.1.15 Spettro di risposta elastico in accelerazione delle componenti verticali

Lo spettro di risposta elastico in accelerazione della componente verticale è definito dalle espressioni seguenti:

$$0 \leq T \leq T_B \quad S_{ve}(T) = a_g \cdot S \cdot \eta \cdot F_V \left[\frac{T}{T_B} + \frac{1}{\eta \cdot F_O} \cdot \left(1 - \frac{T}{T_B} \right) \right]$$

$$T_B \leq T \leq T_C \quad S_e(T) = a_g \cdot S \cdot \eta \cdot F_V$$

$$T_C \leq T \leq T_D \quad S_e(T) = a_g \cdot S \cdot \eta \cdot F_V \cdot \frac{T_C}{T}$$

$$T_D \leq T \quad S_e(T) = a_g \cdot S \cdot \eta \cdot F_V \cdot \left(\frac{T_C \cdot T_D}{T^2} \right)$$

nelle quali T e S_{ve} sono, rispettivamente, periodo di vibrazione ed accelerazione spettrale verticale e F_V è il fattore che quantifica l'amplificazione spettrale massima, in termini di accelerazione

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011

orizzontale massima del terreno ag su sito di riferimento rigido orizzontale, mediante la relazione:

$$F_V = 1,35 \cdot F_0 \cdot \left(\frac{a_g}{g} \right)^{0,5}$$

I valori di a_g , F_0 , S_T , S , η sono quelli già definiti per le componenti orizzontali; i valori di S_S , T_B , T_C e T_D , sono invece quelli riportati nella tabella seguente.

CATEGORIA SOTTOSUOLO	S_S	T_B	T_C	T_D
A, B, C, D, E	1,00	0,05 s	0,15 s	1,0 s

4.4.1.16 Spettro di progetto

Per gli stati limite di esercizio lo spettro di progetto $S_d(T)$ da utilizzare, sia per le componenti orizzontali che per la componente verticale, è lo spettro elastico corrispondente, riferito alla probabilità di superamento nel periodo di riferimento PVR considerata.

Per le verifiche agli stati limite ultimi lo spettro di progetto $S_d(T)$ da utilizzare, sia per le componenti orizzontali, sia per la componente verticale, è lo spettro elastico corrispondente riferito alla probabilità di superamento nel periodo di riferimento P_{VR} considerata con le ordinate ridotte sostituendo η con $1/q$, dove q è il fattore di struttura, nelle formule precedentemente riportate e comunque: $S_d(T) \geq 0,2 \cdot a_g$.

Il valore del fattore di struttura q da utilizzare per ciascuna direzione della azione sismica, dipende dalla tipologia strutturale, dal suo grado di iperstaticità e dai criteri di progettazione adottati e prende in conto le non linearità di materiale. Esso può essere calcolato tramite la seguente espressione:

$$q = q_0 \times K_R = 1,0$$

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011

5 FASI COSTRUTTIVE

Le fasi costruttive per l'esecuzione dell'opera in oggetto sono da considerarsi globali per la realizzazione dei due sottopassi in oggetto, tenendo presente la necessità di interfacciarsi con la realizzazione dei muri di sostegno prefabbricati previsti in adiacenza alla ferrovia che non sono oggetto del presente elaborato:

- 1 Scavo di sbancamento generale fino a quota +51,00 m dove il terreno esistente risulta a quota superiore;
- 2 Scavo in corrispondenza dello scatolare lato Sud fino a quota di base fondazioni;
- 3 Realizzazione delle berlinesi di pali, della trave di coronamento, delle travi di contrasto e dei tiranti provvisori come descritto al capitolo 9 della relazione di calcolo specifica lato Nord; getto della soletta di fondazione lato Sud;
- 4 Scavo all'interno della palificata lato Nord; realizzazione delle elevazioni e della soletta di copertura lato Sud;
- 5 Realizzazione delle solette di base e di copertura lato Nord; posa in opera dei muri prefabbricati in adiacenza allo scatolare sud previa apposito scavo e realizzazione fondazioni in opera;
- 6 Smontaggio delle travi di contrasto in acciaio e delle testate di ancoraggio dei tiranti provvisori lato Nord;
- 7 Realizzazione fondazioni dirette dei muri prefabbricati lato Nord con getto c.a. in opera e posa in opera delle elevazioni prefabbricate;
- 8 Reinterro a monte dei muri prefabbricati e dei piedritti dei sottopassi fino alla quota necessaria per la realizzazione del sottofondo e pacchetto stradale;
- 9 Realizzazione opere di finitura (pavimentazione, barriere di sicurezza, reti di protezione ecc.) della carreggiata principale.

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011

6 ELABORATI DI RIFERIMENTO

CG0700	P	RG	D	S	SC	00	SP	S4	00	00	01	B
CG0700	P	SH	D	S	SC	00	SP	S4	00	00	01	B
CG0700	P	CL	D	S	SC	00	SP	S4	00	00	02	B
CG0700	P	RB	D	S	SC	00	SP	S4	00	00	01	B
CG0700	P	FZ	D	S	SC	00	SP	S4	00	00	01	B
CG0700	P	P8	D	S	SC	00	SP	S4	00	00	01	B
CG0700	P	P8	D	S	SC	00	SP	S4	00	00	02	B
CG0700	P	BA	D	S	SC	00	SP	S4	00	00	01	B
CG0700	P	SA	D	S	SC	00	SP	S4	00	00	01	B
CG0700	P	SA	D	S	SC	00	SP	S4	00	00	02	B
CG0700	P	SZ	D	S	SC	00	SP	S4	00	00	01	B

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011

7 ANALISI STRUTTURA

7.1 Modellazione della struttura

Di seguito viene fornita una breve descrizione delle modalità di modellazione utilizzate per lo studio della struttura scatolare.

L'opera è stata schematizzata considerando esclusivamente una porzione di essa pari ad uno sviluppo longitudinale di 1,00 m definendo i valori di rigidezza totale del palo senza suddividerla per l'interasse dei pali stessi pari a 1,20 m. Tutti i carichi e le sollecitazioni saranno quindi ripartiti sul metro lineare. La modellazione utilizzata è cautelativa nei punti più sollecitati del telaio - tipo, e precisamente nei punti di incastro tra i pali e la soletta superiore, nonché cautelativa per i pali stessi. Tale modellazione sovrastima nell'ordine del punto percentuale le sollecitazioni nei punti descritti rispetto alla configurazione con sviluppo longitudinale da 120 cm.

La sezione è modellata attraverso 9 elementi frame, ubicati in corrispondenza delle linee d'asse degli elementi costituenti la sezione ed ai quali vengono assegnate le proprietà inerziali corrispondenti alle due solette ed ai muri laterali.

I carichi agenti sulla struttura e di derivazione autostradale, sono precedentemente diffusi attraverso lo strato di terreno e c.a. che li separa dalla linea d'asse della soletta superiore. A tale proposito, per un'esaustiva descrizione delle modalità procedurali adottate, si fa riferimento ai sottocapitoli seguenti.

Le modellazioni e le verifiche delle strutture nelle fasi intermedie di costruzione del sottopasso sono riportate all'interno del **capitolo 9** della presente relazione di calcolo, con specifico riferimento al paragrafo 9.2 relativo alle berlinesi a due ordini di tiranti. In particolare si vanno a modellare le berlinesi di pali costituenti i piedritti dell'opera nelle seguenti fasi costruttive intermedie precedenti alla realizzazione della soletta di chiusura ed alla rimozione dei tiranti provvisori:

- Fase 0: infissione dei pali in fase geostatica con testa pali al piano di cantiere;
- Fase 1: apertura cantiere con transito mezzi di cantiere a monte berlinese;
- Fase 2. scavo fino a quota del 1° ordine di tiranti provvisori;
- Fase 3: realizzazione del 1° ordine di tiranti;
- Fase 4: scavo fino a quota del 2° ordine di tiranti provvisori;
- Fase 5. realizzazione del 2° ordine di tiranti;
- Fase 6: scavo fino a quota di fondo scavo.

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011

Per ognuna delle fasi elencate e per le combinazioni 1 e 2 dell'approccio 1 e la combinazione sismica vengono definite sollecitazioni e fattori di sicurezza delle verifiche principali, di cui si riporta la tabella riassuntiva dei valori massimi per il caso della berlinese a due ordini di tiranti corrispondente alle fasi costruttive dei piedritti del sottopasso lato nord; tale tabella è presente ai paragrafi 9.1 e 9.3 per la berlinese ad 1 ordine di tiranti e per quella a due ordini nella zona del risolto. Inoltre ai capitoli 9.1, 9.2 e 9.3 sono presenti i fattori di sicurezza per tutte le fasi parziali già descritte.

	Risultati analisi	Spostamento paratia (cm)	Cedimenti (cm)	Momento paratia (daN-m/m)	Momento paratia (daN-m)	Taglio paratia (daN/m)	Taglio paratia (daN)	TSF Comb.paratia	TSF M+N paratia
0:									
DM08_ITA:									
Comb. 1:	Calculation successful								
A1+M1+R1		0,2763889	1.06	22178	26613.6	21504	25804.8	0,0819444	0,0819444
0:									
DM08_ITA:									
Comb. 2:	Calculation successful								
A2+M2+R1		14.39	2.34	19950	23940	21976	26371.2	0,0736111	0,0736111
0:									
DM08_ITA:									
EQK - Seismic	Calculation successful								
		0,5951389	0,1375	28791	34549.2	29170	35004	0,10625	0,10625
	TSF V paratia	Max. reazione vincoli (daN/m)	Max. reazione vincoli (daN)	Verifica vincoli	TSF vincoli	TSF sfilamento tirante	FS fondo scavo	FS % passiva mobilitata (analisi NL)	Vera/Attiva (analisi NL)
0:									
DM08_ITA:									
Comb. 1:									
A1+M1+R1	0,4625	43626	52351.2	0,3152778	0,3152778	0,2048611	4.026	3.034	1.457
0:									
DM08_ITA:									
Comb. 2:									
A2+M2+R1	0,4729167	44450	53340	0,3208333	0,3208333	0.39	3.22	1.742	1.275
0:									
DM08_ITA:									
EQK - Seismic	0,6277778	58842	70610.4	0,425	0,425	0,3583333	3.22	1.47	1.266

Nello specifico la tabella riportata definisce i valori massimi di:

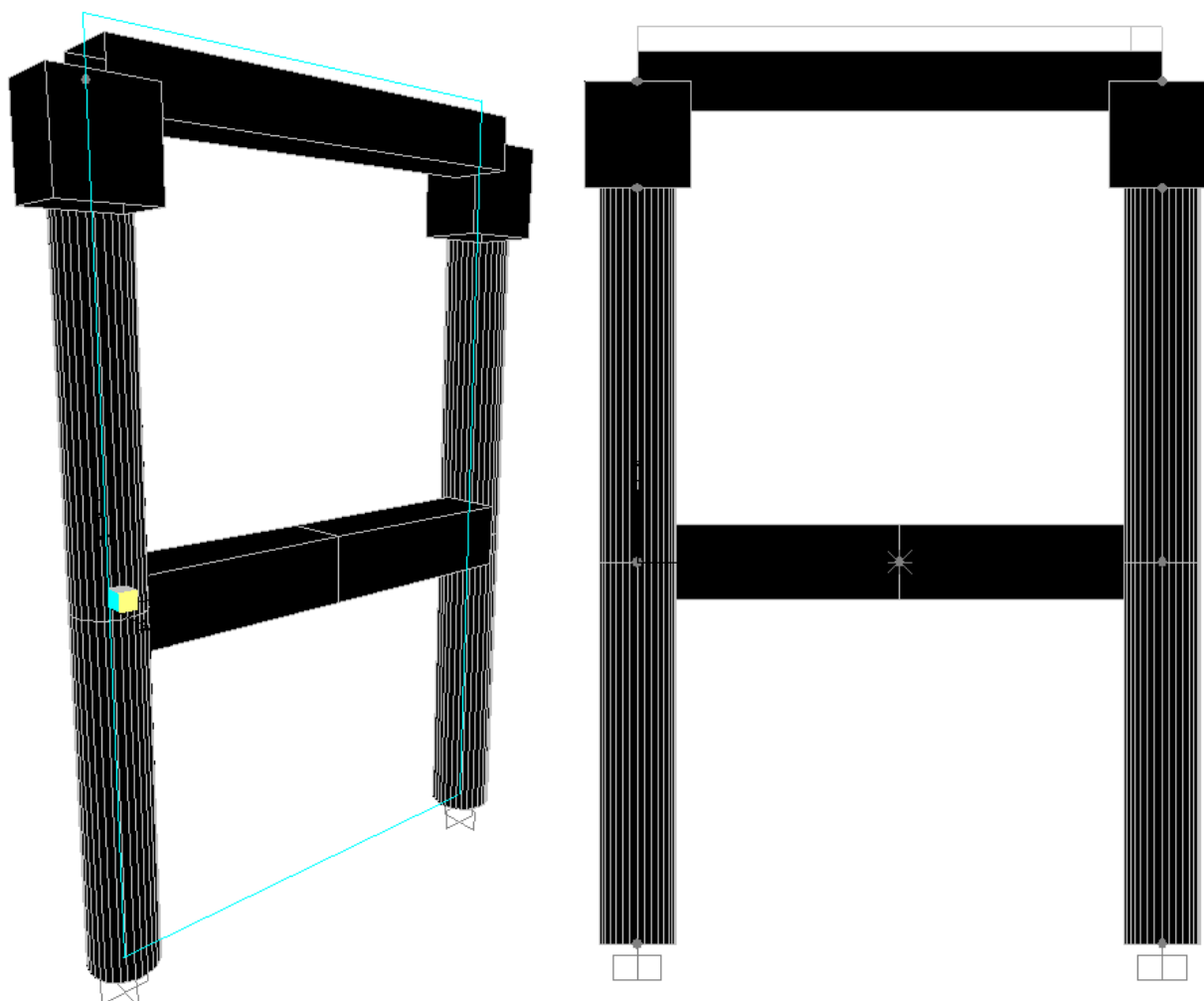
- Spostamento in testa della paratia;
- Cedimento della berlinese;

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD	<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011	

- Momenti flettenti massimi ogni metro lineare e totali nella profondità considerata;
- Azione tagliante massimale ogni metro lineare e totale nella profondità considerata;
- Tasso di sfruttamento a presso-flessione della paratia;
- Tasso di sfruttamento a taglio della paratia;
- Massima reazione dei vincoli al metro lineare e totale nella profondità considerata;
- Tasso di sfruttamento di verifica dei vincoli;
- Tasso di sfruttamento allo sfilamento dei tiranti;
- Fattore di sicurezza della stabilità del piede della berlinese;
- Rapporto percentuale tra la spinta attiva e la spinta effettivamente mobilitata a valle della paratia;
- Rapporto tra la spinta a monte della paratia e la spinta attiva.

Al termine delle suddette fasi si esegue quindi la soletta di copertura e si rimuovono i tiranti arrivando alla situazione relativa alla modellazione indicata nel presente capitolo e di cui si eseguono le verifiche riportate al capitolo 8.

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO					
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<table border="1"> <thead> <tr> <th><i>Rev</i></th> <th><i>Data</i></th> </tr> </thead> <tbody> <tr> <td>F0</td> <td>20/06/2011</td> </tr> </tbody> </table>	<i>Rev</i>	<i>Data</i>	F0	20/06/2011
<i>Rev</i>	<i>Data</i>						
F0	20/06/2011						



In particolare, per quanto concerne l'interazione terreno-struttura, si precisa che tale interazione viene modellata mediante "suolo alla Winkler" in corrispondenza dell'intradosso della soletta inferiore, il cui valore viene definito in funzione delle caratteristiche geotecniche e delle dimensioni della fondazione e un incastro alla base dei pali, ad una distanza dalla soletta pari a $5 \varnothing$.

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO	
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD	<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011

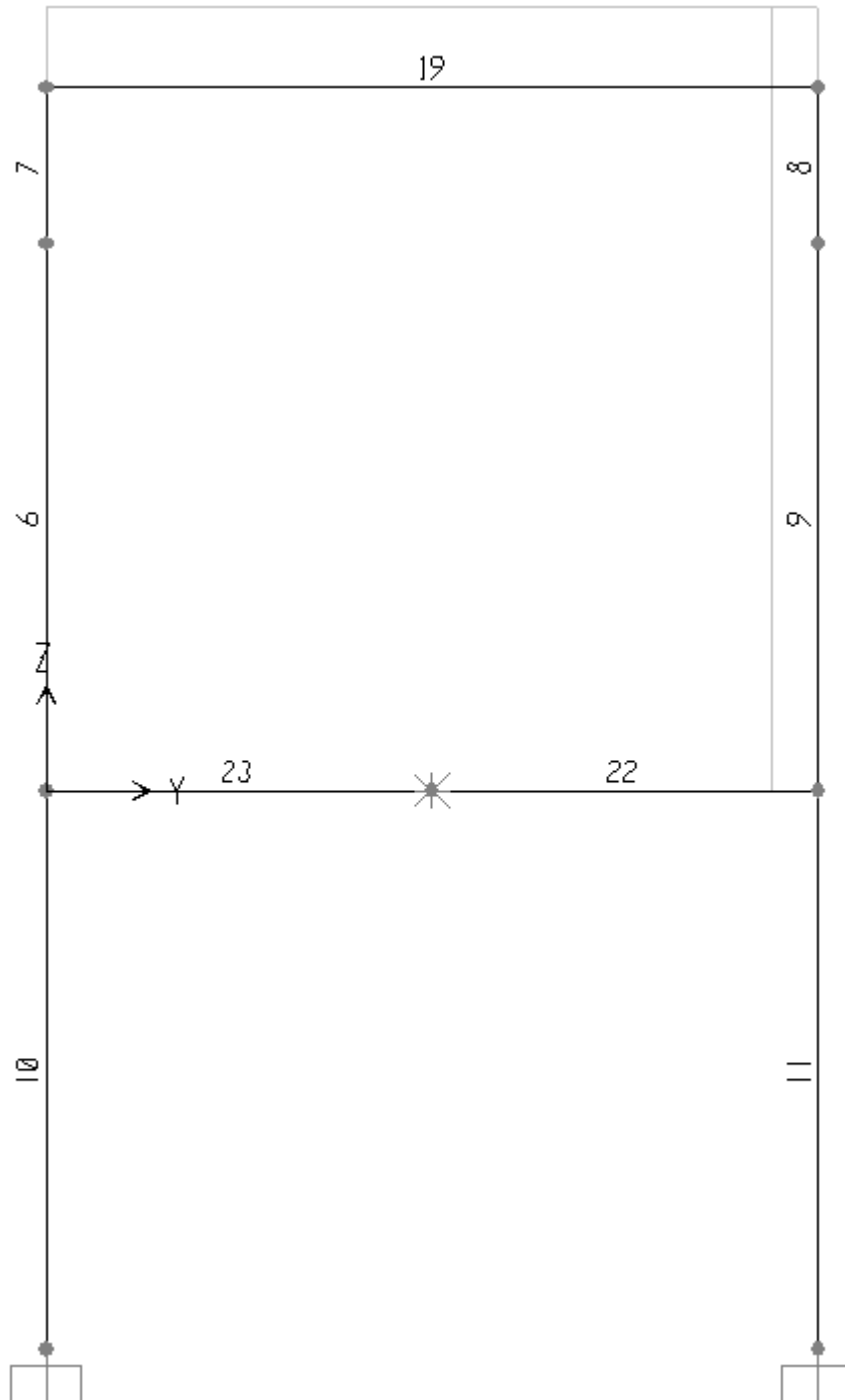


Figura 3.1 – Output grafico relativo alla modellazione adottata

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO					
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<table border="1" style="width: 100%;"> <tr> <td style="width: 50%;"><i>Rev</i></td> <td style="width: 50%;"><i>Data</i></td> </tr> <tr> <td>F0</td> <td>20/06/2011</td> </tr> </table>	<i>Rev</i>	<i>Data</i>	F0	20/06/2011
<i>Rev</i>	<i>Data</i>						
F0	20/06/2011						

7.2 Analisi dei carichi

7.2.1 Peso proprio strutturale

Il peso proprio degli elementi in calcestruzzo armato costituenti la spalla viene valutato come segue in ragione di 25 kN/m³:

$$\text{Soletta superiore} \quad p_{\text{sup}} = l_{\text{sup}} \cdot s_{\text{sup}} \cdot h_{\text{sup}} \cdot \gamma_c$$

$$\text{Soletta inferiore} \quad p_{\text{inf}} = l_{\text{inf}} \cdot b_{\text{inf}} \cdot h_{\text{inf}} \cdot \gamma_c$$

$$\text{Muri laterali} \quad p_A = l_A \cdot b_A \cdot h_A \cdot \gamma_c$$

Soletta superiore

$$p_{\text{sup}} = 6,90 \cdot 0,80 \cdot 1,00 \cdot 25 = 138 \text{ kN}$$

Soletta inferiore

$$p_{\text{inf}} = 5,50 \cdot 1,00 \cdot 1,00 \cdot 25 = 137 \text{ kN}$$

Muri laterali (pali)

$$p_{\text{lat}} = 1,00 \cdot 1,00 \cdot 3,14 \cdot 4 \cdot 4,90 \cdot 25 = 96 \text{ kN}$$

Cordoli

$$p_{\text{cor}} = 1,40 \cdot 1,00 \cdot 1,00 \cdot 25 = 35 \text{ kN}$$

7.2.2 Permanenti non strutturali.

Si distinguono nell'ordine le azioni permanenti dovute al terreno ed agenti sulla soletta superiore e sui muri laterali per effetto della spinta a riposo e della spinta attiva.

Allo scopo di valutare gli effetti del terreno sull'artefatto, sono state preposte alle analisi alcune ipotesi. Supponendo infatti che la realizzazione del sottopasso avvenga per fasi, attraverso un preliminare sbancamento del terreno e quindi un successivo getto dell'opera e tombamento, si è ritenuto lecito abbattere cautelativamente l'angolo d'attrito del terreno sino al valore riportato di seguito. Tale ipotesi è direttamente supportata dalla constatazione che la spinta agente sui muri laterali, deriverà non dal terreno in condizioni naturali ma da terreno di riporto. Tale scelta, in accordo con le argomentazioni appena fornite, è da ritenersi in ogni caso a favore di sicurezza.

Angolo di attrito del terreno laterale $\phi = 30^\circ$

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO	
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD	<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011

Peso specifico del terreno $\gamma_t = 19,00 \text{ kN/m}^3$
 Peso terreno sovrastante $q = 19 \cdot 2,77 = 52,63 \text{ KN/m}$

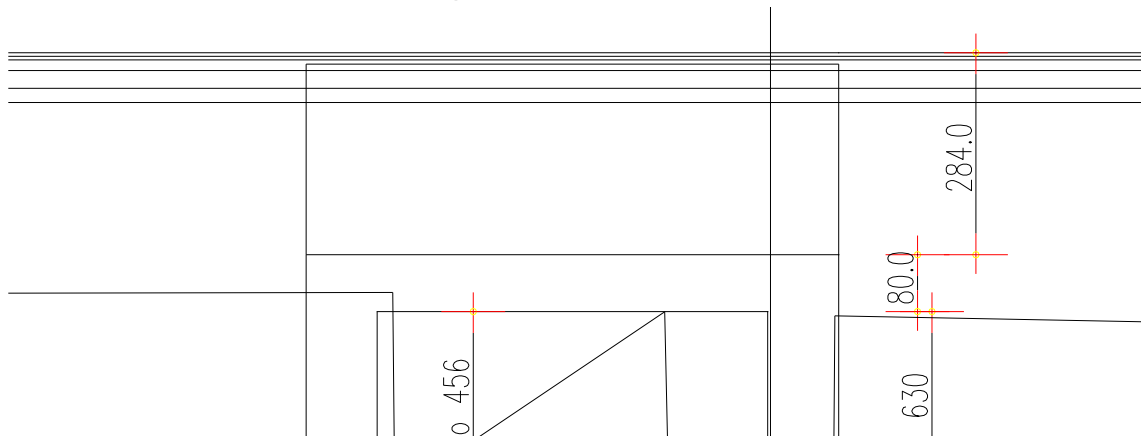


Figura 3.1 – Dettaglio terreno sovrastante la struttura

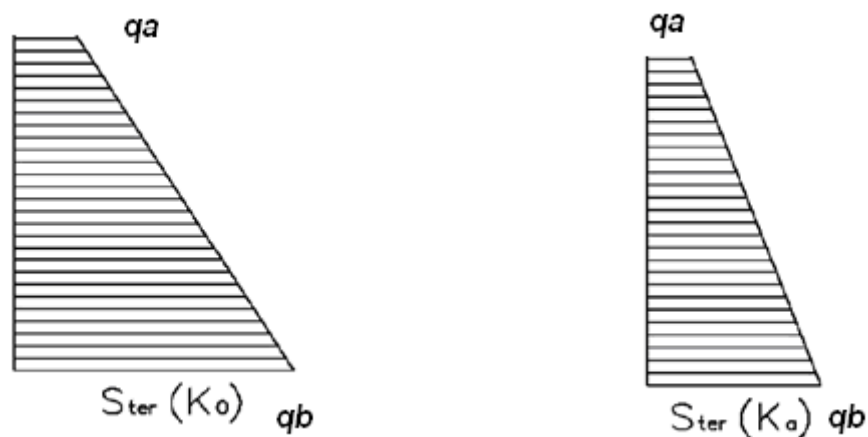


Figura 3.1 – Distribuzioni di pressioni adottate in condizioni di spinta a riposo ed attiva.

Per rappresentare la spinta del terreno agente sui muri laterali viene adottata, sia per il caso della spinta attiva che per la spinta a riposo una distribuzione delle pressioni di tipo trapezoidale. Tale scelta, alternativa alla normale distribuzione triangolare, è essenzialmente dovuta allo sfalsamento tra la quota del terreno e l'estradosso della soletta superiore. Le strisce di carico vengono quindi identificate attraverso l'elencazione di un valore superiore e uno inferiore.

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO					
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<table border="1" style="width: 100%; border-collapse: collapse;"> <thead> <tr> <th style="text-align: left;"><i>Rev</i></th> <th style="text-align: left;"><i>Data</i></th> </tr> </thead> <tbody> <tr> <td style="text-align: left;">F0</td> <td style="text-align: left;">20/06/2011</td> </tr> </tbody> </table>	<i>Rev</i>	<i>Data</i>	F0	20/06/2011
<i>Rev</i>	<i>Data</i>						
F0	20/06/2011						

Spinta terreno a riposo $q_{Oa} = k_0 \cdot \sigma_{va}$

$$q_{Ob} = k_0 \cdot \sigma_{vb}$$

Spinta del sovraccarico $q_{Aa} = k_A \cdot \sigma_{va}$

$$q_{Ab} = k_A \cdot \sigma_{vb}$$

Dove vengono adottati i seguenti valori

Coefficiente di spinta attiva: $k_a = 0,333$

Coefficiente di spinta a riposo: $k_0 = 0,5$

Spinta terreno a riposo cordoli $q_{Oa} = 0,5 \cdot 19 \cdot 2,77 = 26,31 \text{ KN/m}$

$$q_{Ob} = 0,5 \cdot 19 \cdot 4,17 = 39,61 \text{ KN/m}$$

Spinta terreno attiva cordoli $q_{Aa} = 0,33 \cdot 19 \cdot 2,77 = 17,36 \text{ KN/m}$

$$q_{Ab} = 0,33 \cdot 19 \cdot 4,17 = 26,14 \text{ KN/m}$$

Spinta terreno a riposo pali $q_{Oa} = 0,5 \cdot 19 \cdot 4,17 = 39,61 \text{ KN/m}$

$$q_{Ob} = 0,5 \cdot 19 \cdot 9,07 = 86,16 \text{ KN/m}$$

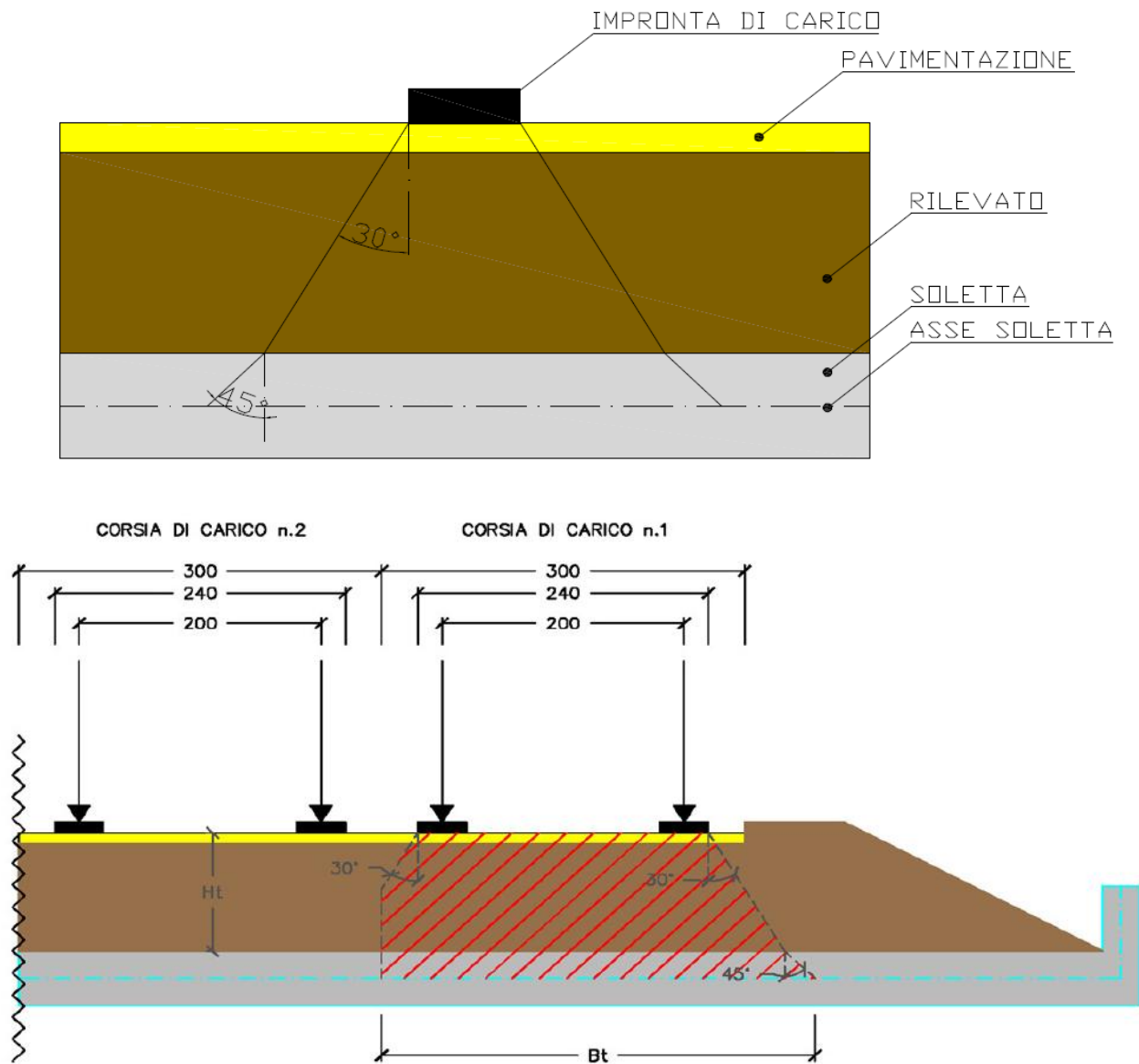
Spinta terreno attiva pali $q_{Aa} = 0,33 \cdot 19 \cdot 4,17 = 26,14 \text{ KN/m}$



$$q_{Ab} = 0,33 \cdot 19 \cdot 9,07 = 56,86 \text{ KN/m}$$

7.2.3 Accidentali da traffico

Sulla struttura scatolare, in aggiunta alle sollecitazioni appena elencate, agiranno i carichi accidentali da traffico, derivanti dalla sovrastruttura autostradale. Nello specifico tali azioni vengono preliminarmente diffuse attraverso il terreno, secondo le seguenti modalità.

per le strutture scatolari stradali la diffusione delle azioni accidentali verticali viene assunta pari a 30° nel terreno e pari a 45° nel calcestruzzo, limitandone la diffusione alla seconda colonna di carico:



		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO					
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<table border="1"> <tr> <td><i>Rev</i></td> <td><i>Data</i></td> </tr> <tr> <td>F0</td> <td>20/06/2011</td> </tr> </table>	<i>Rev</i>	<i>Data</i>	F0	20/06/2011
<i>Rev</i>	<i>Data</i>						
F0	20/06/2011						

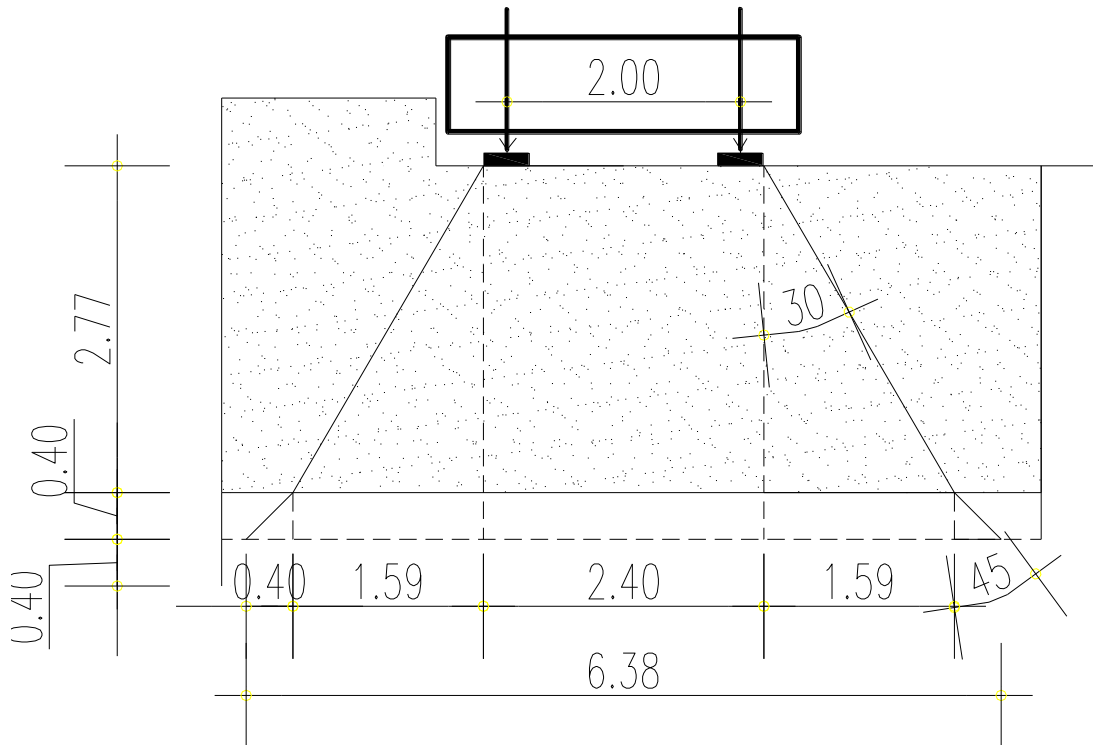


Figura 3.2 – Lunghezza di diffusione trasversalmente all’asse autostradale dei carichi da traffico.

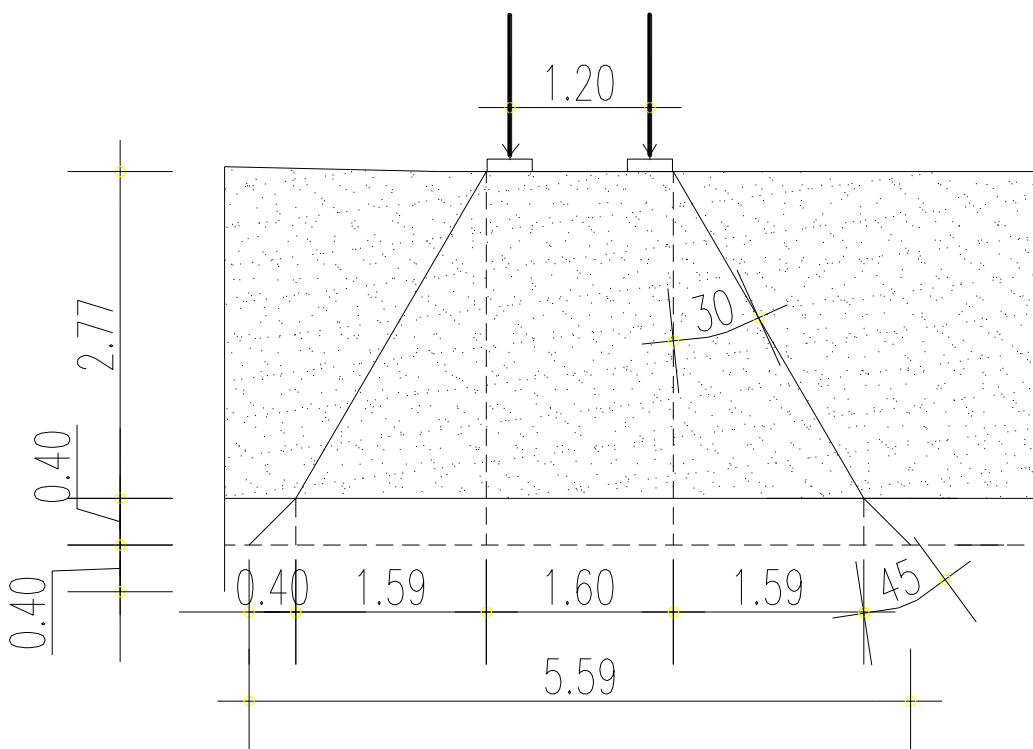


Figura 3.3– Lunghezza di diffusione longitudinalmente all’asse autostradale dei carichi da traffico.

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO	
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD	<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011

Come desumibile dagli schemi sopra riportati le lunghezze di diffusione del carico da traffico sono valutabili come:

Lunghezza di diffusione longitudinalmente all'asse autostradale:

$$L_{dL} = 2 \cdot (0.40 + 1,59) + 2,40 = 6,38 \text{ m}$$

Lunghezza di diffusione trasversalmente all'asse autostradale:

$$L_{dL} = 2 \cdot (0.40 + 1,59) + 1,60 = 5,59 \text{ m}$$

Sulla soletta superiore della struttura scatolare agirà quindi un carico distribuito per metro di spessore, pari a:

$$q_{\text{traff}} = \left(\frac{2 \cdot 300}{6,38 \cdot 5,59} + 9 \right) \cdot 1,00 = 25,82 \text{ KN/m/m}$$

In aggiunta al carico appena descritto sarà necessario tenere in considerazione l'eventuale partecipazione di un sovraccarico a tergo dovuto ad azioni concentrate.

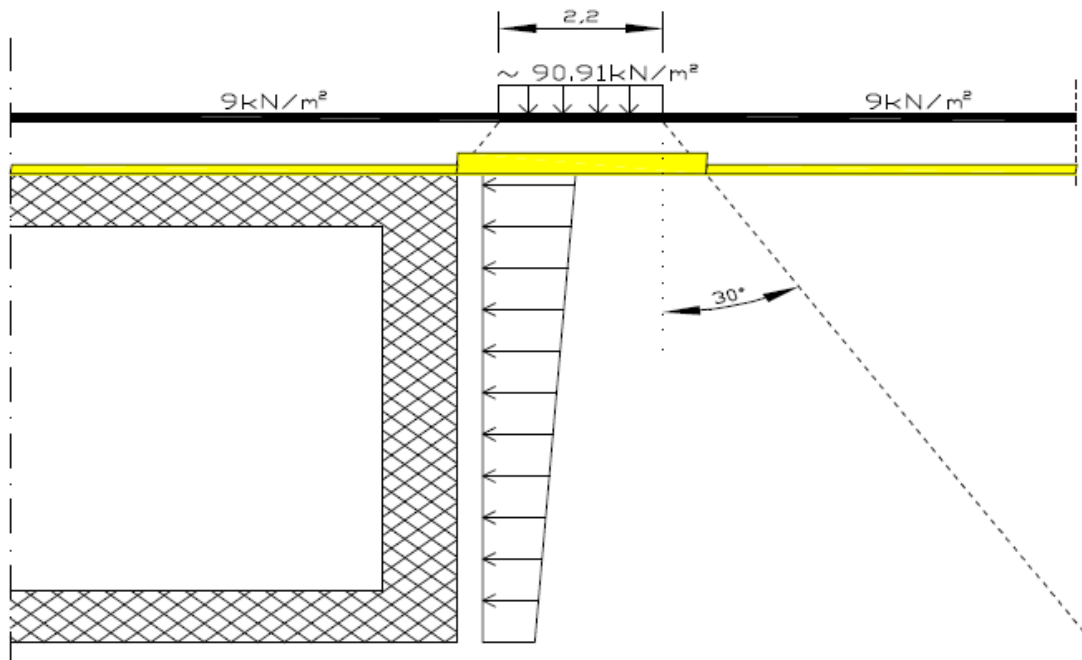


Figura 3.4– Schema di ripartizione della sollecitazione da sovraccarico concentrato.

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011

Esso assume un andamento trapezio lineare ribaltato simulando la diffusione del carico nel terreno.

Si individuano quindi vista la distribuzione due valori di pressioni, uno superiore ed uno inferiore.

Agenti sui CORDOLI:

$$q_{\text{sup}} = \frac{90,91 \cdot 2,2}{2,2 \cdot 1,59} = 52,77 \text{ KN/m/m}$$

$$q_{\text{inf}} = \frac{90,91 \cdot 2,2}{2,2 + 1,59 + 0,8} = 43,57 \text{ KN/m/m}$$

Agenti sui PALI LATERALI:

$$q_{\text{sup}} = \frac{90,91 \cdot 2,2}{2,2 + 1,59 + 0,8} = 43,57 \text{ KN/m/m}$$

$$q_{\text{inf}} = \frac{90,91 \cdot 2,2}{2,2 + 1,59 + 0,8 + 2,82} = 26,99 \text{ KN/m/m}$$

7.2.4 Carico da Frenamento

L'azione di frenamento dovuta al transito veicolare della struttura soprastante sarà assunta pari al minimo prescritto da normativa e sarà diretta trasversalmente alla sezione considerata.

Si precisa che per le strutture scatolari l'azione di frenamento sulla soletta superiore viene presa in considerazione, diffondendo l'azione sull'area di diffusione del carico dovuto all'LM1 (strutture stradali)

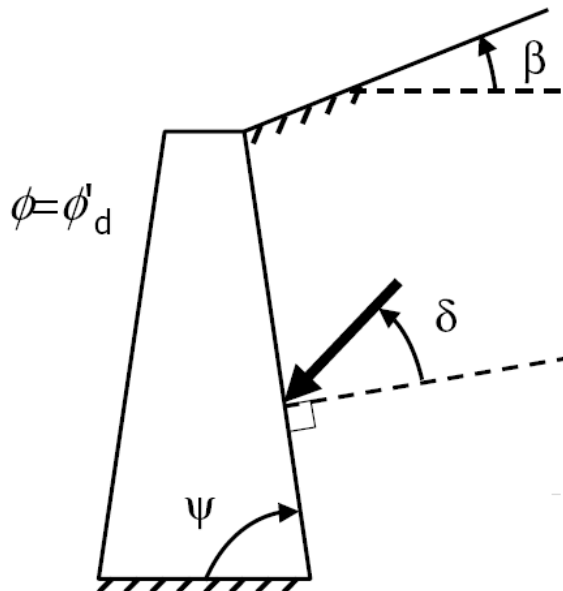
$$H_{\text{trasvMax}} = 180 \text{ KN}$$

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO	
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD	<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011

7.2.5 Determinazione della forza sismica orizzontale del terreno.

In accordo con quanto indicato nelle “Norme Tecniche 2008” al paragrafo 7.11.6.2.1, per le verifiche allo SLU si assume il coefficiente di spinta del terreno come segue, considerando in favore di sicurezza il coefficiente di riduzione dell’accelerazione β unitario.

La spinta attiva del terreno in condizioni sismiche può essere valutata attraverso la teoria di Mononobe-Okabe; con riferimento alla seguente figura:



Il valore della spinta attiva può essere valutato come:

$$P_{A,P} = \frac{1}{2} \cdot \gamma \cdot (1 \pm k_v) \cdot k_{A,P} \cdot H^2 \quad \text{avente punto di applicazione a quota pari ad } H/2.$$

Tale formulazione dipende quindi, oltre che dall’altezza H del terreno e dal peso specifico γ del terreno, dai parametri sismici del sito di seguito riassunti:

$$\frac{a_{\max}}{g} = 0,4373 \quad \text{accelerazione orizzontale massima attesa al sito}$$

$$S = S_s \cdot S_T = 1,00 \cdot 1,00 = 1,00 \quad \text{amplificazione per sottosuolo tipo C}$$

Mononobe-Okabe fornisce il valore della spinta attiva sismica:

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO					
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<table border="1" style="width: 100%; border-collapse: collapse;"> <thead> <tr> <th style="text-align: left;"><i>Rev</i></th> <th style="text-align: left;"><i>Data</i></th> </tr> </thead> <tbody> <tr> <td style="text-align: left;">F0</td> <td style="text-align: left;">20/06/2011</td> </tr> </tbody> </table>	<i>Rev</i>	<i>Data</i>	F0	20/06/2011
<i>Rev</i>	<i>Data</i>						
F0	20/06/2011						

$$k_{A,P} = \frac{\text{sen}^2(\psi + \phi - \theta)}{\cos\theta \cdot \text{sen}^2\psi \cdot \text{sen}(\psi - \theta - \delta) \cdot \left[1 + \sqrt{\frac{\text{sen}(\phi + \delta) \cdot \text{sen}(\phi - \beta - \theta)}{\text{sen}(\psi - \theta - \delta) \cdot \text{sen}(\psi + \beta)}} \right]^2}$$

dove:

$$\beta = 0 \leq \phi - \theta$$

$$\theta = \tan^{-1}\left(\frac{k_h}{1 \pm k_v}\right) = \begin{matrix} 0,345 \\ 0,510 \end{matrix}$$

$$k_h = \beta_s \cdot \frac{a_g}{g} \cdot S = 0,437$$

$$k_v = \frac{k_h}{2} = 0,219$$

$$\delta = \frac{2}{3} \cdot \phi = 25^\circ,33$$

Il valore del coefficiente sismico di spinta attiva vale quindi:

$$k_{A,P} = 0,876$$

Si ottiene quindi:

$$\text{Spinta sisma alla base: } P_{A,P} = \frac{1}{2} \cdot 19,00 \cdot (1 + 0,219) \cdot 0,876 \cdot 8,00^2 = 649 \text{ kN}$$

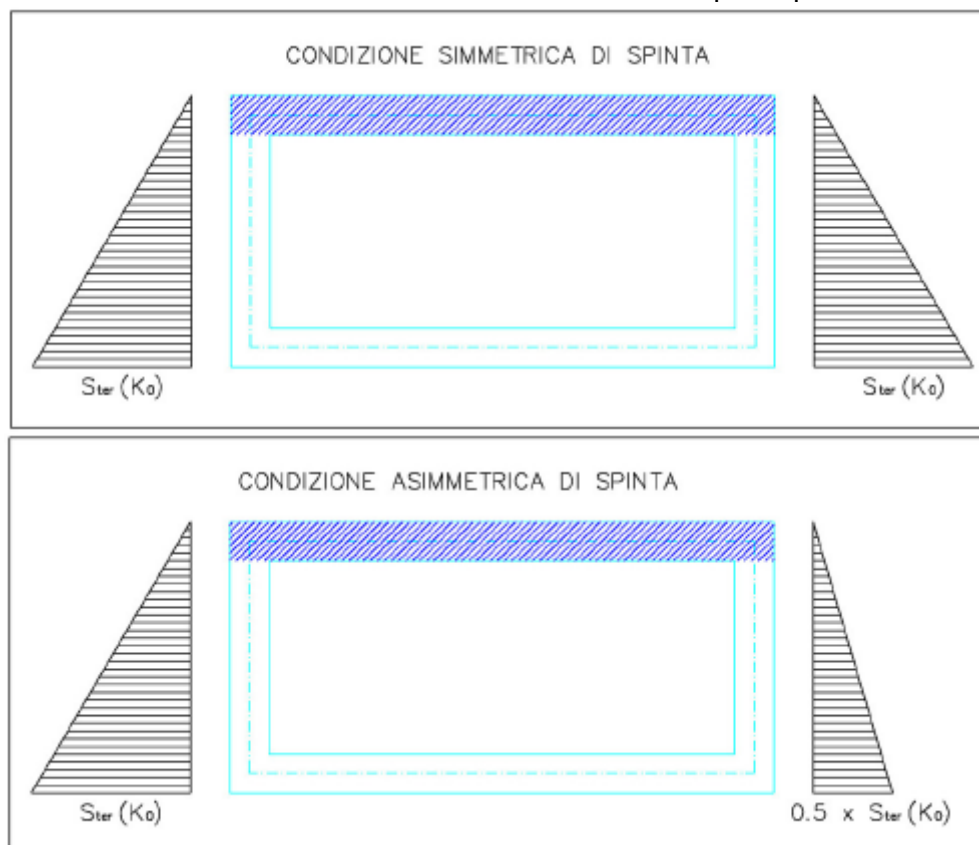
riferito ad un metro di profondità.

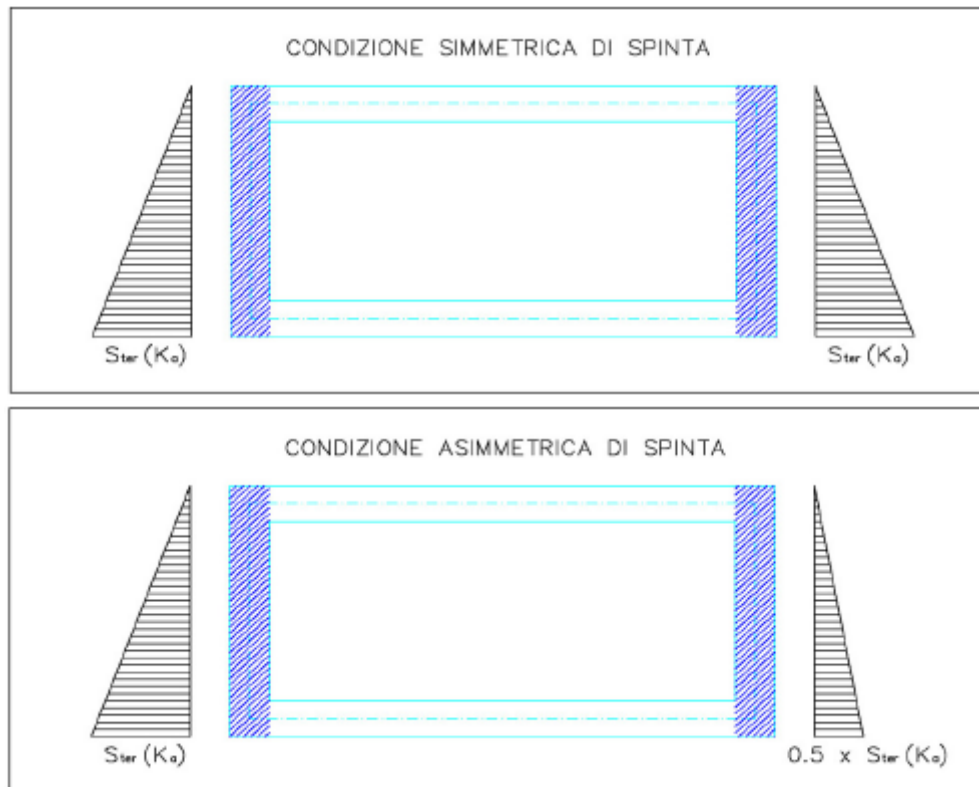
		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO					
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<table border="1" style="width: 100%; border-collapse: collapse;"> <tr> <td style="width: 50%;"><i>Rev</i></td> <td style="width: 50%;"><i>Data</i></td> </tr> <tr> <td>F0</td> <td>20/06/2011</td> </tr> </table>	<i>Rev</i>	<i>Data</i>	F0	20/06/2011
<i>Rev</i>	<i>Data</i>						
F0	20/06/2011						

7.3 Schemi di carico delle spinte del terreno.

Statiche



In fase statica deve essere valutata sia la condizione di spinta "attiva" che di spinta a "riposo", inoltre deve essere valutata anche la possibilità di uno squilibrio delle spinte dovuta a una diversa compattazione del rilevato; in particolare per massimizzare le sollecitazioni in soletta si utilizza il coefficiente di spinta attiva su entrambe le pareti dello scatolare, mentre per massimizzare le sollecitazioni ai nodi e sulle pareti si utilizza il coefficiente di spinta a riposo su entrambe le pareti dello scatolare. Inoltre, al fine di valutare gli effetti di eventuali sbilanciamenti di carico (dovuti a diversi gradi di compattazione del terreno a destra e sinistra dello scatolare), la spinta sulla parete di destra viene ridotta in fase di combinazione con un coefficiente posto pari a 0.50.

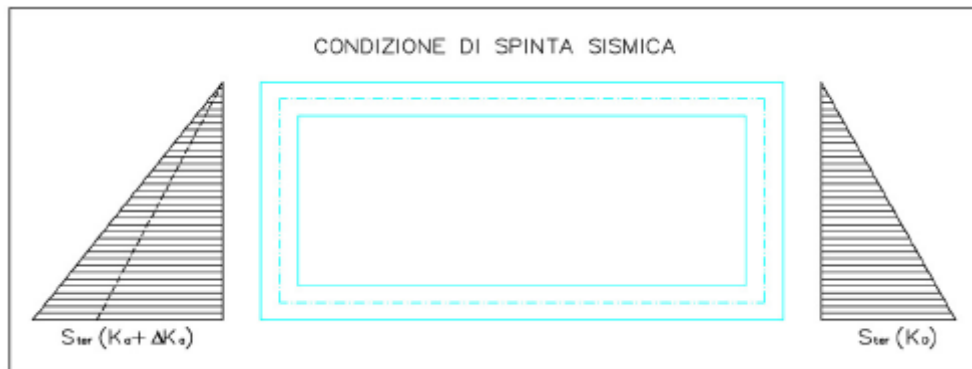




Sismiche

In fase sismica si considera la spinta statica "attiva" (nella direzione concorde all'azione sismica) e si considera (a favore di sicurezza) la spinta a "riposo" dal lato opposto all'applicazione di incremento sismico di spinta; durante il sisma (sisma da sinistra verso destra) si suppone che nel terreno si generi uno stato di spinta attiva sulla parete di sinistra e uno stato di parziale spinta passiva sulla parete di destra: analiticamente si carica la parete di sinistra con la spinta attiva in fase sismica (con il coefficiente di spinta attiva pari a $K_a = K_{a,statica} + S K_{a,sismica}$) e la parete di destra, a favore di sicurezza, con la spinta a riposo (simulando pertanto il fatto che la reazione non mobiliti per intero la spinta passiva).

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO	
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD	<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011



		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011

8 VERIFICHE DI RESISTENZA

Di seguito si procederà eseguendo le opportune verifiche di resistenza, prescritte dalla norma di riferimento, nelle sezioni più sollecitate dello scotolare. In particolare le tensioni massime agenti sulla struttura verranno dedotte avvalendosi della modellazione precedentemente descritta, sottoposta alle sollecitazioni ricapitolate a monte di questo capitolo.

8.1 COMBINAZIONE DELLE SOLLECITAZIONI

Vengono innanzitutto presentate le diverse combinazioni utilizzate per la valutazione delle sollecitazioni.

		Combinazione	Coefficienti moltiplicativi delle sollecitazioni								
			A	B	C	D	E	F	G	H	I
S L U	S T R	Comb 1	1,3	1,5	1,35	1,35	0	0	1,5	1,5	0
		Comb 2	1,3	1,5	1,35	1,35	0	0	1,5	0,75	0
		Comb 3	1,3	1,5	1,35	1,35	1,5	1,5	0	0	0
		Comb 4	1,3	1,5	1,35	1,35	1,5	0,75	0	0	0
		Comb 6	1,3	1,5	1,35	1,35	0	0	0	0	0
	Sisma	Comb 5	1	1	0,2	0,2	0	0	1	0	1
	G E O	Comb 7	1	1,3	1,15	1,15	0	0	1,3	1,3	0
		Comb 8	1	1,3	1,15	1,15	0	0	1,3	0,65	0
		Comb 9	1	1,3	1,15	1,15	1,3	1,3	1	0	0
		Comb 10	1	1,3	1,15	1,15	1,3	0,65	1	0	0
		Comb 11	1	1,3	1,15	1,15	0	0	1	0	0

S L E	Frequente	Comb 12	1	1	0,75	0,75	0	0	1	1	0
	Quasi Per	Comb 13	1	1	0	0	0	0	1	1	0
	Frequente	Comb 14	1	1	0,75	0,75	0	0	1	0,5	0
	Quasi Per	Comb 15	1	1	0	0	0	0	1	0,5	0
	Frequente	Comb 16	1	1	0,75	0,75	1	1	0	0	0
	Quasi Per	Comb 17	1	1	0	0	1	1	0	0	0
	Frequente	Comb 18	1	1	0,75	0,75	1	0,5	0	0	0
	Quasi Per	Comb 19	1	1	0	0	1	0,5	0	0	0
	Frequente	Comb 20	1	1	0,75	0,75	0	0	0	0	0
	Quasi Per	Comb 21	1	1	0	0	0	0	0	0	0

Dove nella tabella soprastante vengono utilizzate le seguenti indicizzazioni per l'identificazione

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011

delle diverse nature di sollecitazioni.

A = Pesi propri strutturali;

B = Permanenti non strutturali;

C = Accidentali da traffico;

D = Incremento di spinta per sovraccarico concentrato;

E = Spinta a riposo del terreno sul muro sinistro;

F = Spinta a riposo del terreno sul muro destro;

G = Spinta attiva del terreno sul muro sinistro;

H = Spinta attiva del terreno sul muro destro;

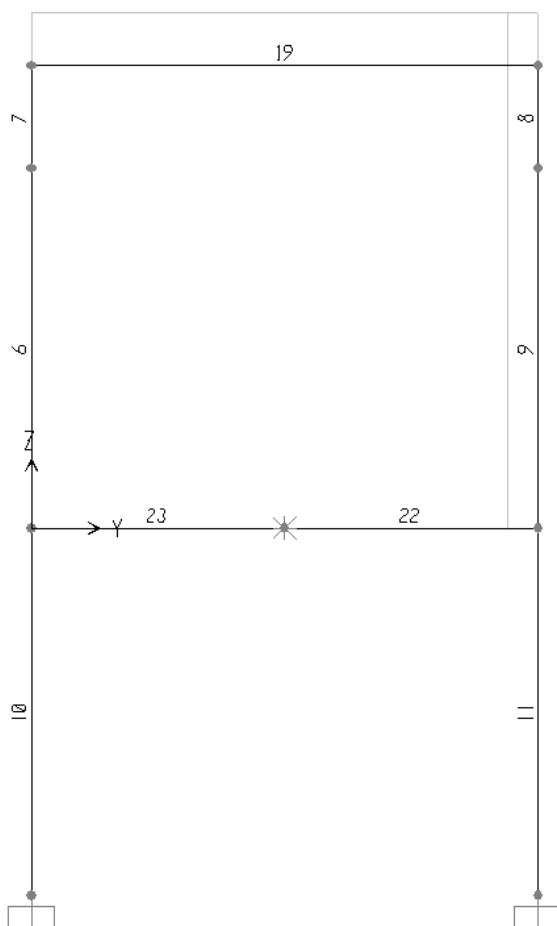
I = Incremento di spinta del terreno sul muro sinistro dovuto al sisma secondo le teorie di Mononobe - Okabe;

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011

8.2 MASSIME SOLLECITAZIONI

Con riferimento all'indicizzazione di seguito riportata vengono elencati i risultati delle analisi svolte, ottenuti come output numerico del software di calcolo strutturale utilizzato.

Vengono in oltre individuati per ogni asta i valori sollecitanti di massimo positivo e massimo negativo utilizzati nel proseguo per la redazione delle verifiche di rito.



ASTA 6

SLU

TABLE: Element Forces - Frames

Frame	Station	OutputCase	CaseType	P	V2	V3	T	M2	M3
Text	m	Text	Text	KN	KN	KN	KN-m	KN-m	KN-m
6	0	COMB1	Combination	-727,684	47,826	-2,896E-15	-1,112E-16	1,315E-14	-215,7264
6	2,45	COMB1	Combination	-668,741	-132,911	7,926E-15	-1,112E-16	6,303E-15	-99,9719

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011

6	4,9	COMB1	Combination	-609,798	-257,199	1,537E-14	-1,112E-16	-2,292E-14	389,4381
6	0	COMB2	Combination	-754,288	-94,746	5,629E-15	-1,527E-16	2,357E-14	-388,1647
6	2,45	COMB2	Combination	-695,345	-185,115	1,104E-14	-1,527E-16	2,805E-15	-39,5726
6	4,9	COMB2	Combination	-636,402	-247,259	1,476E-14	-1,527E-16	-2,915E-14	495,8472
6	0	COMB3	Combination	-727,684	160,98	-9,671E-15	-1,112E-16	8,584E-15	-139,3854
6	2,45	COMB3	Combination	-668,741	-112,891	6,727E-15	-1,112E-16	1,114E-14	-180,8308
6	4,9	COMB3	Combination	-609,798	-301,225	1,8E-14	-1,112E-16	-2,02E-14	343,9246
6	0	COMB4	Combination	-767,998	-55,061	3,246E-15	-1,74E-16	2,436E-14	-400,6846
6	2,45	COMB4	Combination	-709,055	-191,996	1,145E-14	-1,74E-16	5,844E-15	-89,3079
6	4,9	COMB4	Combination	-650,112	-286,163	1,708E-14	-1,74E-16	-2,963E-14	505,1692
6	0	COMB5	Combination	-467,195	80,554	-4,854E-15	-1,062E-16	1,221E-14	-200,0832
6	2,45	COMB5	Combination	-421,854	-102,027	6,078E-15	-1,062E-16	1,001E-14	-162,1363
6	4,9	COMB5	Combination	-376,513	-227,583	1,36E-14	-1,062E-16	-1,478E-14	253,2778
6	0	COMB6	Combination	-727,684	-171,762	1,025E-14	-1,112E-16	2,202E-14	-363,8738
6	2,45	COMB6	Combination	-668,741	-171,762	1,025E-14	-1,112E-16	-3,093E-15	56,943
6	4,9	COMB6	Combination	-609,798	-171,762	1,025E-14	-1,112E-16	-2,821E-14	477,7598
6	0	COMB7	Combination	-602,228	44,533	-2,694E-15	-9,475E-17	1,103E-14	-180,8693
6	2,45	COMB7	Combination	-556,888	-112,105	6,685E-15	-9,475E-17	5,545E-15	-88,1051
6	4,9	COMB7	Combination	-511,547	-219,822	1,313E-14	-9,475E-17	-1,933E-14	328,494
6	0	COMB8	Combination	-625,285	-79,029	4,694E-15	-1,307E-16	2,006E-14	-330,3158
6	2,45	COMB8	Combination	-579,944	-157,348	9,383E-15	-1,307E-16	2,514E-15	-35,759
6	4,9	COMB8	Combination	-534,604	-211,207	1,261E-14	-1,307E-16	-2,472E-14	420,7152
6	0	COMB9	Combination	-602,228	142,6	-8,566E-15	-9,475E-17	7,071E-15	-114,7071
6	2,45	COMB9	Combination	-556,888	-94,754	5,646E-15	-9,475E-17	9,741E-15	-158,1828
6	4,9	COMB9	Combination	-511,547	-257,978	1,542E-14	-9,475E-17	-1,697E-14	289,049
6	0	COMB10	Combination	-637,167	-44,635	2,629E-15	-1,492E-16	2,075E-14	-341,1664
6	2,45	COMB10	Combination	-591,827	-163,312	9,735E-15	-1,492E-16	5,147E-15	-78,8629
6	4,9	COMB10	Combination	-546,486	-244,924	1,462E-14	-1,492E-16	-2,514E-14	428,7943
6	0	COMB11	Combination	-602,228	-145,776	8,701E-15	-9,475E-17	1,872E-14	-309,2637
6	2,45	COMB11	Combination	-556,888	-145,776	8,701E-15	-9,475E-17	-2,597E-15	47,8879
6	4,9	COMB11	Combination	-511,547	-145,776	8,701E-15	-9,475E-17	-2,391E-14	405,0394

MIN P	-367,568
MAX P	-767,998
MAX V2 positivo	160,98
MAX V2 negativo	-301,225
MAX M3 positivo	505,1692
MAX M3 negativo	-400,685

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011

SLE

TABLE: Element Forces
- Frames

Frame	Station	OutputCase	CaseType	P	V2	V3	T	M2	M3
Text	m	Text	Text	KN	KN	KN	KN-m	KN-m	KN-m
6	0	COMB12	Combination	-490,614	42,129	0	0	0	-114,9008
6	2,45	COMB12	Combination	-445,273	-78,362	0	0	0	-62,8331
6	4,9	COMB12	Combination	-399,933	-161,221	0	0	0	238,3385
6	0	COMB13	Combination	-383,473	101,287	0	0	0	40,0124
6	2,45	COMB13	Combination	-338,132	-19,204	0	0	0	-52,8572
6	4,9	COMB13	Combination	-292,791	-102,063	0	0	0	103,377
6	0	COMB14	Combination	-508,35	-52,919	0	0	0	-229,8597
6	2,45	COMB14	Combination	-463,01	-113,164	0	0	0	-22,5669
6	4,9	COMB14	Combination	-417,669	-154,594	0	0	0	309,2778
6	0	COMB15	Combination	-401,209	6,24	0	0	0	-74,9465
6	2,45	COMB15	Combination	-355,868	-54,006	0	0	0	-12,591
6	4,9	COMB15	Combination	-310,527	-95,435	0	0	0	174,3164
6	0	COMB16	Combination	-490,614	117,565	0	0	0	-64,0068
6	2,45	COMB16	Combination	-445,273	-65,015	0	0	0	-116,739
6	4,9	COMB16	Combination	-399,933	-190,571	0	0	0	207,9961
6	0	COMB17	Combination	-383,473	176,723	0	0	0	90,9064
6	2,45	COMB17	Combination	-338,132	-5,857	0	0	0	-106,7631
6	4,9	COMB17	Combination	-292,791	-131,413	0	0	0	73,0346
6	0	COMB18	Combination	-517,49	-26,462	0	0	0	-238,2063
6	2,45	COMB18	Combination	-472,15	-117,752	0	0	0	-55,7237
6	4,9	COMB18	Combination	-426,809	-180,53	0	0	0	315,4925
6	0	COMB19	Combination	-410,349	32,696	0	0	0	-83,2931
6	2,45	COMB19	Combination	-365,008	-58,594	0	0	0	-45,7478
6	4,9	COMB19	Combination	-319,668	-121,372	0	0	0	180,531
6	0	COMB20	Combination	-490,614	-104,262	0	0	0	-213,6657
6	2,45	COMB20	Combination	-445,273	-104,262	0	0	0	41,7769
6	4,9	COMB20	Combination	-399,933	-104,262	0	0	0	297,2195
6	0	COMB21	Combination	-383,473	-45,104	0	0	0	-58,7525
6	2,45	COMB21	Combination	-338,132	-45,104	0	0	0	51,7528
6	4,9	COMB21	Combination	-292,791	-45,104	0	0	0	162,2581

MIN P	-292,791
MAX P	-517,49
MAX V2 positivo	176,723
MAX V2 negativo	-190,571
MAX M3 positivo	315,4925
MAX M3 negativo	-238,206

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011

ASTA 7

SLU

TABLE: Element Forces - Frames

Frame	Station	OutputCase	CaseType	P	V2	V3	T	M2	M3
Text	m	Text	Text	KN	KN	KN	KN-m	KN-m	KN-m
7	0	COMB1	Combination	-609,798	-257,199	1,537E-14	-1,112E-16	-2,292E-14	389,4381
7	0,7	COMB1	Combination	-579,778	-282,342	1,687E-14	-1,112E-16	-3,422E-14	578,5464
7	1,4	COMB1	Combination	-549,759	-302,874	1,81E-14	-1,112E-16	-4,648E-14	783,641
7	0	COMB2	Combination	-636,402	-247,259	1,476E-14	-1,527E-16	-2,915E-14	495,8472
7	0,7	COMB2	Combination	-606,383	-259,83	1,551E-14	-1,527E-16	-3,975E-14	673,4627
7	1,4	COMB2	Combination	-576,363	-270,096	1,613E-14	-1,527E-16	-5,083E-14	859,0714
7	0	COMB3	Combination	-609,798	-301,225	1,8E-14	-1,112E-16	-2,02E-14	343,9246
7	0,7	COMB3	Combination	-579,778	-339,324	2,028E-14	-1,112E-16	-3,362E-14	568,5243
7	1,4	COMB3	Combination	-549,759	-370,441	2,215E-14	-1,112E-16	-4,85E-14	817,3496
7	0	COMB4	Combination	-650,112	-286,163	1,708E-14	-1,74E-16	-2,963E-14	505,1692
7	0,7	COMB4	Combination	-620,093	-305,213	1,822E-14	-1,74E-16	-4,2E-14	712,3546
7	1,4	COMB4	Combination	-590,073	-320,771	1,916E-14	-1,74E-16	-5,509E-14	931,6528
7	0	COMB5	Combination	-376,513	-227,583	1,36E-14	-1,062E-16	-1,478E-14	253,2778
7	0,7	COMB5	Combination	-353,421	-252,982	1,512E-14	-1,062E-16	-2,485E-14	421,7473
7	1,4	COMB5	Combination	-330,329	-273,727	1,636E-14	-1,062E-16	-3,588E-14	606,3671
7	0	COMB6	Combination	-609,798	-171,762	1,025E-14	-1,112E-16	-2,821E-14	477,7598
7	0,7	COMB6	Combination	-579,778	-171,762	1,025E-14	-1,112E-16	-3,539E-14	597,9931
7	1,4	COMB6	Combination	-549,759	-171,762	1,025E-14	-1,112E-16	-4,256E-14	718,2265
7	0	COMB7	Combination	-511,547	-219,822	1,313E-14	-9,475E-17	-1,933E-14	328,494
7	0,7	COMB7	Combination	-488,455	-241,612	1,444E-14	-9,475E-17	-2,9E-14	490,2289
7	1,4	COMB7	Combination	-465,363	-259,407	1,55E-14	-9,475E-17	-3,949E-14	665,8186
7	0	COMB8	Combination	-534,604	-211,207	1,261E-14	-1,307E-16	-2,472E-14	420,7152
7	0,7	COMB8	Combination	-511,512	-222,102	1,326E-14	-1,307E-16	-3,379E-14	572,4897
7	1,4	COMB8	Combination	-488,42	-230,999	1,379E-14	-1,307E-16	-4,326E-14	731,1916
7	0	COMB9	Combination	-511,547	-257,978	1,542E-14	-9,475E-17	-1,697E-14	289,049
7	0,7	COMB9	Combination	-488,455	-290,997	1,74E-14	-9,475E-17	-2,848E-14	481,5431
7	1,4	COMB9	Combination	-465,363	-317,965	1,901E-14	-9,475E-17	-4,124E-14	695,0327
7	0	COMB10	Combination	-546,486	-244,924	1,462E-14	-1,492E-16	-2,514E-14	428,7943
7	0,7	COMB10	Combination	-523,394	-261,434	1,561E-14	-1,492E-16	-3,573E-14	606,196
7	1,4	COMB10	Combination	-500,302	-274,918	1,642E-14	-1,492E-16	-4,695E-14	794,0955
7	0	COMB11	Combination	-511,547	-145,776	8,701E-15	-9,475E-17	-2,391E-14	405,0394
7	0,7	COMB11	Combination	-488,455	-145,776	8,701E-15	-9,475E-17	-3,001E-14	507,0827
7	1,4	COMB11	Combination	-465,363	-145,776	8,701E-15	-9,475E-17	-3,61E-14	609,126

MIN P	-321,384
MAX P	-650,112
MAX V2 positivo	-145,776
MAX V2 negativo	-370,441
MAX M3 positivo	931,6528

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011

MAX M3 negativo	213,3991
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SLE

**TABLE: Element Forces
- Frames**

Frame	Station	OutputCase	CaseType	P	V2	V3	T	M2	M3
Text	m	Text	Text	KN	KN	KN	KN-m	KN-m	KN-m
7	0	COMB12	Combination	-399,933	-161,221	0	0	0	238,3385
7	0,7	COMB12	Combination	-376,841	-177,982	0	0	0	357,2387
7	1,4	COMB12	Combination	-353,749	-191,671	0	0	0	486,7964
7	0	COMB13	Combination	-292,791	-102,063	0	0	0	103,377
7	0,7	COMB13	Combination	-269,7	-118,824	0	0	0	180,8666
7	1,4	COMB13	Combination	-246,608	-132,513	0	0	0	269,0136
7	0	COMB14	Combination	-417,669	-154,594	0	0	0	309,2778
7	0,7	COMB14	Combination	-394,577	-162,974	0	0	0	420,5162
7	1,4	COMB14	Combination	-371,485	-169,819	0	0	0	537,0834
7	0	COMB15	Combination	-310,527	-95,435	0	0	0	174,3164
7	0,7	COMB15	Combination	-287,436	-103,816	0	0	0	244,1441
7	1,4	COMB15	Combination	-264,344	-110,66	0	0	0	319,3006
7	0	COMB16	Combination	-399,933	-190,571	0	0	0	207,9961
7	0,7	COMB16	Combination	-376,841	-215,971	0	0	0	350,5572
7	1,4	COMB16	Combination	-353,749	-236,715	0	0	0	509,2688
7	0	COMB17	Combination	-292,791	-131,413	0	0	0	73,0346
7	0,7	COMB17	Combination	-269,7	-156,813	0	0	0	174,1851
7	1,4	COMB17	Combination	-246,608	-177,557	0	0	0	291,486
7	0	COMB18	Combination	-426,809	-180,53	0	0	0	315,4925
7	0,7	COMB18	Combination	-403,717	-193,23	0	0	0	446,4441
7	1,4	COMB18	Combination	-380,625	-203,602	0	0	0	585,471
7	0	COMB19	Combination	-319,668	-121,372	0	0	0	180,531
7	0,7	COMB19	Combination	-296,576	-134,072	0	0	0	270,072
7	1,4	COMB19	Combination	-273,484	-144,444	0	0	0	367,6882
7	0	COMB20	Combination	-399,933	-104,262	0	0	0	297,2195
7	0,7	COMB20	Combination	-376,841	-104,262	0	0	0	370,2031
7	1,4	COMB20	Combination	-353,749	-104,262	0	0	0	443,1868
7	0	COMB21	Combination	-292,791	-45,104	0	0	0	162,2581
7	0,7	COMB21	Combination	-269,7	-45,104	0	0	0	193,831
7	1,4	COMB21	Combination	-246,608	-45,104	0	0	0	225,404

MIN P	-246,608
MAX P	-426,809
MAX V2 positivo	-45,104
MAX V2 negativo	-236,715
MAX M3 positivo	585,471
MAX M3 negativo	73,0346

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011

ASTA 8

SLU

TABLE: Element Forces - Frames

Frame	Station	OutputCase	CaseType	P	V2	V3	T	M2	M3
Text	m	Text	Text	KN	KN	KN	KN-m	KN-m	KN-m
8	0	COMB1	Combination	-404,564	302,874	-1,817E-14	-1,112E-16	-1,737E-14	282,7169
8	0,7	COMB1	Combination	-434,583	234,648	-1,408E-14	-1,112E-16	-6,081E-15	94,5689
8	1,4	COMB1	Combination	-464,603	166,158	-9,981E-15	-1,112E-16	2,342E-15	-45,7284
8	0	COMB2	Combination	-377,96	270,096	-1,622E-14	-1,527E-16	-1,106E-14	174,5793
8	0,7	COMB2	Combination	-407,979	201,869	-1,213E-14	-1,527E-16	-1,136E-15	9,3759
8	1,4	COMB2	Combination	-437,998	133,38	-8,03E-15	-1,527E-16	5,921E-15	-107,9767
8	0	COMB3	Combination	-404,564	370,441	-2,221E-14	-1,112E-16	-1,939E-14	316,4255
8	0,7	COMB3	Combination	-434,583	291,63	-1,749E-14	-1,112E-16	-5,481E-15	84,5467
8	1,4	COMB3	Combination	-464,603	210,184	-1,262E-14	-1,112E-16	5,067E-15	-91,242
8	0	COMB4	Combination	-364,249	320,771	-1,926E-14	-1,74E-16	-9,825E-15	152,5607
8	0,7	COMB4	Combination	-394,269	241,96	-1,454E-14	-1,74E-16	2,012E-15	-44,5492
8	1,4	COMB4	Combination	-424,288	160,514	-9,661E-15	-1,74E-16	1,049E-14	-185,569
8	0	COMB5	Combination	-198,518	273,727	-1,642E-14	-1,062E-16	-9,502E-15	151,6173
8	0,7	COMB5	Combination	-221,61	266,661	-1,6E-14	-1,062E-16	1,842E-15	-37,481
8	1,4	COMB5	Combination	-244,701	260,239	-1,561E-14	-1,062E-16	1,29E-14	-221,8586
8	0	COMB6	Combination	-404,564	171,762	-1,032E-14	-1,112E-16	-1,345E-14	217,3024
8	0,7	COMB6	Combination	-434,583	124,068	-7,461E-15	-1,112E-16	-7,245E-15	114,0156
8	1,4	COMB6	Combination	-464,603	80,721	-4,865E-15	-1,112E-16	-2,946E-15	42,5932
8	0	COMB7	Combination	-341,678	259,407	-1,556E-14	-9,475E-17	-1,469E-14	239,1055
8	0,7	COMB7	Combination	-364,77	200,984	-1,206E-14	-9,475E-17	-5,024E-15	77,9518
8	1,4	COMB7	Combination	-387,862	142,268	-8,546E-15	-9,475E-17	2,19E-15	-42,2034
8	0	COMB8	Combination	-318,621	230,999	-1,387E-14	-1,307E-16	-9,223E-15	145,3862
8	0,7	COMB8	Combination	-341,713	172,576	-1,037E-14	-1,307E-16	-7,385E-16	4,1179
8	1,4	COMB8	Combination	-364,805	113,861	-6,855E-15	-1,307E-16	5,292E-15	-96,1519
8	0	COMB9	Combination	-341,678	317,965	-1,907E-14	-9,475E-17	-1,644E-14	268,3196
8	0,7	COMB9	Combination	-364,77	250,369	-1,502E-14	-9,475E-17	-4,504E-15	69,2659
8	1,4	COMB9	Combination	-387,862	180,424	-1,083E-14	-9,475E-17	4,551E-15	-81,6485
8	0	COMB10	Combination	-306,739	274,918	-1,65E-14	-1,492E-16	-8,154E-15	126,3035
8	0,7	COMB10	Combination	-329,831	207,321	-1,246E-14	-1,492E-16	1,99E-15	-42,6172
8	1,4	COMB10	Combination	-352,923	137,377	-8,269E-15	-1,492E-16	9,252E-15	-163,3986
8	0	COMB11	Combination	-341,678	145,776	-8,756E-15	-9,475E-17	-1,13E-14	182,4129
8	0,7	COMB11	Combination	-364,77	105,148	-6,323E-15	-9,475E-17	-6,033E-15	94,8056
8	1,4	COMB11	Combination	-387,862	68,222	-4,112E-15	-9,475E-17	-2,394E-15	34,342

MIN P	-207,463
MAX P	-464,603
MAX V2 positivo	370,441
MAX V2 negativo	68,222
MAX M3 positivo	316,4255
MAX M3 negativo	-221,85

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011

SLE
TABLE: Element Forces
- Frames

Frame	Station	OutputCase	CaseType	P	V2	V3	T	M2	M3
Text	m	Text	Text	KN	KN	KN	KN-m	KN-m	KN-m
8	0	COMB12	Combination	-273,085	191,671	0	0	0	208,5053
8	0,7	COMB12	Combination	-296,177	151,485	0	0	0	88,3623
8	1,4	COMB12	Combination	-319,269	110,642	0	0	0	-3,4208
8	0	COMB13	Combination	-246,608	132,513	0	0	0	269,0136
8	0,7	COMB13	Combination	-269,7	118,824	0	0	0	180,8666
8	1,4	COMB13	Combination	-292,791	102,063	0	0	0	103,377
8	0	COMB14	Combination	-255,349	169,819	0	0	0	136,4135
8	0,7	COMB14	Combination	-278,441	129,633	0	0	0	31,567
8	1,4	COMB14	Combination	-301,533	88,79	0	0	0	-44,9196
8	0	COMB15	Combination	-228,872	110,66	0	0	0	196,9219
8	0,7	COMB15	Combination	-251,964	96,972	0	0	0	124,0713
8	1,4	COMB15	Combination	-275,055	80,21	0	0	0	61,8781
8	0	COMB16	Combination	-273,085	236,715	0	0	0	230,9776
8	0,7	COMB16	Combination	-296,177	189,474	0	0	0	81,6808
8	1,4	COMB16	Combination	-319,269	139,993	0	0	0	-33,7631
8	0	COMB17	Combination	-246,608	177,557	0	0	0	291,486
8	0,7	COMB17	Combination	-269,7	156,813	0	0	0	174,1851
8	1,4	COMB17	Combination	-292,791	131,413	0	0	0	73,0346
8	0	COMB18	Combination	-246,209	203,602	0	0	0	121,7345
8	0,7	COMB18	Combination	-269,301	156,361	0	0	0	-4,3831
8	1,4	COMB18	Combination	-292,392	106,879	0	0	0	-96,6478
8	0	COMB19	Combination	-219,732	144,444	0	0	0	182,2428
8	0,7	COMB19	Combination	-242,823	123,699	0	0	0	88,1212
8	1,4	COMB19	Combination	-265,915	98,3	0	0	0	10,1499
8	0	COMB20	Combination	-273,085	104,262	0	0	0	164,8956
8	0,7	COMB20	Combination	-296,177	77,766	0	0	0	101,3267
8	1,4	COMB20	Combination	-319,269	53,684	0	0	0	55,4603
8	0	COMB21	Combination	-246,608	45,104	0	0	0	225,404
8	0,7	COMB21	Combination	-269,7	45,104	0	0	0	193,831
8	1,4	COMB21	Combination	-292,791	45,104	0	0	0	162,2581

MIN P	-219,732
MAX P	-319,269
MAX V2 positivo	236,715
MAX V2 negativo	45,104
MAX M3 positivo	291,486
MAX M3 negativo	-96,6478

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011

ASTA 9

SLU

TABLE: Element Forces - Frames

Frame	Station	OutputCase	CaseType	P	V2	V3	T	M2	M3
Text	m	Text	Text	KN	KN	KN	KN-m	KN-m	KN-m
9	0	COMB1	Combination	-464,603	166,158	-9,981E-15	-1,112E-16	2,342E-15	-45,7284
9	2,45	COMB1	Combination	-523,546	-88,529	5,268E-15	-1,112E-16	8,47E-15	-146,7515
9	4,9	COMB1	Combination	-582,488	-372,244	2,226E-14	-1,112E-16	-2,489E-14	411,7682
9	0	COMB2	Combination	-437,998	133,38	-8,03E-15	-1,527E-16	5,921E-15	-107,9767
9	2,45	COMB2	Combination	-496,941	-121,307	7,219E-15	-1,527E-16	7,27E-15	-128,6933
9	4,9	COMB2	Combination	-555,884	-405,022	2,421E-14	-1,527E-16	-3,087E-14	510,1328
9	0	COMB3	Combination	-464,603	210,184	-1,262E-14	-1,112E-16	5,067E-15	-91,242
9	2,45	COMB3	Combination	-523,546	-108,549	6,467E-15	-1,112E-16	1,331E-14	-227,6103
9	4,9	COMB3	Combination	-582,488	-485,398	2,903E-14	-1,112E-16	-2,946E-14	488,1092
9	0	COMB4	Combination	-424,288	160,514	-9,661E-15	-1,74E-16	1,049E-14	-185,569
9	2,45	COMB4	Combination	-483,231	-158,219	9,423E-15	-1,74E-16	1,149E-14	-200,2463
9	4,9	COMB4	Combination	-542,174	-535,068	3,199E-14	-1,74E-16	-3,852E-14	637,1643
9	0	COMB5	Combination	-244,701	260,239	-1,561E-14	-1,062E-16	1,29E-14	-221,8586
9	2,45	COMB5	Combination	-290,042	-408,079	2,44E-14	-1,062E-16	2,249E-14	-380,6509
9	4,9	COMB5	Combination	-335,383	-423,335	2,532E-14	-1,062E-16	-3,847E-14	635,6604
9	0	COMB6	Combination	-464,603	80,721	-4,865E-15	-1,112E-16	-2,946E-15	42,5932
9	2,45	COMB6	Combination	-523,546	-49,678	2,942E-15	-1,112E-16	-9,255E-16	10,1635
9	4,9	COMB6	Combination	-582,488	-152,657	9,108E-15	-1,112E-16	-1,602E-14	263,6208
9	0	COMB7	Combination	-387,862	142,268	-8,546E-15	-9,475E-17	2,19E-15	-42,2034
9	2,45	COMB7	Combination	-433,203	-76,528	4,555E-15	-9,475E-17	7,391E-15	-127,9543
9	4,9	COMB7	Combination	-478,543	-320,889	1,919E-14	-9,475E-17	-2,138E-14	353,6631
9	0	COMB8	Combination	-364,805	113,861	-6,855E-15	-1,307E-16	5,292E-15	-96,1519
9	2,45	COMB8	Combination	-410,146	-104,936	6,245E-15	-1,307E-16	6,352E-15	-112,3039
9	4,9	COMB8	Combination	-455,487	-349,297	2,088E-14	-1,307E-16	-2,656E-14	438,9124
9	0	COMB9	Combination	-387,862	180,424	-1,083E-14	-9,475E-17	4,551E-15	-81,6485
9	2,45	COMB9	Combination	-433,203	-93,879	5,594E-15	-9,475E-17	1,159E-14	-198,032
9	4,9	COMB9	Combination	-478,543	-418,956	2,506E-14	-9,475E-17	-2,534E-14	419,8253
9	0	COMB10	Combination	-352,923	137,377	-8,269E-15	-1,492E-16	9,252E-15	-163,3986
9	2,45	COMB10	Combination	-398,264	-136,926	8,155E-15	-1,492E-16	1,001E-14	-174,3165
9	4,9	COMB10	Combination	-443,604	-462,003	2,762E-14	-1,492E-16	-3,319E-14	549,0064
9	0	COMB11	Combination	-387,862	68,222	-4,112E-15	-9,475E-17	-2,394E-15	34,342
9	2,45	COMB11	Combination	-433,203	-42,857	2,539E-15	-9,475E-17	-7,513E-16	8,0386
9	4,9	COMB11	Combination	-478,543	-130,58	7,791E-15	-9,475E-17	-1,369E-14	225,2687
MIN P				-253,647					
MAX P				-582,488					
MAX V2 positivo					260,239				
MAX V2 negativo					-535,068				
MAX M3 positivo									637,1643
MAX M3 negativo									-380,650

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011

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TABLE: Element Forces
- Frames

Frame	Station	OutputCase	CaseType	P	V2	V3	T	M2	M3
Text	m	Text	Text	KN	KN	KN	KN-m	KN-m	KN-m
9	0	COMB12	Combination	-319,269	110,642	0	0	0	-3,4208
9	2,45	COMB12	Combination	-364,609	-44,66	0	0	0	-88,8217
9	4,9	COMB12	Combination	-409,95	-222,362	0	0	0	233,7073
9	0	COMB13	Combination	-292,791	102,063	0	0	0	103,377
9	2,45	COMB13	Combination	-338,132	19,204	0	0	0	-52,8572
9	4,9	COMB13	Combination	-383,473	-101,287	0	0	0	40,0124
9	0	COMB14	Combination	-301,533	88,79	0	0	0	-44,9196
9	2,45	COMB14	Combination	-346,873	-66,512	0	0	0	-76,7829
9	4,9	COMB14	Combination	-392,214	-244,214	0	0	0	299,2837
9	0	COMB15	Combination	-275,055	80,21	0	0	0	61,8781
9	2,45	COMB15	Combination	-320,396	-2,649	0	0	0	-40,8184
9	4,9	COMB15	Combination	-365,737	-123,14	0	0	0	105,5887
9	0	COMB16	Combination	-319,269	139,993	0	0	0	-33,7631
9	2,45	COMB16	Combination	-364,609	-58,007	0	0	0	-142,7276
9	4,9	COMB16	Combination	-409,95	-297,798	0	0	0	284,6013
9	0	COMB17	Combination	-292,791	131,413	0	0	0	73,0346
9	2,45	COMB17	Combination	-338,132	5,857	0	0	0	-106,7631
9	4,9	COMB17	Combination	-383,473	-176,723	0	0	0	90,9064
9	0	COMB18	Combination	-292,392	106,879	0	0	0	-96,6478
9	2,45	COMB18	Combination	-337,733	-91,12	0	0	0	-124,4849
9	4,9	COMB18	Combination	-383,074	-330,911	0	0	0	383,9713
9	0	COMB19	Combination	-265,915	98,3	0	0	0	10,1499
9	2,45	COMB19	Combination	-311,256	-27,257	0	0	0	-88,5204
9	4,9	COMB19	Combination	-356,597	-209,837	0	0	0	190,2764
9	0	COMB20	Combination	-319,269	53,684	0	0	0	55,4603
9	2,45	COMB20	Combination	-364,609	-18,76	0	0	0	15,7883
9	4,9	COMB20	Combination	-409,95	-75,97	0	0	0	134,9424
9	0	COMB21	Combination	-292,791	45,104	0	0	0	162,2581
9	2,45	COMB21	Combination	-338,132	45,104	0	0	0	51,7528
9	4,9	COMB21	Combination	-383,473	45,104	0	0	0	-58,7525

MIN P	-265,915
MAX P	-409,95
MAX V2 positivo	139,993
MAX V2 negativo	-330,911
MAX M3 positivo	383,9713
MAX M3 negativo	-142,7276

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011

ASTA 19

SLU

TABLE: Element Forces - Frames

Frame	Station	OutputCase	CaseType	P	V2	V3	T	M2	M3
Text	m	Text	Text	KN	KN	KN	KN-m	KN-m	KN-m
19	0	COMB1	Combination	-302,874	-549,759	3,224E-17	-4,411E-16	1,112E-16	-783,641
19	0,49286	COMB1	Combination	-302,874	-481,593	3,224E-17	-4,411E-16	9,534E-17	-529,4863
19	0,98571	COMB1	Combination	-302,874	-413,427	3,224E-17	-4,411E-16	7,945E-17	-308,9277
19	1,47857	COMB1	Combination	-302,874	-345,261	3,224E-17	-4,411E-16	6,356E-17	-121,9652
19	1,97143	COMB1	Combination	-302,874	-277,095	3,224E-17	-4,411E-16	4,767E-17	31,4013
19	2,46429	COMB1	Combination	-302,874	-208,93	3,224E-17	-4,411E-16	3,178E-17	151,1717
19	2,95714	COMB1	Combination	-302,874	-140,764	3,224E-17	-4,411E-16	1,589E-17	237,3461
19	3,45	COMB1	Combination	-302,874	-72,598	3,224E-17	-4,411E-16	0	289,9244
19	3,94286	COMB1	Combination	-302,874	-4,432	3,224E-17	-4,411E-16	-1,589E-17	308,9067
19	4,43571	COMB1	Combination	-302,874	63,734	3,224E-17	-4,411E-16	-3,178E-17	294,2929
19	4,92857	COMB1	Combination	-302,874	131,9	3,224E-17	-4,411E-16	-4,767E-17	246,083
19	5,42143	COMB1	Combination	-302,874	200,066	3,224E-17	-4,411E-16	-6,356E-17	164,2771
19	5,91429	COMB1	Combination	-302,874	268,232	3,224E-17	-4,411E-16	-7,945E-17	48,8752
19	6,40714	COMB1	Combination	-302,874	336,398	3,224E-17	-4,411E-16	-9,534E-17	-100,1228
19	6,9	COMB1	Combination	-302,874	404,564	3,224E-17	-4,411E-16	-1,112E-16	-282,7169
19	0	COMB2	Combination	-270,096	-576,363	4,425E-17	-6,057E-16	1,527E-16	-859,0714
19	0,49286	COMB2	Combination	-270,096	-508,197	4,425E-17	-6,057E-16	1,308E-16	-591,8047
19	0,98571	COMB2	Combination	-270,096	-440,031	4,425E-17	-6,057E-16	1,09E-16	-358,1341
19	1,47857	COMB2	Combination	-270,096	-371,865	4,425E-17	-6,057E-16	8,723E-17	-158,0596
19	1,97143	COMB2	Combination	-270,096	-303,699	4,425E-17	-6,057E-16	6,542E-17	8,4189
19	2,46429	COMB2	Combination	-270,096	-235,534	4,425E-17	-6,057E-16	4,362E-17	141,3014
19	2,95714	COMB2	Combination	-270,096	-167,368	4,425E-17	-6,057E-16	2,181E-17	240,5877
19	3,45	COMB2	Combination	-270,096	-99,202	4,425E-17	-6,057E-16	0	306,2781
19	3,94286	COMB2	Combination	-270,096	-31,036	4,425E-17	-6,057E-16	-2,181E-17	338,3723
19	4,43571	COMB2	Combination	-270,096	37,13	4,425E-17	-6,057E-16	-4,362E-17	336,8705
19	4,92857	COMB2	Combination	-270,096	105,296	4,425E-17	-6,057E-16	-6,542E-17	301,7727
19	5,42143	COMB2	Combination	-270,096	173,462	4,425E-17	-6,057E-16	-8,723E-17	233,0788
19	5,91429	COMB2	Combination	-270,096	241,628	4,425E-17	-6,057E-16	-1,09E-16	130,7888
19	6,40714	COMB2	Combination	-270,096	309,794	4,425E-17	-6,057E-16	-1,308E-16	-5,0972
19	6,9	COMB2	Combination	-270,096	377,96	4,425E-17	-6,057E-16	-1,527E-16	-174,5793
19	0	COMB3	Combination	-370,441	-549,759	3,224E-17	-4,411E-16	1,112E-16	-817,3496
19	0,49286	COMB3	Combination	-370,441	-481,593	3,224E-17	-4,411E-16	9,534E-17	-563,1949
19	0,98571	COMB3	Combination	-370,441	-413,427	3,224E-17	-4,411E-16	7,945E-17	-342,6363
19	1,47857	COMB3	Combination	-370,441	-345,261	3,224E-17	-4,411E-16	6,356E-17	-155,6737
19	1,97143	COMB3	Combination	-370,441	-277,095	3,224E-17	-4,411E-16	4,767E-17	-2,3073
19	2,46429	COMB3	Combination	-370,441	-208,93	3,224E-17	-4,411E-16	3,178E-17	117,4632
19	2,95714	COMB3	Combination	-370,441	-140,764	3,224E-17	-4,411E-16	1,589E-17	203,6376
19	3,45	COMB3	Combination	-370,441	-72,598	3,224E-17	-4,411E-16	0	256,2159
19	3,94286	COMB3	Combination	-370,441	-4,432	3,224E-17	-4,411E-16	-1,589E-17	275,1981
19	4,43571	COMB3	Combination	-370,441	63,734	3,224E-17	-4,411E-16	-3,178E-17	260,5843
19	4,92857	COMB3	Combination	-370,441	131,9	3,224E-17	-4,411E-16	-4,767E-17	212,3745

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

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SS0558_F0.doc

Rev

F0

Data

20/06/2011

19	5,42143	COMB3	Combination	-370,441	200,066	3,224E-17	-4,411E-16	-6,356E-17	130,5686
19	5,91429	COMB3	Combination	-370,441	268,232	3,224E-17	-4,411E-16	-7,945E-17	15,1666
19	6,40714	COMB3	Combination	-370,441	336,398	3,224E-17	-4,411E-16	-9,534E-17	-133,8314
19	6,9	COMB3	Combination	-370,441	404,564	3,224E-17	-4,411E-16	-1,112E-16	-316,4255
19	0	COMB4	Combination	-320,771	-590,073	5,044E-17	-6,906E-16	1,74E-16	-931,6528
19	0,49286	COMB4	Combination	-320,771	-521,907	5,044E-17	-6,906E-16	1,491E-16	-657,629
19	0,98571	COMB4	Combination	-320,771	-453,741	5,044E-17	-6,906E-16	1,243E-16	-417,2012
19	1,47857	COMB4	Combination	-320,771	-385,576	5,044E-17	-6,906E-16	9,943E-17	-210,3695
19	1,97143	COMB4	Combination	-320,771	-317,41	5,044E-17	-6,906E-16	7,457E-17	-37,1339
19	2,46429	COMB4	Combination	-320,771	-249,244	5,044E-17	-6,906E-16	4,971E-17	102,5057
19	2,95714	COMB4	Combination	-320,771	-181,078	5,044E-17	-6,906E-16	2,486E-17	208,5492
19	3,45	COMB4	Combination	-320,771	-112,912	5,044E-17	-6,906E-16	0	280,9966
19	3,94286	COMB4	Combination	-320,771	-44,746	5,044E-17	-6,906E-16	-2,486E-17	319,848
19	4,43571	COMB4	Combination	-320,771	23,42	5,044E-17	-6,906E-16	-4,971E-17	325,1034
19	4,92857	COMB4	Combination	-320,771	91,586	5,044E-17	-6,906E-16	-7,457E-17	296,7627
19	5,42143	COMB4	Combination	-320,771	159,752	5,044E-17	-6,906E-16	-9,943E-17	234,8259
19	5,91429	COMB4	Combination	-320,771	227,918	5,044E-17	-6,906E-16	-1,243E-16	139,2931
19	6,40714	COMB4	Combination	-320,771	296,084	5,044E-17	-6,906E-16	-1,491E-16	10,1642
19	6,9	COMB4	Combination	-320,771	364,249	5,044E-17	-6,906E-16	-1,74E-16	-152,5607
19	0	COMB5	Combination	-273,727	-330,329	3,077E-17	-4,241E-16	1,062E-16	-606,3671
19	0,49286	COMB5	Combination	-273,727	-292,555	3,077E-17	-4,241E-16	9,099E-17	-452,8707
19	0,98571	COMB5	Combination	-273,727	-254,78	3,077E-17	-4,241E-16	7,583E-17	-317,9919
19	1,47857	COMB5	Combination	-273,727	-217,005	3,077E-17	-4,241E-16	6,066E-17	-201,7307
19	1,97143	COMB5	Combination	-273,727	-179,23	3,077E-17	-4,241E-16	4,55E-17	-104,0871
19	2,46429	COMB5	Combination	-273,727	-141,455	3,077E-17	-4,241E-16	3,033E-17	-25,061
19	2,95714	COMB5	Combination	-273,727	-103,681	3,077E-17	-4,241E-16	1,517E-17	35,3475
19	3,45	COMB5	Combination	-273,727	-65,906	3,077E-17	-4,241E-16	0	77,1384
19	3,94286	COMB5	Combination	-273,727	-28,131	3,077E-17	-4,241E-16	-1,517E-17	100,3117
19	4,43571	COMB5	Combination	-273,727	9,644	3,077E-17	-4,241E-16	-3,033E-17	104,8675
19	4,92857	COMB5	Combination	-273,727	47,419	3,077E-17	-4,241E-16	-4,55E-17	90,8057
19	5,42143	COMB5	Combination	-273,727	85,193	3,077E-17	-4,241E-16	-6,066E-17	58,1263
19	5,91429	COMB5	Combination	-273,727	122,968	3,077E-17	-4,241E-16	-7,583E-17	6,8294
19	6,40714	COMB5	Combination	-273,727	160,743	3,077E-17	-4,241E-16	-9,099E-17	-63,0852
19	6,9	COMB5	Combination	-273,727	198,518	3,077E-17	-4,241E-16	-1,062E-16	-151,6173
19	0	COMB6	Combination	-171,762	-549,759	3,224E-17	-4,411E-16	1,112E-16	-718,2265
19	0,49286	COMB6	Combination	-171,762	-481,593	3,224E-17	-4,411E-16	9,534E-17	-464,0718
19	0,98571	COMB6	Combination	-171,762	-413,427	3,224E-17	-4,411E-16	7,945E-17	-243,5132
19	1,47857	COMB6	Combination	-171,762	-345,261	3,224E-17	-4,411E-16	6,356E-17	-56,5507
19	1,97143	COMB6	Combination	-171,762	-277,095	3,224E-17	-4,411E-16	4,767E-17	96,8158
19	2,46429	COMB6	Combination	-171,762	-208,93	3,224E-17	-4,411E-16	3,178E-17	216,5862
19	2,95714	COMB6	Combination	-171,762	-140,764	3,224E-17	-4,411E-16	1,589E-17	302,7606
19	3,45	COMB6	Combination	-171,762	-72,598	3,224E-17	-4,411E-16	0	355,3389
19	3,94286	COMB6	Combination	-171,762	-4,432	3,224E-17	-4,411E-16	-1,589E-17	374,3212
19	4,43571	COMB6	Combination	-171,762	63,734	3,224E-17	-4,411E-16	-3,178E-17	359,7074
19	4,92857	COMB6	Combination	-171,762	131,9	3,224E-17	-4,411E-16	-4,767E-17	311,4976
19	5,42143	COMB6	Combination	-171,762	200,066	3,224E-17	-4,411E-16	-6,356E-17	229,6917
19	5,91429	COMB6	Combination	-171,762	268,232	3,224E-17	-4,411E-16	-7,945E-17	114,2897

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD	Codice documento	Rev	Data
	SS0558_F0.doc	F0	20/06/2011

19	6,40714	COMB6	Combination	-171,762	336,398	3,224E-17	-4,411E-16	-9,534E-17	-34,7083
19	6,9	COMB6	Combination	-171,762	404,564	3,224E-17	-4,411E-16	-1,112E-16	-217,3024
19	0	COMB7	Combination	-259,407	-465,363	2,746E-17	-3,757E-16	9,475E-17	-665,8186
19	0,49286	COMB7	Combination	-259,407	-407,717	2,746E-17	-3,757E-16	8,122E-17	-450,6667
19	0,98571	COMB7	Combination	-259,407	-350,071	2,746E-17	-3,757E-16	6,768E-17	-263,9259
19	1,47857	COMB7	Combination	-259,407	-292,426	2,746E-17	-3,757E-16	5,414E-17	-105,5962
19	1,97143	COMB7	Combination	-259,407	-234,78	2,746E-17	-3,757E-16	4,061E-17	24,3223
19	2,46429	COMB7	Combination	-259,407	-177,134	2,746E-17	-3,757E-16	2,707E-17	125,8297
19	2,95714	COMB7	Combination	-259,407	-119,488	2,746E-17	-3,757E-16	1,354E-17	198,9259
19	3,45	COMB7	Combination	-259,407	-61,842	2,746E-17	-3,757E-16	0	243,611
19	3,94286	COMB7	Combination	-259,407	-4,197	2,746E-17	-3,757E-16	-1,354E-17	259,8849
19	4,43571	COMB7	Combination	-259,407	53,449	2,746E-17	-3,757E-16	-2,707E-17	247,7477
19	4,92857	COMB7	Combination	-259,407	111,095	2,746E-17	-3,757E-16	-4,061E-17	207,1994
19	5,42143	COMB7	Combination	-259,407	168,741	2,746E-17	-3,757E-16	-5,414E-17	138,2399
19	5,91429	COMB7	Combination	-259,407	226,387	2,746E-17	-3,757E-16	-6,768E-17	40,8692
19	6,40714	COMB7	Combination	-259,407	284,032	2,746E-17	-3,757E-16	-8,122E-17	-84,9126
19	6,9	COMB7	Combination	-259,407	341,678	2,746E-17	-3,757E-16	-9,475E-17	-239,1055
19	0	COMB8	Combination	-230,999	-488,42	3,787E-17	-5,184E-16	1,307E-16	-731,1916
19	0,49286	COMB8	Combination	-230,999	-430,774	3,787E-17	-5,184E-16	1,12E-16	-504,6759
19	0,98571	COMB8	Combination	-230,999	-373,128	3,787E-17	-5,184E-16	9,332E-17	-306,5714
19	1,47857	COMB8	Combination	-230,999	-315,483	3,787E-17	-5,184E-16	7,466E-17	-136,878
19	1,97143	COMB8	Combination	-230,999	-257,837	3,787E-17	-5,184E-16	5,599E-17	4,4043
19	2,46429	COMB8	Combination	-230,999	-200,191	3,787E-17	-5,184E-16	3,733E-17	117,2754
19	2,95714	COMB8	Combination	-230,999	-142,545	3,787E-17	-5,184E-16	1,866E-17	201,7353
19	3,45	COMB8	Combination	-230,999	-84,899	3,787E-17	-5,184E-16	0	257,7841
19	3,94286	COMB8	Combination	-230,999	-27,254	3,787E-17	-5,184E-16	-1,866E-17	285,4218
19	4,43571	COMB8	Combination	-230,999	30,392	3,787E-17	-5,184E-16	-3,733E-17	284,6483
19	4,92857	COMB8	Combination	-230,999	88,038	3,787E-17	-5,184E-16	-5,599E-17	255,4637
19	5,42143	COMB8	Combination	-230,999	145,684	3,787E-17	-5,184E-16	-7,466E-17	197,868
19	5,91429	COMB8	Combination	-230,999	203,33	3,787E-17	-5,184E-16	-9,332E-17	111,861
19	6,40714	COMB8	Combination	-230,999	260,975	3,787E-17	-5,184E-16	-1,12E-16	-2,557
19	6,9	COMB8	Combination	-230,999	318,621	3,787E-17	-5,184E-16	-1,307E-16	-145,3862
19	0	COMB9	Combination	-317,965	-465,363	2,746E-17	-3,757E-16	9,475E-17	-695,0327
19	0,49286	COMB9	Combination	-317,965	-407,717	2,746E-17	-3,757E-16	8,122E-17	-479,8807
19	0,98571	COMB9	Combination	-317,965	-350,071	2,746E-17	-3,757E-16	6,768E-17	-293,1399
19	1,47857	COMB9	Combination	-317,965	-292,426	2,746E-17	-3,757E-16	5,414E-17	-134,8103
19	1,97143	COMB9	Combination	-317,965	-234,78	2,746E-17	-3,757E-16	4,061E-17	-4,8918
19	2,46429	COMB9	Combination	-317,965	-177,134	2,746E-17	-3,757E-16	2,707E-17	96,6156
19	2,95714	COMB9	Combination	-317,965	-119,488	2,746E-17	-3,757E-16	1,354E-17	169,7118
19	3,45	COMB9	Combination	-317,965	-61,842	2,746E-17	-3,757E-16	0	214,3969
19	3,94286	COMB9	Combination	-317,965	-4,197	2,746E-17	-3,757E-16	-1,354E-17	230,6709
19	4,43571	COMB9	Combination	-317,965	53,449	2,746E-17	-3,757E-16	-2,707E-17	218,5336
19	4,92857	COMB9	Combination	-317,965	111,095	2,746E-17	-3,757E-16	-4,061E-17	177,9853
19	5,42143	COMB9	Combination	-317,965	168,741	2,746E-17	-3,757E-16	-5,414E-17	109,0258
19	5,91429	COMB9	Combination	-317,965	226,387	2,746E-17	-3,757E-16	-6,768E-17	11,6551
19	6,40714	COMB9	Combination	-317,965	284,032	2,746E-17	-3,757E-16	-8,122E-17	-114,1266
19	6,9	COMB9	Combination	-317,965	341,678	2,746E-17	-3,757E-16	-9,475E-17	-268,3196

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO			
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i>	<i>Rev</i>	<i>Data</i>	
		SS0558_F0.doc	F0	20/06/2011	

19	0	COMB10	Combination	-274,918	-500,302	4,323E-17	-5,92E-16	1,492E-16	-794,0955
19	0,49286	COMB10	Combination	-274,918	-442,656	4,323E-17	-5,92E-16	1,278E-16	-561,7236
19	0,98571	COMB10	Combination	-274,918	-385,01	4,323E-17	-5,92E-16	1,065E-16	-357,7629
19	1,47857	COMB10	Combination	-274,918	-327,365	4,323E-17	-5,92E-16	8,523E-17	-182,2133
19	1,97143	COMB10	Combination	-274,918	-269,719	4,323E-17	-5,92E-16	6,392E-17	-35,0749
19	2,46429	COMB10	Combination	-274,918	-212,073	4,323E-17	-5,92E-16	4,262E-17	83,6524
19	2,95714	COMB10	Combination	-274,918	-154,427	4,323E-17	-5,92E-16	2,131E-17	173,9686
19	3,45	COMB10	Combination	-274,918	-96,781	4,323E-17	-5,92E-16	0	235,8736
19	3,94286	COMB10	Combination	-274,918	-39,136	4,323E-17	-5,92E-16	-2,131E-17	269,3674
19	4,43571	COMB10	Combination	-274,918	18,51	4,323E-17	-5,92E-16	-4,262E-17	274,4502
19	4,92857	COMB10	Combination	-274,918	76,156	4,323E-17	-5,92E-16	-6,392E-17	251,1217
19	5,42143	COMB10	Combination	-274,918	133,802	4,323E-17	-5,92E-16	-8,523E-17	199,3822
19	5,91429	COMB10	Combination	-274,918	191,448	4,323E-17	-5,92E-16	-1,065E-16	119,2314
19	6,40714	COMB10	Combination	-274,918	249,093	4,323E-17	-5,92E-16	-1,278E-16	10,6696
19	6,9	COMB10	Combination	-274,918	306,739	4,323E-17	-5,92E-16	-1,492E-16	-126,3035
19	0	COMB11	Combination	-145,776	-465,363	2,746E-17	-3,757E-16	9,475E-17	-609,126
19	0,49286	COMB11	Combination	-145,776	-407,717	2,746E-17	-3,757E-16	8,122E-17	-393,9741
19	0,98571	COMB11	Combination	-145,776	-350,071	2,746E-17	-3,757E-16	6,768E-17	-207,2333
19	1,47857	COMB11	Combination	-145,776	-292,426	2,746E-17	-3,757E-16	5,414E-17	-48,9036
19	1,97143	COMB11	Combination	-145,776	-234,78	2,746E-17	-3,757E-16	4,061E-17	81,0149
19	2,46429	COMB11	Combination	-145,776	-177,134	2,746E-17	-3,757E-16	2,707E-17	182,5223
19	2,95714	COMB11	Combination	-145,776	-119,488	2,746E-17	-3,757E-16	1,354E-17	255,6185
19	3,45	COMB11	Combination	-145,776	-61,842	2,746E-17	-3,757E-16	0	300,3036
19	3,94286	COMB11	Combination	-145,776	-4,197	2,746E-17	-3,757E-16	-1,354E-17	316,5775
19	4,43571	COMB11	Combination	-145,776	53,449	2,746E-17	-3,757E-16	-2,707E-17	304,4403
19	4,92857	COMB11	Combination	-145,776	111,095	2,746E-17	-3,757E-16	-4,061E-17	263,892
19	5,42143	COMB11	Combination	-145,776	168,741	2,746E-17	-3,757E-16	-5,414E-17	194,9325
19	5,91429	COMB11	Combination	-145,776	226,387	2,746E-17	-3,757E-16	-6,768E-17	97,5618
19	6,40714	COMB11	Combination	-145,776	284,032	2,746E-17	-3,757E-16	-8,122E-17	-28,22
19	6,9	COMB11	Combination	-145,776	341,678	2,746E-17	-3,757E-16	-9,475E-17	-182,4129

MIN P	-145,776
MAX P	-370,441
MAX V2 positivo	404,564
MAX V2 negativo	-590,073
MAX M3 positivo	374,3212
MAX M3 negativo	-931,6528

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011

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TABLE: Element Forces - Frames

Frame	Station	OutputCase	CaseType	P	V2	V3	T	M2	M3
Text	m	Text	Text	KN	KN	KN	KN-m	KN-m	KN-m
19	0	COMB12	Combination	-191,671	-353,749	0	0	0	-486,7964
19	0,49286	COMB12	Combination	-191,671	-308,975	0	0	0	-323,4823
19	0,98571	COMB12	Combination	-191,671	-264,201	0	0	0	-182,2352
19	1,47857	COMB12	Combination	-191,671	-219,427	0	0	0	-63,0553
19	1,97143	COMB12	Combination	-191,671	-174,654	0	0	0	34,0576
19	2,46429	COMB12	Combination	-191,671	-129,88	0	0	0	109,1033
19	2,95714	COMB12	Combination	-191,671	-85,106	0	0	0	162,0819
19	3,45	COMB12	Combination	-191,671	-40,332	0	0	0	192,9934
19	3,94286	COMB12	Combination	-191,671	4,442	0	0	0	201,8378
19	4,43571	COMB12	Combination	-191,671	49,216	0	0	0	188,6151
19	4,92857	COMB12	Combination	-191,671	93,99	0	0	0	153,3252
19	5,42143	COMB12	Combination	-191,671	138,763	0	0	0	95,9683
19	5,91429	COMB12	Combination	-191,671	183,537	0	0	0	16,5442
19	6,40714	COMB12	Combination	-191,671	228,311	0	0	0	-84,947
19	6,9	COMB12	Combination	-191,671	273,085	0	0	0	-208,5053
19	0	COMB13	Combination	-132,513	-246,608	0	0	0	-269,0136
19	0,49286	COMB13	Combination	-132,513	-211,378	0	0	0	-156,1529
19	0,98571	COMB13	Combination	-132,513	-176,148	0	0	0	-60,6553
19	1,47857	COMB13	Combination	-132,513	-140,919	0	0	0	17,4791
19	1,97143	COMB13	Combination	-132,513	-105,689	0	0	0	78,2503
19	2,46429	COMB13	Combination	-132,513	-70,459	0	0	0	121,6583
19	2,95714	COMB13	Combination	-132,513	-35,23	0	0	0	147,7031
19	3,45	COMB13	Combination	-132,513	6,395E-14	0	0	0	156,3847
19	3,94286	COMB13	Combination	-132,513	35,23	0	0	0	147,7031
19	4,43571	COMB13	Combination	-132,513	70,459	0	0	0	121,6583
19	4,92857	COMB13	Combination	-132,513	105,689	0	0	0	78,2503
19	5,42143	COMB13	Combination	-132,513	140,919	0	0	0	17,4791
19	5,91429	COMB13	Combination	-132,513	176,148	0	0	0	-60,6553
19	6,40714	COMB13	Combination	-132,513	211,378	0	0	0	-156,1529
19	6,9	COMB13	Combination	-132,513	246,608	0	0	0	-269,0136
19	0	COMB14	Combination	-169,819	-371,485	0	0	0	-537,0834
19	0,49286	COMB14	Combination	-169,819	-326,711	0	0	0	-365,0278
19	0,98571	COMB14	Combination	-169,819	-281,937	0	0	0	-215,0395
19	1,47857	COMB14	Combination	-169,819	-237,164	0	0	0	-87,1182
19	1,97143	COMB14	Combination	-169,819	-192,39	0	0	0	18,736
19	2,46429	COMB14	Combination	-169,819	-147,616	0	0	0	102,5231
19	2,95714	COMB14	Combination	-169,819	-102,842	0	0	0	164,243
19	3,45	COMB14	Combination	-169,819	-58,068	0	0	0	203,8958
19	3,94286	COMB14	Combination	-169,819	-13,294	0	0	0	221,4815
19	4,43571	COMB14	Combination	-169,819	31,48	0	0	0	217,0002
19	4,92857	COMB14	Combination	-169,819	76,253	0	0	0	190,4516
19	5,42143	COMB14	Combination	-169,819	121,027	0	0	0	141,836
19	5,91429	COMB14	Combination	-169,819	165,801	0	0	0	71,1533

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

Codice documento

SS0558_F0.doc

Rev

F0

Data

20/06/2011

19	6,40714	COMB14	Combination	-169,819	210,575	0	0	0	-21,5966
19	6,9	COMB14	Combination	-169,819	255,349	0	0	0	-136,4135
19	0	COMB15	Combination	-110,66	-264,344	0	0	0	-319,3006
19	0,49286	COMB15	Combination	-110,66	-229,114	0	0	0	-197,6984
19	0,98571	COMB15	Combination	-110,66	-193,884	0	0	0	-93,4595
19	1,47857	COMB15	Combination	-110,66	-158,655	0	0	0	-6,5838
19	1,97143	COMB15	Combination	-110,66	-123,425	0	0	0	62,9287
19	2,46429	COMB15	Combination	-110,66	-88,195	0	0	0	115,078
19	2,95714	COMB15	Combination	-110,66	-52,966	0	0	0	149,8642
19	3,45	COMB15	Combination	-110,66	-17,736	0	0	0	167,2871
19	3,94286	COMB15	Combination	-110,66	17,494	0	0	0	167,3468
19	4,43571	COMB15	Combination	-110,66	52,723	0	0	0	150,0434
19	4,92857	COMB15	Combination	-110,66	87,953	0	0	0	115,3767
19	5,42143	COMB15	Combination	-110,66	123,183	0	0	0	63,3469
19	5,91429	COMB15	Combination	-110,66	158,412	0	0	0	-6,0462
19	6,40714	COMB15	Combination	-110,66	193,642	0	0	0	-92,8024
19	6,9	COMB15	Combination	-110,66	228,872	0	0	0	-196,9219
19	0	COMB16	Combination	-236,715	-353,749	0	0	0	-509,2688
19	0,49286	COMB16	Combination	-236,715	-308,975	0	0	0	-345,9546
19	0,98571	COMB16	Combination	-236,715	-264,201	0	0	0	-204,7076
19	1,47857	COMB16	Combination	-236,715	-219,427	0	0	0	-85,5276
19	1,97143	COMB16	Combination	-236,715	-174,654	0	0	0	11,5852
19	2,46429	COMB16	Combination	-236,715	-129,88	0	0	0	86,6309
19	2,95714	COMB16	Combination	-236,715	-85,106	0	0	0	139,6095
19	3,45	COMB16	Combination	-236,715	-40,332	0	0	0	170,521
19	3,94286	COMB16	Combination	-236,715	4,442	0	0	0	179,3654
19	4,43571	COMB16	Combination	-236,715	49,216	0	0	0	166,1427
19	4,92857	COMB16	Combination	-236,715	93,99	0	0	0	130,8529
19	5,42143	COMB16	Combination	-236,715	138,763	0	0	0	73,4959
19	5,91429	COMB16	Combination	-236,715	183,537	0	0	0	-5,9282
19	6,40714	COMB16	Combination	-236,715	228,311	0	0	0	-107,4193
19	6,9	COMB16	Combination	-236,715	273,085	0	0	0	-230,9776
19	0	COMB17	Combination	-177,557	-246,608	0	0	0	-291,486
19	0,49286	COMB17	Combination	-177,557	-211,378	0	0	0	-178,6252
19	0,98571	COMB17	Combination	-177,557	-176,148	0	0	0	-83,1276
19	1,47857	COMB17	Combination	-177,557	-140,919	0	0	0	-4,9933
19	1,97143	COMB17	Combination	-177,557	-105,689	0	0	0	55,7779
19	2,46429	COMB17	Combination	-177,557	-70,459	0	0	0	99,1859
19	2,95714	COMB17	Combination	-177,557	-35,23	0	0	0	125,2307
19	3,45	COMB17	Combination	-177,557	1,066E-13	0	0	0	133,9123
19	3,94286	COMB17	Combination	-177,557	35,23	0	0	0	125,2307
19	4,43571	COMB17	Combination	-177,557	70,459	0	0	0	99,1859
19	4,92857	COMB17	Combination	-177,557	105,689	0	0	0	55,7779
19	5,42143	COMB17	Combination	-177,557	140,919	0	0	0	-4,9933
19	5,91429	COMB17	Combination	-177,557	176,148	0	0	0	-83,1276
19	6,40714	COMB17	Combination	-177,557	211,378	0	0	0	-178,6252
19	6,9	COMB17	Combination	-177,557	246,608	0	0	0	-291,486
19	0	COMB18	Combination	-203,602	-380,625	0	0	0	-585,471
19	0,49286	COMB18	Combination	-203,602	-335,851	0	0	0	-408,9107

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011

19	0,98571	COMB18	Combination	-203,602	-291,077	0	0	0	-254,4175
19	1,47857	COMB18	Combination	-203,602	-246,304	0	0	0	-121,9915
19	1,97143	COMB18	Combination	-203,602	-201,53	0	0	0	-11,6326
19	2,46429	COMB18	Combination	-203,602	-156,756	0	0	0	76,6593
19	2,95714	COMB18	Combination	-203,602	-111,982	0	0	0	142,884
19	3,45	COMB18	Combination	-203,602	-67,208	0	0	0	187,0416
19	3,94286	COMB18	Combination	-203,602	-22,434	0	0	0	209,132
19	4,43571	COMB18	Combination	-203,602	22,34	0	0	0	209,1554
19	4,92857	COMB18	Combination	-203,602	67,113	0	0	0	187,1116
19	5,42143	COMB18	Combination	-203,602	111,887	0	0	0	143,0008
19	5,91429	COMB18	Combination	-203,602	156,661	0	0	0	76,8228
19	6,40714	COMB18	Combination	-203,602	201,435	0	0	0	-11,4223
19	6,9	COMB18	Combination	-203,602	246,209	0	0	0	-121,7345
19	0	COMB19	Combination	-144,444	-273,484	0	0	0	-367,6882
19	0,49286	COMB19	Combination	-144,444	-238,254	0	0	0	-241,5813
19	0,98571	COMB19	Combination	-144,444	-203,025	0	0	0	-132,8376
19	1,47857	COMB19	Combination	-144,444	-167,795	0	0	0	-41,4571
19	1,97143	COMB19	Combination	-144,444	-132,565	0	0	0	32,5602
19	2,46429	COMB19	Combination	-144,444	-97,335	0	0	0	89,2142
19	2,95714	COMB19	Combination	-144,444	-62,106	0	0	0	128,5051
19	3,45	COMB19	Combination	-144,444	-26,876	0	0	0	150,4328
19	3,94286	COMB19	Combination	-144,444	8,354	0	0	0	154,9973
19	4,43571	COMB19	Combination	-144,444	43,583	0	0	0	142,1986
19	4,92857	COMB19	Combination	-144,444	78,813	0	0	0	112,0367
19	5,42143	COMB19	Combination	-144,444	114,043	0	0	0	64,5116
19	5,91429	COMB19	Combination	-144,444	149,272	0	0	0	-0,3767
19	6,40714	COMB19	Combination	-144,444	184,502	0	0	0	-82,6281
19	6,9	COMB19	Combination	-144,444	219,732	0	0	0	-182,2428
19	0	COMB20	Combination	-104,262	-353,749	0	0	0	-443,1868
19	0,49286	COMB20	Combination	-104,262	-308,975	0	0	0	-279,8726
19	0,98571	COMB20	Combination	-104,262	-264,201	0	0	0	-138,6255
19	1,47857	COMB20	Combination	-104,262	-219,427	0	0	0	-19,4456
19	1,97143	COMB20	Combination	-104,262	-174,654	0	0	0	77,6673
19	2,46429	COMB20	Combination	-104,262	-129,88	0	0	0	152,713
19	2,95714	COMB20	Combination	-104,262	-85,106	0	0	0	205,6916
19	3,45	COMB20	Combination	-104,262	-40,332	0	0	0	236,6031
19	3,94286	COMB20	Combination	-104,262	4,442	0	0	0	245,4475
19	4,43571	COMB20	Combination	-104,262	49,216	0	0	0	232,2247
19	4,92857	COMB20	Combination	-104,262	93,99	0	0	0	196,9349
19	5,42143	COMB20	Combination	-104,262	138,763	0	0	0	139,5779
19	5,91429	COMB20	Combination	-104,262	183,537	0	0	0	60,1539
19	6,40714	COMB20	Combination	-104,262	228,311	0	0	0	-41,3373
19	6,9	COMB20	Combination	-104,262	273,085	0	0	0	-164,8956
19	0	COMB21	Combination	-45,104	-246,608	0	0	0	-225,404
19	0,49286	COMB21	Combination	-45,104	-211,378	0	0	0	-112,5432
19	0,98571	COMB21	Combination	-45,104	-176,148	0	0	0	-17,0456
19	1,47857	COMB21	Combination	-45,104	-140,919	0	0	0	61,0888
19	1,97143	COMB21	Combination	-45,104	-105,689	0	0	0	121,86
19	2,46429	COMB21	Combination	-45,104	-70,459	0	0	0	165,268

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011

19	2,95714	COMB21	Combination	-45,104	-35,23	0	0	0	191,3128
19	3,45	COMB21	Combination	-45,104	2,074E-14	0	0	0	199,9944
19	3,94286	COMB21	Combination	-45,104	35,23	0	0	0	191,3128
19	4,43571	COMB21	Combination	-45,104	70,459	0	0	0	165,268
19	4,92857	COMB21	Combination	-45,104	105,689	0	0	0	121,86
19	5,42143	COMB21	Combination	-45,104	140,919	0	0	0	61,0888
19	5,91429	COMB21	Combination	-45,104	176,148	0	0	0	-17,0456
19	6,40714	COMB21	Combination	-45,104	211,378	0	0	0	-112,5432
19	6,9	COMB21	Combination	-45,104	246,608	0	0	0	-225,404

MIN P	-45,104
MAX P	-236,715
MAX V2 positivo	273,085
MAX V2 negativo	-380,625
MAX M3 positivo	245,4475
MAX M3 negativo	-585,471

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011

ASTA 22

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TABLE: Element Forces
- Frames

Frame	Station	OutputCase	CaseType	P	V2	V3	T	M2	M3
Text	m	Text	Text	KN	KN	KN	KN-m	KN-m	KN-m
22	0	COMB1	Combination	-491,394	-25,41	0	9,978E-17	0	0
22	0,09857	COMB1	Combination	-491,394	-22,39	0	9,978E-17	0	2,3559
22	0,09857	COMB1	Combination	-491,394	-24,121	0	9,978E-17	0	2,3559
22	0,19714	COMB1	Combination	-491,394	-21,101	0	9,978E-17	0	4,5847
22	0,19714	COMB1	Combination	-491,394	-22,875	0	9,978E-17	0	4,5847
22	0,29571	COMB1	Combination	-491,394	-19,856	0	9,978E-17	0	6,6907
22	0,29571	COMB1	Combination	-491,394	-21,672	0	9,978E-17	0	6,6907
22	0,39429	COMB1	Combination	-491,394	-18,653	0	9,978E-17	0	8,6782
22	0,39429	COMB1	Combination	-491,394	-20,512	0	9,978E-17	0	8,6782
22	0,49286	COMB1	Combination	-491,394	-17,493	0	9,978E-17	0	10,5513
22	0,49286	COMB1	Combination	-491,394	-19,394	0	9,978E-17	0	10,5513
22	0,59143	COMB1	Combination	-491,394	-16,375	0	9,978E-17	0	12,3141
22	0,59143	COMB1	Combination	-491,394	-18,317	0	9,978E-17	0	12,3141
22	0,69	COMB1	Combination	-491,394	-15,298	0	9,978E-17	0	13,9709
22	0,69	COMB1	Combination	-491,394	-17,281	0	9,978E-17	0	13,9709
22	0,78857	COMB1	Combination	-491,394	-14,262	0	9,978E-17	0	15,5255
22	0,78857	COMB1	Combination	-491,394	-16,285	0	9,978E-17	0	15,5255
22	0,88714	COMB1	Combination	-491,394	-13,266	0	9,978E-17	0	16,982
22	0,88714	COMB1	Combination	-491,394	-15,328	0	9,978E-17	0	16,982
22	0,98571	COMB1	Combination	-491,394	-12,309	0	9,978E-17	0	18,3441
22	0,98571	COMB1	Combination	-491,394	-14,409	0	9,978E-17	0	18,3441
22	1,08429	COMB1	Combination	-491,394	-11,39	0	9,978E-17	0	19,6156
22	1,08429	COMB1	Combination	-491,394	-13,528	0	9,978E-17	0	19,6156
22	1,18286	COMB1	Combination	-491,394	-10,509	0	9,978E-17	0	20,8003
22	1,18286	COMB1	Combination	-491,394	-12,683	0	9,978E-17	0	20,8003
22	1,28143	COMB1	Combination	-491,394	-9,663	0	9,978E-17	0	21,9016
22	1,28143	COMB1	Combination	-491,394	-11,873	0	9,978E-17	0	21,9016
22	1,38	COMB1	Combination	-491,394	-8,853	0	9,978E-17	0	22,9231
22	1,38	COMB1	Combination	-491,394	-11,097	0	9,978E-17	0	22,9231
22	1,47857	COMB1	Combination	-491,394	-8,077	0	9,978E-17	0	23,8681
22	1,47857	COMB1	Combination	-491,394	-10,354	0	9,978E-17	0	23,8681
22	1,57714	COMB1	Combination	-491,394	-7,334	0	9,978E-17	0	24,7399
22	1,57714	COMB1	Combination	-491,394	-9,642	0	9,978E-17	0	24,7399
22	1,67571	COMB1	Combination	-491,394	-6,623	0	9,978E-17	0	25,5415
22	1,67571	COMB1	Combination	-491,394	-8,962	0	9,978E-17	0	25,5415
22	1,77429	COMB1	Combination	-491,394	-5,942	0	9,978E-17	0	26,2761
22	1,77429	COMB1	Combination	-491,394	-8,31	0	9,978E-17	0	26,2761
22	1,87286	COMB1	Combination	-491,394	-5,291	0	9,978E-17	0	26,9464
22	1,87286	COMB1	Combination	-491,394	-7,687	0	9,978E-17	0	26,9464
22	1,97143	COMB1	Combination	-491,394	-4,667	0	9,978E-17	0	27,5553
22	1,97143	COMB1	Combination	-491,394	-7,09	0	9,978E-17	0	27,5553
22	2,07	COMB1	Combination	-491,394	-4,07	0	9,978E-17	0	28,1053

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

Codice documento
SS0558_F0.doc

Rev
F0

Data
20/06/2011

22	2,07	COMB1	Combination	-491,394	-6,518	0	9,978E-17	0	28,1053
22	2,16857	COMB1	Combination	-491,394	-3,499	0	9,978E-17	0	28,599
22	2,16857	COMB1	Combination	-491,394	-5,971	0	9,978E-17	0	28,599
22	2,26714	COMB1	Combination	-491,394	-2,951	0	9,978E-17	0	29,0387
22	2,26714	COMB1	Combination	-491,394	-5,446	0	9,978E-17	0	29,0387
22	2,36571	COMB1	Combination	-491,394	-2,426	0	9,978E-17	0	29,4267
22	2,36571	COMB1	Combination	-491,394	-4,942	0	9,978E-17	0	29,4267
22	2,46429	COMB1	Combination	-491,394	-1,922	0	9,978E-17	0	29,765
22	2,46429	COMB1	Combination	-491,394	-4,458	0	9,978E-17	0	29,765
22	2,56286	COMB1	Combination	-491,394	-1,438	0	9,978E-17	0	30,0556
22	2,56286	COMB1	Combination	-491,394	-3,992	0	9,978E-17	0	30,0556
22	2,66143	COMB1	Combination	-491,394	-0,972	0	9,978E-17	0	30,3002
22	2,66143	COMB1	Combination	-491,394	-3,543	0	9,978E-17	0	30,3002
22	2,76	COMB1	Combination	-491,394	-0,523	0	9,978E-17	0	30,5006
22	2,76	COMB1	Combination	-491,394	-3,109	0	9,978E-17	0	30,5006
22	2,85857	COMB1	Combination	-491,394	-0,09	0	9,978E-17	0	30,6583
22	2,85857	COMB1	Combination	-491,394	-2,689	0	9,978E-17	0	30,6583
22	2,95714	COMB1	Combination	-491,394	0,33	0	9,978E-17	0	30,7746
22	2,95714	COMB1	Combination	-491,394	-2,282	0	9,978E-17	0	30,7746
22	3,05571	COMB1	Combination	-491,394	0,737	0	9,978E-17	0	30,8507
22	3,05571	COMB1	Combination	-491,394	-1,886	0	9,978E-17	0	30,8507
22	3,15429	COMB1	Combination	-491,394	1,133	0	9,978E-17	0	30,8878
22	3,15429	COMB1	Combination	-491,394	-1,499	0	9,978E-17	0	30,8878
22	3,25286	COMB1	Combination	-491,394	1,52	0	9,978E-17	0	30,8868
22	3,25286	COMB1	Combination	-491,394	-1,121	0	9,978E-17	0	30,8868
22	3,35143	COMB1	Combination	-491,394	1,899	0	9,978E-17	0	30,8485
22	3,35143	COMB1	Combination	-491,394	-0,749	0	9,978E-17	0	30,8485
22	3,45	COMB1	Combination	-491,394	2,271	0	9,978E-17	0	30,7735
22	0	COMB2	Combination	-552,858	-26,104	0	1,372E-16	0	0
22	0,09857	COMB2	Combination	-552,858	-23,084	0	1,372E-16	0	2,4243
22	0,09857	COMB2	Combination	-552,858	-24,751	0	1,372E-16	0	2,4243
22	0,19714	COMB2	Combination	-552,858	-21,732	0	1,372E-16	0	4,7152
22	0,19714	COMB2	Combination	-552,858	-23,445	0	1,372E-16	0	4,7152
22	0,29571	COMB2	Combination	-552,858	-20,425	0	1,372E-16	0	6,8774
22	0,29571	COMB2	Combination	-552,858	-22,183	0	1,372E-16	0	6,8774
22	0,39429	COMB2	Combination	-552,858	-19,164	0	1,372E-16	0	8,9152
22	0,39429	COMB2	Combination	-552,858	-20,966	0	1,372E-16	0	8,9152
22	0,49286	COMB2	Combination	-552,858	-17,947	0	1,372E-16	0	10,833
22	0,49286	COMB2	Combination	-552,858	-19,794	0	1,372E-16	0	10,833
22	0,59143	COMB2	Combination	-552,858	-16,774	0	1,372E-16	0	12,6353
22	0,59143	COMB2	Combination	-552,858	-18,665	0	1,372E-16	0	12,6353
22	0,69	COMB2	Combination	-552,858	-15,645	0	1,372E-16	0	14,3263
22	0,69	COMB2	Combination	-552,858	-17,578	0	1,372E-16	0	14,3263
22	0,78857	COMB2	Combination	-552,858	-14,559	0	1,372E-16	0	15,9102
22	0,78857	COMB2	Combination	-552,858	-16,534	0	1,372E-16	0	15,9102
22	0,88714	COMB2	Combination	-552,858	-13,515	0	1,372E-16	0	17,3911
22	0,88714	COMB2	Combination	-552,858	-15,531	0	1,372E-16	0	17,3911
22	0,98571	COMB2	Combination	-552,858	-12,512	0	1,372E-16	0	18,7732
22	0,98571	COMB2	Combination	-552,858	-14,568	0	1,372E-16	0	18,7732

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011

22	1,08429	COMB2	Combination	-552,858	-11,549	0	1,372E-16	0	20,0604
22	1,08429	COMB2	Combination	-552,858	-13,645	0	1,372E-16	0	20,0604
22	1,18286	COMB2	Combination	-552,858	-10,625	0	1,372E-16	0	21,2566
22	1,18286	COMB2	Combination	-552,858	-12,759	0	1,372E-16	0	21,2566
22	1,28143	COMB2	Combination	-552,858	-9,74	0	1,372E-16	0	22,3655
22	1,28143	COMB2	Combination	-552,858	-11,911	0	1,372E-16	0	22,3655
22	1,38	COMB2	Combination	-552,858	-8,892	0	1,372E-16	0	23,3908
22	1,38	COMB2	Combination	-552,858	-11,099	0	1,372E-16	0	23,3908
22	1,47857	COMB2	Combination	-552,858	-8,08	0	1,372E-16	0	24,336
22	1,47857	COMB2	Combination	-552,858	-10,322	0	1,372E-16	0	24,336
22	1,57714	COMB2	Combination	-552,858	-7,303	0	1,372E-16	0	25,2046
22	1,57714	COMB2	Combination	-552,858	-9,578	0	1,372E-16	0	25,2046
22	1,67571	COMB2	Combination	-552,858	-6,559	0	1,372E-16	0	26
22	1,67571	COMB2	Combination	-552,858	-8,867	0	1,372E-16	0	26
22	1,77429	COMB2	Combination	-552,858	-5,848	0	1,372E-16	0	26,7252
22	1,77429	COMB2	Combination	-552,858	-8,187	0	1,372E-16	0	26,7252
22	1,87286	COMB2	Combination	-552,858	-5,168	0	1,372E-16	0	27,3834
22	1,87286	COMB2	Combination	-552,858	-7,537	0	1,372E-16	0	27,3834
22	1,97143	COMB2	Combination	-552,858	-4,517	0	1,372E-16	0	27,9775
22	1,97143	COMB2	Combination	-552,858	-6,915	0	1,372E-16	0	27,9775
22	2,07	COMB2	Combination	-552,858	-3,896	0	1,372E-16	0	28,5103
22	2,07	COMB2	Combination	-552,858	-6,32	0	1,372E-16	0	28,5103
22	2,16857	COMB2	Combination	-552,858	-3,301	0	1,372E-16	0	28,9845
22	2,16857	COMB2	Combination	-552,858	-5,751	0	1,372E-16	0	28,9845
22	2,26714	COMB2	Combination	-552,858	-2,732	0	1,372E-16	0	29,4026
22	2,26714	COMB2	Combination	-552,858	-5,207	0	1,372E-16	0	29,4026
22	2,36571	COMB2	Combination	-552,858	-2,187	0	1,372E-16	0	29,767
22	2,36571	COMB2	Combination	-552,858	-4,685	0	1,372E-16	0	29,767
22	2,46429	COMB2	Combination	-552,858	-1,665	0	1,372E-16	0	30,08
22	2,46429	COMB2	Combination	-552,858	-4,184	0	1,372E-16	0	30,08
22	2,56286	COMB2	Combination	-552,858	-1,165	0	1,372E-16	0	30,3436
22	2,56286	COMB2	Combination	-552,858	-3,704	0	1,372E-16	0	30,3436
22	2,66143	COMB2	Combination	-552,858	-0,684	0	1,372E-16	0	30,5599
22	2,66143	COMB2	Combination	-552,858	-3,242	0	1,372E-16	0	30,5599
22	2,76	COMB2	Combination	-552,858	-0,222	0	1,372E-16	0	30,7306
22	2,76	COMB2	Combination	-552,858	-2,797	0	1,372E-16	0	30,7306
22	2,85857	COMB2	Combination	-552,858	0,223	0	1,372E-16	0	30,8575
22	2,85857	COMB2	Combination	-552,858	-2,367	0	1,372E-16	0	30,8575
22	2,95714	COMB2	Combination	-552,858	0,652	0	1,372E-16	0	30,942
22	2,95714	COMB2	Combination	-552,858	-1,952	0	1,372E-16	0	30,942
22	3,05571	COMB2	Combination	-552,858	1,067	0	1,372E-16	0	30,9856
22	3,05571	COMB2	Combination	-552,858	-1,55	0	1,372E-16	0	30,9856
22	3,15429	COMB2	Combination	-552,858	1,47	0	1,372E-16	0	30,9896
22	3,15429	COMB2	Combination	-552,858	-1,158	0	1,372E-16	0	30,9896
22	3,25286	COMB2	Combination	-552,858	1,861	0	1,372E-16	0	30,9549
22	3,25286	COMB2	Combination	-552,858	-0,776	0	1,372E-16	0	30,9549
22	3,35143	COMB2	Combination	-552,858	2,243	0	1,372E-16	0	30,8826
22	3,35143	COMB2	Combination	-552,858	-0,403	0	1,372E-16	0	30,8826
22	3,45	COMB2	Combination	-552,858	2,617	0	1,372E-16	0	30,7735

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

Codice documento
SS0558_F0.doc

Rev
F0

Data
20/06/2011

22	0	COMB3	Combination	-626,463	-25,41	0	9,978E-17	0	0
22	0,09857	COMB3	Combination	-626,463	-22,39	0	9,978E-17	0	2,3559
22	0,09857	COMB3	Combination	-626,463	-24,121	0	9,978E-17	0	2,3559
22	0,19714	COMB3	Combination	-626,463	-21,101	0	9,978E-17	0	4,5847
22	0,19714	COMB3	Combination	-626,463	-22,875	0	9,978E-17	0	4,5847
22	0,29571	COMB3	Combination	-626,463	-19,856	0	9,978E-17	0	6,6907
22	0,29571	COMB3	Combination	-626,463	-21,672	0	9,978E-17	0	6,6907
22	0,39429	COMB3	Combination	-626,463	-18,653	0	9,978E-17	0	8,6782
22	0,39429	COMB3	Combination	-626,463	-20,512	0	9,978E-17	0	8,6782
22	0,49286	COMB3	Combination	-626,463	-17,493	0	9,978E-17	0	10,5513
22	0,49286	COMB3	Combination	-626,463	-19,394	0	9,978E-17	0	10,5513
22	0,59143	COMB3	Combination	-626,463	-16,375	0	9,978E-17	0	12,3141
22	0,59143	COMB3	Combination	-626,463	-18,317	0	9,978E-17	0	12,3141
22	0,69	COMB3	Combination	-626,463	-15,298	0	9,978E-17	0	13,9709
22	0,69	COMB3	Combination	-626,463	-17,281	0	9,978E-17	0	13,9709
22	0,78857	COMB3	Combination	-626,463	-14,262	0	9,978E-17	0	15,5255
22	0,78857	COMB3	Combination	-626,463	-16,285	0	9,978E-17	0	15,5255
22	0,88714	COMB3	Combination	-626,463	-13,266	0	9,978E-17	0	16,982
22	0,88714	COMB3	Combination	-626,463	-15,328	0	9,978E-17	0	16,982
22	0,98571	COMB3	Combination	-626,463	-12,309	0	9,978E-17	0	18,3441
22	0,98571	COMB3	Combination	-626,463	-14,409	0	9,978E-17	0	18,3441
22	1,08429	COMB3	Combination	-626,463	-11,39	0	9,978E-17	0	19,6156
22	1,08429	COMB3	Combination	-626,463	-13,528	0	9,978E-17	0	19,6156
22	1,18286	COMB3	Combination	-626,463	-10,509	0	9,978E-17	0	20,8003
22	1,18286	COMB3	Combination	-626,463	-12,683	0	9,978E-17	0	20,8003
22	1,28143	COMB3	Combination	-626,463	-9,663	0	9,978E-17	0	21,9016
22	1,28143	COMB3	Combination	-626,463	-11,873	0	9,978E-17	0	21,9016
22	1,38	COMB3	Combination	-626,463	-8,853	0	9,978E-17	0	22,9231
22	1,38	COMB3	Combination	-626,463	-11,097	0	9,978E-17	0	22,9231
22	1,47857	COMB3	Combination	-626,463	-8,077	0	9,978E-17	0	23,8681
22	1,47857	COMB3	Combination	-626,463	-10,354	0	9,978E-17	0	23,8681
22	1,57714	COMB3	Combination	-626,463	-7,334	0	9,978E-17	0	24,7399
22	1,57714	COMB3	Combination	-626,463	-9,642	0	9,978E-17	0	24,7399
22	1,67571	COMB3	Combination	-626,463	-6,623	0	9,978E-17	0	25,5415
22	1,67571	COMB3	Combination	-626,463	-8,962	0	9,978E-17	0	25,5415
22	1,77429	COMB3	Combination	-626,463	-5,942	0	9,978E-17	0	26,2761
22	1,77429	COMB3	Combination	-626,463	-8,31	0	9,978E-17	0	26,2761
22	1,87286	COMB3	Combination	-626,463	-5,291	0	9,978E-17	0	26,9464
22	1,87286	COMB3	Combination	-626,463	-7,687	0	9,978E-17	0	26,9464
22	1,97143	COMB3	Combination	-626,463	-4,667	0	9,978E-17	0	27,5553
22	1,97143	COMB3	Combination	-626,463	-7,09	0	9,978E-17	0	27,5553
22	2,07	COMB3	Combination	-626,463	-4,07	0	9,978E-17	0	28,1053
22	2,07	COMB3	Combination	-626,463	-6,518	0	9,978E-17	0	28,1053
22	2,16857	COMB3	Combination	-626,463	-3,499	0	9,978E-17	0	28,599
22	2,16857	COMB3	Combination	-626,463	-5,971	0	9,978E-17	0	28,599
22	2,26714	COMB3	Combination	-626,463	-2,951	0	9,978E-17	0	29,0387
22	2,26714	COMB3	Combination	-626,463	-5,446	0	9,978E-17	0	29,0387
22	2,36571	COMB3	Combination	-626,463	-2,426	0	9,978E-17	0	29,4267
22	2,36571	COMB3	Combination	-626,463	-4,942	0	9,978E-17	0	29,4267

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011

22	2,46429	COMB3	Combination	-626,463	-1,922	0	9,978E-17	0	29,765
22	2,46429	COMB3	Combination	-626,463	-4,458	0	9,978E-17	0	29,765
22	2,56286	COMB3	Combination	-626,463	-1,438	0	9,978E-17	0	30,0556
22	2,56286	COMB3	Combination	-626,463	-3,992	0	9,978E-17	0	30,0556
22	2,66143	COMB3	Combination	-626,463	-0,972	0	9,978E-17	0	30,3002
22	2,66143	COMB3	Combination	-626,463	-3,543	0	9,978E-17	0	30,3002
22	2,76	COMB3	Combination	-626,463	-0,523	0	9,978E-17	0	30,5006
22	2,76	COMB3	Combination	-626,463	-3,109	0	9,978E-17	0	30,5006
22	2,85857	COMB3	Combination	-626,463	-0,09	0	9,978E-17	0	30,6583
22	2,85857	COMB3	Combination	-626,463	-2,689	0	9,978E-17	0	30,6583
22	2,95714	COMB3	Combination	-626,463	0,33	0	9,978E-17	0	30,7746
22	2,95714	COMB3	Combination	-626,463	-2,282	0	9,978E-17	0	30,7746
22	3,05571	COMB3	Combination	-626,463	0,737	0	9,978E-17	0	30,8507
22	3,05571	COMB3	Combination	-626,463	-1,886	0	9,978E-17	0	30,8507
22	3,15429	COMB3	Combination	-626,463	1,133	0	9,978E-17	0	30,8878
22	3,15429	COMB3	Combination	-626,463	-1,499	0	9,978E-17	0	30,8878
22	3,25286	COMB3	Combination	-626,463	1,52	0	9,978E-17	0	30,8868
22	3,25286	COMB3	Combination	-626,463	-1,121	0	9,978E-17	0	30,8868
22	3,35143	COMB3	Combination	-626,463	1,899	0	9,978E-17	0	30,8485
22	3,35143	COMB3	Combination	-626,463	-0,749	0	9,978E-17	0	30,8485
22	3,45	COMB3	Combination	-626,463	2,271	0	9,978E-17	0	30,7735
22	0	COMB4	Combination	-719,602	-26,461	0	1,564E-16	0	0
22	0,09857	COMB4	Combination	-719,602	-23,442	0	1,564E-16	0	2,4595
22	0,09857	COMB4	Combination	-719,602	-25,076	0	1,564E-16	0	2,4595
22	0,19714	COMB4	Combination	-719,602	-22,057	0	1,564E-16	0	4,7825
22	0,19714	COMB4	Combination	-719,602	-23,738	0	1,564E-16	0	4,7825
22	0,29571	COMB4	Combination	-719,602	-20,719	0	1,564E-16	0	6,9736
22	0,29571	COMB4	Combination	-719,602	-22,446	0	1,564E-16	0	6,9736
22	0,39429	COMB4	Combination	-719,602	-19,427	0	1,564E-16	0	9,0373
22	0,39429	COMB4	Combination	-719,602	-21,2	0	1,564E-16	0	9,0373
22	0,49286	COMB4	Combination	-719,602	-18,181	0	1,564E-16	0	10,9782
22	0,49286	COMB4	Combination	-719,602	-20	0	1,564E-16	0	10,9782
22	0,59143	COMB4	Combination	-719,602	-16,98	0	1,564E-16	0	12,8008
22	0,59143	COMB4	Combination	-719,602	-18,843	0	1,564E-16	0	12,8008
22	0,69	COMB4	Combination	-719,602	-15,824	0	1,564E-16	0	14,5094
22	0,69	COMB4	Combination	-719,602	-17,731	0	1,564E-16	0	14,5094
22	0,78857	COMB4	Combination	-719,602	-14,712	0	1,564E-16	0	16,1084
22	0,78857	COMB4	Combination	-719,602	-16,662	0	1,564E-16	0	16,1084
22	0,88714	COMB4	Combination	-719,602	-13,643	0	1,564E-16	0	17,602
22	0,88714	COMB4	Combination	-719,602	-15,635	0	1,564E-16	0	17,602
22	0,98571	COMB4	Combination	-719,602	-12,616	0	1,564E-16	0	18,9944
22	0,98571	COMB4	Combination	-719,602	-14,65	0	1,564E-16	0	18,9944
22	1,08429	COMB4	Combination	-719,602	-11,63	0	1,564E-16	0	20,2896
22	1,08429	COMB4	Combination	-719,602	-13,705	0	1,564E-16	0	20,2896
22	1,18286	COMB4	Combination	-719,602	-10,685	0	1,564E-16	0	21,4917
22	1,18286	COMB4	Combination	-719,602	-12,799	0	1,564E-16	0	21,4917
22	1,28143	COMB4	Combination	-719,602	-9,779	0	1,564E-16	0	22,6045
22	1,28143	COMB4	Combination	-719,602	-11,931	0	1,564E-16	0	22,6045
22	1,38	COMB4	Combination	-719,602	-8,912	0	1,564E-16	0	23,6318

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011

22	1,38	COMB4	Combination	-719,602	-11,1	0	1,564E-16	0	23,6318
22	1,47857	COMB4	Combination	-719,602	-8,081	0	1,564E-16	0	24,5771
22	1,47857	COMB4	Combination	-719,602	-10,306	0	1,564E-16	0	24,5771
22	1,57714	COMB4	Combination	-719,602	-7,286	0	1,564E-16	0	25,4442
22	1,57714	COMB4	Combination	-719,602	-9,545	0	1,564E-16	0	25,4442
22	1,67571	COMB4	Combination	-719,602	-6,526	0	1,564E-16	0	26,2363
22	1,67571	COMB4	Combination	-719,602	-8,819	0	1,564E-16	0	26,2363
22	1,77429	COMB4	Combination	-719,602	-5,799	0	1,564E-16	0	26,9567
22	1,77429	COMB4	Combination	-719,602	-8,124	0	1,564E-16	0	26,9567
22	1,87286	COMB4	Combination	-719,602	-5,104	0	1,564E-16	0	27,6086
22	1,87286	COMB4	Combination	-719,602	-7,46	0	1,564E-16	0	27,6086
22	1,97143	COMB4	Combination	-719,602	-4,44	0	1,564E-16	0	28,1951
22	1,97143	COMB4	Combination	-719,602	-6,825	0	1,564E-16	0	28,1951
22	2,07	COMB4	Combination	-719,602	-3,806	0	1,564E-16	0	28,7191
22	2,07	COMB4	Combination	-719,602	-6,218	0	1,564E-16	0	28,7191
22	2,16857	COMB4	Combination	-719,602	-3,199	0	1,564E-16	0	29,1832
22	2,16857	COMB4	Combination	-719,602	-5,638	0	1,564E-16	0	29,1832
22	2,26714	COMB4	Combination	-719,602	-2,619	0	1,564E-16	0	29,5902
22	2,26714	COMB4	Combination	-719,602	-5,083	0	1,564E-16	0	29,5902
22	2,36571	COMB4	Combination	-719,602	-2,064	0	1,564E-16	0	29,9424
22	2,36571	COMB4	Combination	-719,602	-4,552	0	1,564E-16	0	29,9424
22	2,46429	COMB4	Combination	-719,602	-1,533	0	1,564E-16	0	30,2423
22	2,46429	COMB4	Combination	-719,602	-4,043	0	1,564E-16	0	30,2423
22	2,56286	COMB4	Combination	-719,602	-1,024	0	1,564E-16	0	30,492
22	2,56286	COMB4	Combination	-719,602	-3,555	0	1,564E-16	0	30,492
22	2,66143	COMB4	Combination	-719,602	-0,536	0	1,564E-16	0	30,6937
22	2,66143	COMB4	Combination	-719,602	-3,087	0	1,564E-16	0	30,6937
22	2,76	COMB4	Combination	-719,602	-0,067	0	1,564E-16	0	30,8491
22	2,76	COMB4	Combination	-719,602	-2,636	0	1,564E-16	0	30,8491
22	2,85857	COMB4	Combination	-719,602	0,384	0	1,564E-16	0	30,9601
22	2,85857	COMB4	Combination	-719,602	-2,202	0	1,564E-16	0	30,9601
22	2,95714	COMB4	Combination	-719,602	0,818	0	1,564E-16	0	31,0283
22	2,95714	COMB4	Combination	-719,602	-1,782	0	1,564E-16	0	31,0283
22	3,05571	COMB4	Combination	-719,602	1,237	0	1,564E-16	0	31,0551
22	3,05571	COMB4	Combination	-719,602	-1,376	0	1,564E-16	0	31,0551
22	3,15429	COMB4	Combination	-719,602	1,643	0	1,564E-16	0	31,042
22	3,15429	COMB4	Combination	-719,602	-0,982	0	1,564E-16	0	31,042
22	3,25286	COMB4	Combination	-719,602	2,037	0	1,564E-16	0	30,99
22	3,25286	COMB4	Combination	-719,602	-0,599	0	1,564E-16	0	30,99
22	3,35143	COMB4	Combination	-719,602	2,421	0	1,564E-16	0	30,9002
22	3,35143	COMB4	Combination	-719,602	-0,224	0	1,564E-16	0	30,9002
22	3,45	COMB4	Combination	-719,602	2,795	0	1,564E-16	0	30,7735
22	0	COMB5	Combination	-608,751	-24,524	0	9,719E-17	0	0
22	0,09857	COMB5	Combination	-608,751	-22,201	0	9,719E-17	0	2,3029
22	0,09857	COMB5	Combination	-608,751	-23,269	0	9,719E-17	0	2,3029
22	0,19714	COMB5	Combination	-608,751	-20,947	0	9,719E-17	0	4,4821
22	0,19714	COMB5	Combination	-608,751	-22,057	0	9,719E-17	0	4,4821
22	0,29571	COMB5	Combination	-608,751	-19,734	0	9,719E-17	0	6,5418
22	0,29571	COMB5	Combination	-608,751	-20,886	0	9,719E-17	0	6,5418

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

Codice documento
SS0558_F0.doc

Rev
F0

Data
20/06/2011

22	0,39429	COMB5	Combination	-608,751	-18,564	0	9,719E-17	0	8,4862
22	0,39429	COMB5	Combination	-608,751	-19,757	0	9,719E-17	0	8,4862
22	0,49286	COMB5	Combination	-608,751	-17,434	0	9,719E-17	0	10,3192
22	0,49286	COMB5	Combination	-608,751	-18,669	0	9,719E-17	0	10,3192
22	0,59143	COMB5	Combination	-608,751	-16,346	0	9,719E-17	0	12,0449
22	0,59143	COMB5	Combination	-608,751	-17,62	0	9,719E-17	0	12,0449
22	0,69	COMB5	Combination	-608,751	-15,298	0	9,719E-17	0	13,6673
22	0,69	COMB5	Combination	-608,751	-16,612	0	9,719E-17	0	13,6673
22	0,78857	COMB5	Combination	-608,751	-14,289	0	9,719E-17	0	15,1903
22	0,78857	COMB5	Combination	-608,751	-15,642	0	9,719E-17	0	15,1903
22	0,88714	COMB5	Combination	-608,751	-13,32	0	9,719E-17	0	16,6177
22	0,88714	COMB5	Combination	-608,751	-14,711	0	9,719E-17	0	16,6177
22	0,98571	COMB5	Combination	-608,751	-12,388	0	9,719E-17	0	17,9533
22	0,98571	COMB5	Combination	-608,751	-13,816	0	9,719E-17	0	17,9533
22	1,08429	COMB5	Combination	-608,751	-11,493	0	9,719E-17	0	19,2007
22	1,08429	COMB5	Combination	-608,751	-12,958	0	9,719E-17	0	19,2007
22	1,18286	COMB5	Combination	-608,751	-10,635	0	9,719E-17	0	20,3635
22	1,18286	COMB5	Combination	-608,751	-12,135	0	9,719E-17	0	20,3635
22	1,28143	COMB5	Combination	-608,751	-9,812	0	9,719E-17	0	21,4451
22	1,28143	COMB5	Combination	-608,751	-11,346	0	9,719E-17	0	21,4451
22	1,38	COMB5	Combination	-608,751	-9,023	0	9,719E-17	0	22,449
22	1,38	COMB5	Combination	-608,751	-10,59	0	9,719E-17	0	22,449
22	1,47857	COMB5	Combination	-608,751	-8,268	0	9,719E-17	0	23,3785
22	1,47857	COMB5	Combination	-608,751	-9,867	0	9,719E-17	0	23,3785
22	1,57714	COMB5	Combination	-608,751	-7,544	0	9,719E-17	0	24,2366
22	1,57714	COMB5	Combination	-608,751	-9,174	0	9,719E-17	0	24,2366
22	1,67571	COMB5	Combination	-608,751	-6,851	0	9,719E-17	0	25,0263
22	1,67571	COMB5	Combination	-608,751	-8,51	0	9,719E-17	0	25,0263
22	1,77429	COMB5	Combination	-608,751	-6,188	0	9,719E-17	0	25,7508
22	1,77429	COMB5	Combination	-608,751	-7,876	0	9,719E-17	0	25,7508
22	1,87286	COMB5	Combination	-608,751	-5,553	0	9,719E-17	0	26,4126
22	1,87286	COMB5	Combination	-608,751	-7,268	0	9,719E-17	0	26,4126
22	1,97143	COMB5	Combination	-608,751	-4,945	0	9,719E-17	0	27,0145
22	1,97143	COMB5	Combination	-608,751	-6,686	0	9,719E-17	0	27,0145
22	2,07	COMB5	Combination	-608,751	-4,363	0	9,719E-17	0	27,5591
22	2,07	COMB5	Combination	-608,751	-6,129	0	9,719E-17	0	27,5591
22	2,16857	COMB5	Combination	-608,751	-3,806	0	9,719E-17	0	28,0487
22	2,16857	COMB5	Combination	-608,751	-5,594	0	9,719E-17	0	28,0487
22	2,26714	COMB5	Combination	-608,751	-3,272	0	9,719E-17	0	28,4857
22	2,26714	COMB5	Combination	-608,751	-5,082	0	9,719E-17	0	28,4857
22	2,36571	COMB5	Combination	-608,751	-2,759	0	9,719E-17	0	28,8722
22	2,36571	COMB5	Combination	-608,751	-4,59	0	9,719E-17	0	28,8722
22	2,46429	COMB5	Combination	-608,751	-2,268	0	9,719E-17	0	29,2102
22	2,46429	COMB5	Combination	-608,751	-4,117	0	9,719E-17	0	29,2102
22	2,56286	COMB5	Combination	-608,751	-1,795	0	9,719E-17	0	29,5016
22	2,56286	COMB5	Combination	-608,751	-3,662	0	9,719E-17	0	29,5016
22	2,66143	COMB5	Combination	-608,751	-1,34	0	9,719E-17	0	29,7481
22	2,66143	COMB5	Combination	-608,751	-3,223	0	9,719E-17	0	29,7481
22	2,76	COMB5	Combination	-608,751	-0,901	0	9,719E-17	0	29,9513

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

Codice documento
SS0558_F0.doc

Rev
F0

Data
20/06/2011

22	2,76	COMB5	Combination	-608,751	-2,799	0	9,719E-17	0	29,9513
22	2,85857	COMB5	Combination	-608,751	-0,476	0	9,719E-17	0	30,1128
22	2,85857	COMB5	Combination	-608,751	-2,388	0	9,719E-17	0	30,1128
22	2,95714	COMB5	Combination	-608,751	-0,066	0	9,719E-17	0	30,2337
22	2,95714	COMB5	Combination	-608,751	-1,989	0	9,719E-17	0	30,2337
22	3,05571	COMB5	Combination	-608,751	0,333	0	9,719E-17	0	30,3154
22	3,05571	COMB5	Combination	-608,751	-1,601	0	9,719E-17	0	30,3154
22	3,15429	COMB5	Combination	-608,751	0,722	0	9,719E-17	0	30,3587
22	3,15429	COMB5	Combination	-608,751	-1,222	0	9,719E-17	0	30,3587
22	3,25286	COMB5	Combination	-608,751	1,101	0	9,719E-17	0	30,3647
22	3,25286	COMB5	Combination	-608,751	-0,85	0	9,719E-17	0	30,3647
22	3,35143	COMB5	Combination	-608,751	1,473	0	9,719E-17	0	30,334
22	3,35143	COMB5	Combination	-608,751	-0,484	0	9,719E-17	0	30,334
22	3,45	COMB5	Combination	-608,751	1,838	0	9,719E-17	0	30,2673
22	0	COMB6	Combination	-229,278	-25,41	0	9,978E-17	0	0
22	0,09857	COMB6	Combination	-229,278	-22,39	0	9,978E-17	0	2,3559
22	0,09857	COMB6	Combination	-229,278	-24,121	0	9,978E-17	0	2,3559
22	0,19714	COMB6	Combination	-229,278	-21,101	0	9,978E-17	0	4,5847
22	0,19714	COMB6	Combination	-229,278	-22,875	0	9,978E-17	0	4,5847
22	0,29571	COMB6	Combination	-229,278	-19,856	0	9,978E-17	0	6,6907
22	0,29571	COMB6	Combination	-229,278	-21,672	0	9,978E-17	0	6,6907
22	0,39429	COMB6	Combination	-229,278	-18,653	0	9,978E-17	0	8,6782
22	0,39429	COMB6	Combination	-229,278	-20,512	0	9,978E-17	0	8,6782
22	0,49286	COMB6	Combination	-229,278	-17,493	0	9,978E-17	0	10,5513
22	0,49286	COMB6	Combination	-229,278	-19,394	0	9,978E-17	0	10,5513
22	0,59143	COMB6	Combination	-229,278	-16,375	0	9,978E-17	0	12,3141
22	0,59143	COMB6	Combination	-229,278	-18,317	0	9,978E-17	0	12,3141
22	0,69	COMB6	Combination	-229,278	-15,298	0	9,978E-17	0	13,9709
22	0,69	COMB6	Combination	-229,278	-17,281	0	9,978E-17	0	13,9709
22	0,78857	COMB6	Combination	-229,278	-14,262	0	9,978E-17	0	15,5255
22	0,78857	COMB6	Combination	-229,278	-16,285	0	9,978E-17	0	15,5255
22	0,88714	COMB6	Combination	-229,278	-13,266	0	9,978E-17	0	16,982
22	0,88714	COMB6	Combination	-229,278	-15,328	0	9,978E-17	0	16,982
22	0,98571	COMB6	Combination	-229,278	-12,309	0	9,978E-17	0	18,3441
22	0,98571	COMB6	Combination	-229,278	-14,409	0	9,978E-17	0	18,3441
22	1,08429	COMB6	Combination	-229,278	-11,39	0	9,978E-17	0	19,6156
22	1,08429	COMB6	Combination	-229,278	-13,528	0	9,978E-17	0	19,6156
22	1,18286	COMB6	Combination	-229,278	-10,509	0	9,978E-17	0	20,8003
22	1,18286	COMB6	Combination	-229,278	-12,683	0	9,978E-17	0	20,8003
22	1,28143	COMB6	Combination	-229,278	-9,663	0	9,978E-17	0	21,9016
22	1,28143	COMB6	Combination	-229,278	-11,873	0	9,978E-17	0	21,9016
22	1,38	COMB6	Combination	-229,278	-8,853	0	9,978E-17	0	22,9231
22	1,38	COMB6	Combination	-229,278	-11,097	0	9,978E-17	0	22,9231
22	1,47857	COMB6	Combination	-229,278	-8,077	0	9,978E-17	0	23,8681
22	1,47857	COMB6	Combination	-229,278	-10,354	0	9,978E-17	0	23,8681
22	1,57714	COMB6	Combination	-229,278	-7,334	0	9,978E-17	0	24,7399
22	1,57714	COMB6	Combination	-229,278	-9,642	0	9,978E-17	0	24,7399
22	1,67571	COMB6	Combination	-229,278	-6,623	0	9,978E-17	0	25,5415
22	1,67571	COMB6	Combination	-229,278	-8,962	0	9,978E-17	0	25,5415

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD	Codice documento	Rev	Data
	SS0558_F0.doc	F0	20/06/2011

22	1,77429	COMB6	Combination	-229,278	-5,942	0	9,978E-17	0	26,2761
22	1,77429	COMB6	Combination	-229,278	-8,31	0	9,978E-17	0	26,2761
22	1,87286	COMB6	Combination	-229,278	-5,291	0	9,978E-17	0	26,9464
22	1,87286	COMB6	Combination	-229,278	-7,687	0	9,978E-17	0	26,9464
22	1,97143	COMB6	Combination	-229,278	-4,667	0	9,978E-17	0	27,5553
22	1,97143	COMB6	Combination	-229,278	-7,09	0	9,978E-17	0	27,5553
22	2,07	COMB6	Combination	-229,278	-4,07	0	9,978E-17	0	28,1053
22	2,07	COMB6	Combination	-229,278	-6,518	0	9,978E-17	0	28,1053
22	2,16857	COMB6	Combination	-229,278	-3,499	0	9,978E-17	0	28,599
22	2,16857	COMB6	Combination	-229,278	-5,971	0	9,978E-17	0	28,599
22	2,26714	COMB6	Combination	-229,278	-2,951	0	9,978E-17	0	29,0387
22	2,26714	COMB6	Combination	-229,278	-5,446	0	9,978E-17	0	29,0387
22	2,36571	COMB6	Combination	-229,278	-2,426	0	9,978E-17	0	29,4267
22	2,36571	COMB6	Combination	-229,278	-4,942	0	9,978E-17	0	29,4267
22	2,46429	COMB6	Combination	-229,278	-1,922	0	9,978E-17	0	29,765
22	2,46429	COMB6	Combination	-229,278	-4,458	0	9,978E-17	0	29,765
22	2,56286	COMB6	Combination	-229,278	-1,438	0	9,978E-17	0	30,0556
22	2,56286	COMB6	Combination	-229,278	-3,992	0	9,978E-17	0	30,0556
22	2,66143	COMB6	Combination	-229,278	-0,972	0	9,978E-17	0	30,3002
22	2,66143	COMB6	Combination	-229,278	-3,543	0	9,978E-17	0	30,3002
22	2,76	COMB6	Combination	-229,278	-0,523	0	9,978E-17	0	30,5006
22	2,76	COMB6	Combination	-229,278	-3,109	0	9,978E-17	0	30,5006
22	2,85857	COMB6	Combination	-229,278	-0,09	0	9,978E-17	0	30,6583
22	2,85857	COMB6	Combination	-229,278	-2,689	0	9,978E-17	0	30,6583
22	2,95714	COMB6	Combination	-229,278	0,33	0	9,978E-17	0	30,7746
22	2,95714	COMB6	Combination	-229,278	-2,282	0	9,978E-17	0	30,7746
22	3,05571	COMB6	Combination	-229,278	0,737	0	9,978E-17	0	30,8507
22	3,05571	COMB6	Combination	-229,278	-1,886	0	9,978E-17	0	30,8507
22	3,15429	COMB6	Combination	-229,278	1,133	0	9,978E-17	0	30,8878
22	3,15429	COMB6	Combination	-229,278	-1,499	0	9,978E-17	0	30,8878
22	3,25286	COMB6	Combination	-229,278	1,52	0	9,978E-17	0	30,8868
22	3,25286	COMB6	Combination	-229,278	-1,121	0	9,978E-17	0	30,8868
22	3,35143	COMB6	Combination	-229,278	1,899	0	9,978E-17	0	30,8485
22	3,35143	COMB6	Combination	-229,278	-0,749	0	9,978E-17	0	30,8485
22	3,45	COMB6	Combination	-229,278	2,271	0	9,978E-17	0	30,7735
22	0	COMB7	Combination	-423,222	-18,026	0	8,499E-17	0	0
22	0,09857	COMB7	Combination	-423,222	-15,704	0	8,499E-17	0	1,6624
22	0,09857	COMB7	Combination	-423,222	-17,106	0	8,499E-17	0	1,6624
22	0,19714	COMB7	Combination	-423,222	-14,783	0	8,499E-17	0	3,2341
22	0,19714	COMB7	Combination	-423,222	-16,216	0	8,499E-17	0	3,2341
22	0,29571	COMB7	Combination	-423,222	-13,893	0	8,499E-17	0	4,718
22	0,29571	COMB7	Combination	-423,222	-15,357	0	8,499E-17	0	4,718
22	0,39429	COMB7	Combination	-423,222	-13,034	0	8,499E-17	0	6,1173
22	0,39429	COMB7	Combination	-423,222	-14,528	0	8,499E-17	0	6,1173
22	0,49286	COMB7	Combination	-423,222	-12,205	0	8,499E-17	0	7,4349
22	0,49286	COMB7	Combination	-423,222	-13,73	0	8,499E-17	0	7,4349
22	0,59143	COMB7	Combination	-423,222	-11,407	0	8,499E-17	0	8,6737
22	0,59143	COMB7	Combination	-423,222	-12,961	0	8,499E-17	0	8,6737
22	0,69	COMB7	Combination	-423,222	-10,638	0	8,499E-17	0	9,8368

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011

22	0,69	COMB7	Combination	-423,222	-12,221	0	8,499E-17	0	9,8368
22	0,78857	COMB7	Combination	-423,222	-9,898	0	8,499E-17	0	10,9269
22	0,78857	COMB7	Combination	-423,222	-11,509	0	8,499E-17	0	10,9269
22	0,88714	COMB7	Combination	-423,222	-9,187	0	8,499E-17	0	11,947
22	0,88714	COMB7	Combination	-423,222	-10,826	0	8,499E-17	0	11,947
22	0,98571	COMB7	Combination	-423,222	-8,504	0	8,499E-17	0	12,8996
22	0,98571	COMB7	Combination	-423,222	-10,17	0	8,499E-17	0	12,8996
22	1,08429	COMB7	Combination	-423,222	-7,848	0	8,499E-17	0	13,7877
22	1,08429	COMB7	Combination	-423,222	-9,541	0	8,499E-17	0	13,7877
22	1,18286	COMB7	Combination	-423,222	-7,219	0	8,499E-17	0	14,6137
22	1,18286	COMB7	Combination	-423,222	-8,938	0	8,499E-17	0	14,6137
22	1,28143	COMB7	Combination	-423,222	-6,615	0	8,499E-17	0	15,3803
22	1,28143	COMB7	Combination	-423,222	-8,36	0	8,499E-17	0	15,3803
22	1,38	COMB7	Combination	-423,222	-6,037	0	8,499E-17	0	16,0899
22	1,38	COMB7	Combination	-423,222	-7,807	0	8,499E-17	0	16,0899
22	1,47857	COMB7	Combination	-423,222	-5,484	0	8,499E-17	0	16,7449
22	1,47857	COMB7	Combination	-423,222	-7,277	0	8,499E-17	0	16,7449
22	1,57714	COMB7	Combination	-423,222	-4,954	0	8,499E-17	0	17,3477
22	1,57714	COMB7	Combination	-423,222	-6,77	0	8,499E-17	0	17,3477
22	1,67571	COMB7	Combination	-423,222	-4,447	0	8,499E-17	0	17,9006
22	1,67571	COMB7	Combination	-423,222	-6,285	0	8,499E-17	0	17,9006
22	1,77429	COMB7	Combination	-423,222	-3,962	0	8,499E-17	0	18,4056
22	1,77429	COMB7	Combination	-423,222	-5,821	0	8,499E-17	0	18,4056
22	1,87286	COMB7	Combination	-423,222	-3,498	0	8,499E-17	0	18,8649
22	1,87286	COMB7	Combination	-423,222	-5,377	0	8,499E-17	0	18,8649
22	1,97143	COMB7	Combination	-423,222	-3,055	0	8,499E-17	0	19,2805
22	1,97143	COMB7	Combination	-423,222	-4,953	0	8,499E-17	0	19,2805
22	2,07	COMB7	Combination	-423,222	-2,63	0	8,499E-17	0	19,6542
22	2,07	COMB7	Combination	-423,222	-4,547	0	8,499E-17	0	19,6542
22	2,16857	COMB7	Combination	-423,222	-2,224	0	8,499E-17	0	19,9879
22	2,16857	COMB7	Combination	-423,222	-4,158	0	8,499E-17	0	19,9879
22	2,26714	COMB7	Combination	-423,222	-1,835	0	8,499E-17	0	20,2833
22	2,26714	COMB7	Combination	-423,222	-3,785	0	8,499E-17	0	20,2833
22	2,36571	COMB7	Combination	-423,222	-1,463	0	8,499E-17	0	20,542
22	2,36571	COMB7	Combination	-423,222	-3,428	0	8,499E-17	0	20,542
22	2,46429	COMB7	Combination	-423,222	-1,106	0	8,499E-17	0	20,7655
22	2,46429	COMB7	Combination	-423,222	-3,086	0	8,499E-17	0	20,7655
22	2,56286	COMB7	Combination	-423,222	-0,763	0	8,499E-17	0	20,9552
22	2,56286	COMB7	Combination	-423,222	-2,757	0	8,499E-17	0	20,9552
22	2,66143	COMB7	Combination	-423,222	-0,434	0	8,499E-17	0	21,1124
22	2,66143	COMB7	Combination	-423,222	-2,44	0	8,499E-17	0	21,1124
22	2,76	COMB7	Combination	-423,222	-0,117	0	8,499E-17	0	21,2384
22	2,76	COMB7	Combination	-423,222	-2,134	0	8,499E-17	0	21,2384
22	2,85857	COMB7	Combination	-423,222	0,188	0	8,499E-17	0	21,3343
22	2,85857	COMB7	Combination	-423,222	-1,839	0	8,499E-17	0	21,3343
22	2,95714	COMB7	Combination	-423,222	0,483	0	8,499E-17	0	21,4012
22	2,95714	COMB7	Combination	-423,222	-1,554	0	8,499E-17	0	21,4012
22	3,05571	COMB7	Combination	-423,222	0,769	0	8,499E-17	0	21,4399
22	3,05571	COMB7	Combination	-423,222	-1,276	0	8,499E-17	0	21,4399

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD	Codice documento	Rev	Data
	SS0558_F0.doc	F0	20/06/2011

22	3,15429	COMB7	Combination	-423,222	1,046	0	8,499E-17	0	21,4512
22	3,15429	COMB7	Combination	-423,222	-1,006	0	8,499E-17	0	21,4512
22	3,25286	COMB7	Combination	-423,222	1,316	0	8,499E-17	0	21,4359
22	3,25286	COMB7	Combination	-423,222	-0,742	0	8,499E-17	0	21,4359
22	3,35143	COMB7	Combination	-423,222	1,58	0	8,499E-17	0	21,3946
22	3,35143	COMB7	Combination	-423,222	-0,484	0	8,499E-17	0	21,3946
22	3,45	COMB7	Combination	-423,222	1,839	0	8,499E-17	0	21,3279
22	0	COMB8	Combination	-476,49	-18,628	0	1,174E-16	0	0
22	0,09857	COMB8	Combination	-476,49	-16,305	0	1,174E-16	0	1,7217
22	0,09857	COMB8	Combination	-476,49	-17,652	0	1,174E-16	0	1,7217
22	0,19714	COMB8	Combination	-476,49	-15,329	0	1,174E-16	0	3,3472
22	0,19714	COMB8	Combination	-476,49	-16,709	0	1,174E-16	0	3,3472
22	0,29571	COMB8	Combination	-476,49	-14,387	0	1,174E-16	0	4,8798
22	0,29571	COMB8	Combination	-476,49	-15,799	0	1,174E-16	0	4,8798
22	0,39429	COMB8	Combination	-476,49	-13,477	0	1,174E-16	0	6,3227
22	0,39429	COMB8	Combination	-476,49	-14,922	0	1,174E-16	0	6,3227
22	0,49286	COMB8	Combination	-476,49	-12,599	0	1,174E-16	0	7,6791
22	0,49286	COMB8	Combination	-476,49	-14,076	0	1,174E-16	0	7,6791
22	0,59143	COMB8	Combination	-476,49	-11,753	0	1,174E-16	0	8,9521
22	0,59143	COMB8	Combination	-476,49	-13,261	0	1,174E-16	0	8,9521
22	0,69	COMB8	Combination	-476,49	-10,939	0	1,174E-16	0	10,1448
22	0,69	COMB8	Combination	-476,49	-12,478	0	1,174E-16	0	10,1448
22	0,78857	COMB8	Combination	-476,49	-10,155	0	1,174E-16	0	11,2603
22	0,78857	COMB8	Combination	-476,49	-11,725	0	1,174E-16	0	11,2603
22	0,88714	COMB8	Combination	-476,49	-9,402	0	1,174E-16	0	12,3016
22	0,88714	COMB8	Combination	-476,49	-11,002	0	1,174E-16	0	12,3016
22	0,98571	COMB8	Combination	-476,49	-8,679	0	1,174E-16	0	13,2716
22	0,98571	COMB8	Combination	-476,49	-10,308	0	1,174E-16	0	13,2716
22	1,08429	COMB8	Combination	-476,49	-7,985	0	1,174E-16	0	14,1732
22	1,08429	COMB8	Combination	-476,49	-9,642	0	1,174E-16	0	14,1732
22	1,18286	COMB8	Combination	-476,49	-7,32	0	1,174E-16	0	15,0092
22	1,18286	COMB8	Combination	-476,49	-9,004	0	1,174E-16	0	15,0092
22	1,28143	COMB8	Combination	-476,49	-6,682	0	1,174E-16	0	15,7823
22	1,28143	COMB8	Combination	-476,49	-8,394	0	1,174E-16	0	15,7823
22	1,38	COMB8	Combination	-476,49	-6,071	0	1,174E-16	0	16,4952
22	1,38	COMB8	Combination	-476,49	-7,809	0	1,174E-16	0	16,4952
22	1,47857	COMB8	Combination	-476,49	-5,486	0	1,174E-16	0	17,1504
22	1,47857	COMB8	Combination	-476,49	-7,249	0	1,174E-16	0	17,1504
22	1,57714	COMB8	Combination	-476,49	-4,927	0	1,174E-16	0	17,7505
22	1,57714	COMB8	Combination	-476,49	-6,714	0	1,174E-16	0	17,7505
22	1,67571	COMB8	Combination	-476,49	-4,392	0	1,174E-16	0	18,2979
22	1,67571	COMB8	Combination	-476,49	-6,203	0	1,174E-16	0	18,2979
22	1,77429	COMB8	Combination	-476,49	-3,88	0	1,174E-16	0	18,7949
22	1,77429	COMB8	Combination	-476,49	-5,714	0	1,174E-16	0	18,7949
22	1,87286	COMB8	Combination	-476,49	-3,392	0	1,174E-16	0	19,2437
22	1,87286	COMB8	Combination	-476,49	-5,247	0	1,174E-16	0	19,2437
22	1,97143	COMB8	Combination	-476,49	-2,925	0	1,174E-16	0	19,6465
22	1,97143	COMB8	Combination	-476,49	-4,801	0	1,174E-16	0	19,6465
22	2,07	COMB8	Combination	-476,49	-2,479	0	1,174E-16	0	20,0053

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011

22	2,07	COMB8	Combination	-476,49	-4,375	0	1,174E-16	0	20,0053
22	2,16857	COMB8	Combination	-476,49	-2,052	0	1,174E-16	0	20,3221
22	2,16857	COMB8	Combination	-476,49	-3,968	0	1,174E-16	0	20,3221
22	2,26714	COMB8	Combination	-476,49	-1,645	0	1,174E-16	0	20,5987
22	2,26714	COMB8	Combination	-476,49	-3,578	0	1,174E-16	0	20,5987
22	2,36571	COMB8	Combination	-476,49	-1,256	0	1,174E-16	0	20,8369
22	2,36571	COMB8	Combination	-476,49	-3,206	0	1,174E-16	0	20,8369
22	2,46429	COMB8	Combination	-476,49	-0,883	0	1,174E-16	0	21,0384
22	2,46429	COMB8	Combination	-476,49	-2,849	0	1,174E-16	0	21,0384
22	2,56286	COMB8	Combination	-476,49	-0,526	0	1,174E-16	0	21,2048
22	2,56286	COMB8	Combination	-476,49	-2,507	0	1,174E-16	0	21,2048
22	2,66143	COMB8	Combination	-476,49	-0,184	0	1,174E-16	0	21,3374
22	2,66143	COMB8	Combination	-476,49	-2,179	0	1,174E-16	0	21,3374
22	2,76	COMB8	Combination	-476,49	0,144	0	1,174E-16	0	21,4377
22	2,76	COMB8	Combination	-476,49	-1,864	0	1,174E-16	0	21,4377
22	2,85857	COMB8	Combination	-476,49	0,459	0	1,174E-16	0	21,5069
22	2,85857	COMB8	Combination	-476,49	-1,56	0	1,174E-16	0	21,5069
22	2,95714	COMB8	Combination	-476,49	0,762	0	1,174E-16	0	21,5463
22	2,95714	COMB8	Combination	-476,49	-1,268	0	1,174E-16	0	21,5463
22	3,05571	COMB8	Combination	-476,49	1,055	0	1,174E-16	0	21,5568
22	3,05571	COMB8	Combination	-476,49	-0,985	0	1,174E-16	0	21,5568
22	3,15429	COMB8	Combination	-476,49	1,338	0	1,174E-16	0	21,5394
22	3,15429	COMB8	Combination	-476,49	-0,71	0	1,174E-16	0	21,5394
22	3,25286	COMB8	Combination	-476,49	1,612	0	1,174E-16	0	21,4949
22	3,25286	COMB8	Combination	-476,49	-0,444	0	1,174E-16	0	21,4949
22	3,35143	COMB8	Combination	-476,49	1,879	0	1,174E-16	0	21,4242
22	3,35143	COMB8	Combination	-476,49	-0,184	0	1,174E-16	0	21,4242
22	3,45	COMB8	Combination	-476,49	2,139	0	1,174E-16	0	21,3279
22	0	COMB9	Combination	-540,281	-18,026	0	8,499E-17	0	0
22	0,09857	COMB9	Combination	-540,281	-15,704	0	8,499E-17	0	1,6624
22	0,09857	COMB9	Combination	-540,281	-17,106	0	8,499E-17	0	1,6624
22	0,19714	COMB9	Combination	-540,281	-14,783	0	8,499E-17	0	3,2341
22	0,19714	COMB9	Combination	-540,281	-16,216	0	8,499E-17	0	3,2341
22	0,29571	COMB9	Combination	-540,281	-13,893	0	8,499E-17	0	4,718
22	0,29571	COMB9	Combination	-540,281	-15,357	0	8,499E-17	0	4,718
22	0,39429	COMB9	Combination	-540,281	-13,034	0	8,499E-17	0	6,1173
22	0,39429	COMB9	Combination	-540,281	-14,528	0	8,499E-17	0	6,1173
22	0,49286	COMB9	Combination	-540,281	-12,205	0	8,499E-17	0	7,4349
22	0,49286	COMB9	Combination	-540,281	-13,73	0	8,499E-17	0	7,4349
22	0,59143	COMB9	Combination	-540,281	-11,407	0	8,499E-17	0	8,6737
22	0,59143	COMB9	Combination	-540,281	-12,961	0	8,499E-17	0	8,6737
22	0,69	COMB9	Combination	-540,281	-10,638	0	8,499E-17	0	9,8368
22	0,69	COMB9	Combination	-540,281	-12,221	0	8,499E-17	0	9,8368
22	0,78857	COMB9	Combination	-540,281	-9,898	0	8,499E-17	0	10,9269
22	0,78857	COMB9	Combination	-540,281	-11,509	0	8,499E-17	0	10,9269
22	0,88714	COMB9	Combination	-540,281	-9,187	0	8,499E-17	0	11,947
22	0,88714	COMB9	Combination	-540,281	-10,826	0	8,499E-17	0	11,947
22	0,98571	COMB9	Combination	-540,281	-8,504	0	8,499E-17	0	12,8996
22	0,98571	COMB9	Combination	-540,281	-10,17	0	8,499E-17	0	12,8996

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

Codice documento
SS0558_F0.doc

Rev
F0

Data
20/06/2011

22	1,08429	COMB9	Combination	-540,281	-7,848	0	8,499E-17	0	13,7877
22	1,08429	COMB9	Combination	-540,281	-9,541	0	8,499E-17	0	13,7877
22	1,18286	COMB9	Combination	-540,281	-7,219	0	8,499E-17	0	14,6137
22	1,18286	COMB9	Combination	-540,281	-8,938	0	8,499E-17	0	14,6137
22	1,28143	COMB9	Combination	-540,281	-6,615	0	8,499E-17	0	15,3803
22	1,28143	COMB9	Combination	-540,281	-8,36	0	8,499E-17	0	15,3803
22	1,38	COMB9	Combination	-540,281	-6,037	0	8,499E-17	0	16,0899
22	1,38	COMB9	Combination	-540,281	-7,807	0	8,499E-17	0	16,0899
22	1,47857	COMB9	Combination	-540,281	-5,484	0	8,499E-17	0	16,7449
22	1,47857	COMB9	Combination	-540,281	-7,277	0	8,499E-17	0	16,7449
22	1,57714	COMB9	Combination	-540,281	-4,954	0	8,499E-17	0	17,3477
22	1,57714	COMB9	Combination	-540,281	-6,77	0	8,499E-17	0	17,3477
22	1,67571	COMB9	Combination	-540,281	-4,447	0	8,499E-17	0	17,9006
22	1,67571	COMB9	Combination	-540,281	-6,285	0	8,499E-17	0	17,9006
22	1,77429	COMB9	Combination	-540,281	-3,962	0	8,499E-17	0	18,4056
22	1,77429	COMB9	Combination	-540,281	-5,821	0	8,499E-17	0	18,4056
22	1,87286	COMB9	Combination	-540,281	-3,498	0	8,499E-17	0	18,8649
22	1,87286	COMB9	Combination	-540,281	-5,377	0	8,499E-17	0	18,8649
22	1,97143	COMB9	Combination	-540,281	-3,055	0	8,499E-17	0	19,2805
22	1,97143	COMB9	Combination	-540,281	-4,953	0	8,499E-17	0	19,2805
22	2,07	COMB9	Combination	-540,281	-2,63	0	8,499E-17	0	19,6542
22	2,07	COMB9	Combination	-540,281	-4,547	0	8,499E-17	0	19,6542
22	2,16857	COMB9	Combination	-540,281	-2,224	0	8,499E-17	0	19,9879
22	2,16857	COMB9	Combination	-540,281	-4,158	0	8,499E-17	0	19,9879
22	2,26714	COMB9	Combination	-540,281	-1,835	0	8,499E-17	0	20,2833
22	2,26714	COMB9	Combination	-540,281	-3,785	0	8,499E-17	0	20,2833
22	2,36571	COMB9	Combination	-540,281	-1,463	0	8,499E-17	0	20,542
22	2,36571	COMB9	Combination	-540,281	-3,428	0	8,499E-17	0	20,542
22	2,46429	COMB9	Combination	-540,281	-1,106	0	8,499E-17	0	20,7655
22	2,46429	COMB9	Combination	-540,281	-3,086	0	8,499E-17	0	20,7655
22	2,56286	COMB9	Combination	-540,281	-0,763	0	8,499E-17	0	20,9552
22	2,56286	COMB9	Combination	-540,281	-2,757	0	8,499E-17	0	20,9552
22	2,66143	COMB9	Combination	-540,281	-0,434	0	8,499E-17	0	21,1124
22	2,66143	COMB9	Combination	-540,281	-2,44	0	8,499E-17	0	21,1124
22	2,76	COMB9	Combination	-540,281	-0,117	0	8,499E-17	0	21,2384
22	2,76	COMB9	Combination	-540,281	-2,134	0	8,499E-17	0	21,2384
22	2,85857	COMB9	Combination	-540,281	0,188	0	8,499E-17	0	21,3343
22	2,85857	COMB9	Combination	-540,281	-1,839	0	8,499E-17	0	21,3343
22	2,95714	COMB9	Combination	-540,281	0,483	0	8,499E-17	0	21,4012
22	2,95714	COMB9	Combination	-540,281	-1,554	0	8,499E-17	0	21,4012
22	3,05571	COMB9	Combination	-540,281	0,769	0	8,499E-17	0	21,4399
22	3,05571	COMB9	Combination	-540,281	-1,276	0	8,499E-17	0	21,4399
22	3,15429	COMB9	Combination	-540,281	1,046	0	8,499E-17	0	21,4512
22	3,15429	COMB9	Combination	-540,281	-1,006	0	8,499E-17	0	21,4512
22	3,25286	COMB9	Combination	-540,281	1,316	0	8,499E-17	0	21,4359
22	3,25286	COMB9	Combination	-540,281	-0,742	0	8,499E-17	0	21,4359
22	3,35143	COMB9	Combination	-540,281	1,58	0	8,499E-17	0	21,3946
22	3,35143	COMB9	Combination	-540,281	-0,484	0	8,499E-17	0	21,3946
22	3,45	COMB9	Combination	-540,281	1,839	0	8,499E-17	0	21,3279

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011

22	0	COMB10	Combination	-621,001	-18,938	0	1,341E-16	0	0
22	0,09857	COMB10	Combination	-621,001	-16,615	0	1,341E-16	0	1,7522
22	0,09857	COMB10	Combination	-621,001	-17,934	0	1,341E-16	0	1,7522
22	0,19714	COMB10	Combination	-621,001	-15,611	0	1,341E-16	0	3,4055
22	0,19714	COMB10	Combination	-621,001	-16,964	0	1,341E-16	0	3,4055
22	0,29571	COMB10	Combination	-621,001	-14,641	0	1,341E-16	0	4,9632
22	0,29571	COMB10	Combination	-621,001	-16,027	0	1,341E-16	0	4,9632
22	0,39429	COMB10	Combination	-621,001	-13,705	0	1,341E-16	0	6,4285
22	0,39429	COMB10	Combination	-621,001	-15,124	0	1,341E-16	0	6,4285
22	0,49286	COMB10	Combination	-621,001	-12,802	0	1,341E-16	0	7,8049
22	0,49286	COMB10	Combination	-621,001	-14,254	0	1,341E-16	0	7,8049
22	0,59143	COMB10	Combination	-621,001	-11,932	0	1,341E-16	0	9,0955
22	0,59143	COMB10	Combination	-621,001	-13,417	0	1,341E-16	0	9,0955
22	0,69	COMB10	Combination	-621,001	-11,094	0	1,341E-16	0	10,3035
22	0,69	COMB10	Combination	-621,001	-12,611	0	1,341E-16	0	10,3035
22	0,78857	COMB10	Combination	-621,001	-10,288	0	1,341E-16	0	11,4321
22	0,78857	COMB10	Combination	-621,001	-11,836	0	1,341E-16	0	11,4321
22	0,88714	COMB10	Combination	-621,001	-9,514	0	1,341E-16	0	12,4843
22	0,88714	COMB10	Combination	-621,001	-11,092	0	1,341E-16	0	12,4843
22	0,98571	COMB10	Combination	-621,001	-8,77	0	1,341E-16	0	13,4633
22	0,98571	COMB10	Combination	-621,001	-10,379	0	1,341E-16	0	13,4633
22	1,08429	COMB10	Combination	-621,001	-8,056	0	1,341E-16	0	14,3718
22	1,08429	COMB10	Combination	-621,001	-9,694	0	1,341E-16	0	14,3718
22	1,18286	COMB10	Combination	-621,001	-7,372	0	1,341E-16	0	15,2129
22	1,18286	COMB10	Combination	-621,001	-9,039	0	1,341E-16	0	15,2129
22	1,28143	COMB10	Combination	-621,001	-6,716	0	1,341E-16	0	15,9894
22	1,28143	COMB10	Combination	-621,001	-8,411	0	1,341E-16	0	15,9894
22	1,38	COMB10	Combination	-621,001	-6,088	0	1,341E-16	0	16,704
22	1,38	COMB10	Combination	-621,001	-7,81	0	1,341E-16	0	16,704
22	1,47857	COMB10	Combination	-621,001	-5,487	0	1,341E-16	0	17,3594
22	1,47857	COMB10	Combination	-621,001	-7,235	0	1,341E-16	0	17,3594
22	1,57714	COMB10	Combination	-621,001	-4,913	0	1,341E-16	0	17,9581
22	1,57714	COMB10	Combination	-621,001	-6,686	0	1,341E-16	0	17,9581
22	1,67571	COMB10	Combination	-621,001	-4,363	0	1,341E-16	0	18,5027
22	1,67571	COMB10	Combination	-621,001	-6,161	0	1,341E-16	0	18,5027
22	1,77429	COMB10	Combination	-621,001	-3,838	0	1,341E-16	0	18,9955
22	1,77429	COMB10	Combination	-621,001	-5,659	0	1,341E-16	0	18,9955
22	1,87286	COMB10	Combination	-621,001	-3,337	0	1,341E-16	0	19,4389
22	1,87286	COMB10	Combination	-621,001	-5,181	0	1,341E-16	0	19,4389
22	1,97143	COMB10	Combination	-621,001	-2,858	0	1,341E-16	0	19,835
22	1,97143	COMB10	Combination	-621,001	-4,723	0	1,341E-16	0	19,835
22	2,07	COMB10	Combination	-621,001	-2,401	0	1,341E-16	0	20,1862
22	2,07	COMB10	Combination	-621,001	-4,287	0	1,341E-16	0	20,1862
22	2,16857	COMB10	Combination	-621,001	-1,964	0	1,341E-16	0	20,4942
22	2,16857	COMB10	Combination	-621,001	-3,87	0	1,341E-16	0	20,4942
22	2,26714	COMB10	Combination	-621,001	-1,547	0	1,341E-16	0	20,7612
22	2,26714	COMB10	Combination	-621,001	-3,471	0	1,341E-16	0	20,7612
22	2,36571	COMB10	Combination	-621,001	-1,149	0	1,341E-16	0	20,9889
22	2,36571	COMB10	Combination	-621,001	-3,091	0	1,341E-16	0	20,9889

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

Codice documento
SS0558_F0.doc

Rev
F0

Data
20/06/2011

22	2,46429	COMB10	Combination	-621,001	-0,768	0	1,341E-16	0	21,1791
22	2,46429	COMB10	Combination	-621,001	-2,727	0	1,341E-16	0	21,1791
22	2,56286	COMB10	Combination	-621,001	-0,404	0	1,341E-16	0	21,3334
22	2,56286	COMB10	Combination	-621,001	-2,378	0	1,341E-16	0	21,3334
22	2,66143	COMB10	Combination	-621,001	-0,056	0	1,341E-16	0	21,4534
22	2,66143	COMB10	Combination	-621,001	-2,044	0	1,341E-16	0	21,4534
22	2,76	COMB10	Combination	-621,001	0,278	0	1,341E-16	0	21,5404
22	2,76	COMB10	Combination	-621,001	-1,724	0	1,341E-16	0	21,5404
22	2,85857	COMB10	Combination	-621,001	0,598	0	1,341E-16	0	21,5959
22	2,85857	COMB10	Combination	-621,001	-1,416	0	1,341E-16	0	21,5959
22	2,95714	COMB10	Combination	-621,001	0,906	0	1,341E-16	0	21,621
22	2,95714	COMB10	Combination	-621,001	-1,12	0	1,341E-16	0	21,621
22	3,05571	COMB10	Combination	-621,001	1,202	0	1,341E-16	0	21,617
22	3,05571	COMB10	Combination	-621,001	-0,834	0	1,341E-16	0	21,617
22	3,15429	COMB10	Combination	-621,001	1,488	0	1,341E-16	0	21,5848
22	3,15429	COMB10	Combination	-621,001	-0,558	0	1,341E-16	0	21,5848
22	3,25286	COMB10	Combination	-621,001	1,765	0	1,341E-16	0	21,5253
22	3,25286	COMB10	Combination	-621,001	-0,29	0	1,341E-16	0	21,5253
22	3,35143	COMB10	Combination	-621,001	2,033	0	1,341E-16	0	21,4394
22	3,35143	COMB10	Combination	-621,001	-0,029	0	1,341E-16	0	21,4394
22	3,45	COMB10	Combination	-621,001	2,293	0	1,341E-16	0	21,3279
22	0	COMB11	Combination	-196,055	-18,026	0	8,499E-17	0	0
22	0,09857	COMB11	Combination	-196,055	-15,704	0	8,499E-17	0	1,6624
22	0,09857	COMB11	Combination	-196,055	-17,106	0	8,499E-17	0	1,6624
22	0,19714	COMB11	Combination	-196,055	-14,783	0	8,499E-17	0	3,2341
22	0,19714	COMB11	Combination	-196,055	-16,216	0	8,499E-17	0	3,2341
22	0,29571	COMB11	Combination	-196,055	-13,893	0	8,499E-17	0	4,718
22	0,29571	COMB11	Combination	-196,055	-15,357	0	8,499E-17	0	4,718
22	0,39429	COMB11	Combination	-196,055	-13,034	0	8,499E-17	0	6,1173
22	0,39429	COMB11	Combination	-196,055	-14,528	0	8,499E-17	0	6,1173
22	0,49286	COMB11	Combination	-196,055	-12,205	0	8,499E-17	0	7,4349
22	0,49286	COMB11	Combination	-196,055	-13,73	0	8,499E-17	0	7,4349
22	0,59143	COMB11	Combination	-196,055	-11,407	0	8,499E-17	0	8,6737
22	0,59143	COMB11	Combination	-196,055	-12,961	0	8,499E-17	0	8,6737
22	0,69	COMB11	Combination	-196,055	-10,638	0	8,499E-17	0	9,8368
22	0,69	COMB11	Combination	-196,055	-12,221	0	8,499E-17	0	9,8368
22	0,78857	COMB11	Combination	-196,055	-9,898	0	8,499E-17	0	10,9269
22	0,78857	COMB11	Combination	-196,055	-11,509	0	8,499E-17	0	10,9269
22	0,88714	COMB11	Combination	-196,055	-9,187	0	8,499E-17	0	11,947
22	0,88714	COMB11	Combination	-196,055	-10,826	0	8,499E-17	0	11,947
22	0,98571	COMB11	Combination	-196,055	-8,504	0	8,499E-17	0	12,8996
22	0,98571	COMB11	Combination	-196,055	-10,17	0	8,499E-17	0	12,8996
22	1,08429	COMB11	Combination	-196,055	-7,848	0	8,499E-17	0	13,7877
22	1,08429	COMB11	Combination	-196,055	-9,541	0	8,499E-17	0	13,7877
22	1,18286	COMB11	Combination	-196,055	-7,219	0	8,499E-17	0	14,6137
22	1,18286	COMB11	Combination	-196,055	-8,938	0	8,499E-17	0	14,6137
22	1,28143	COMB11	Combination	-196,055	-6,615	0	8,499E-17	0	15,3803
22	1,28143	COMB11	Combination	-196,055	-8,36	0	8,499E-17	0	15,3803
22	1,38	COMB11	Combination	-196,055	-6,037	0	8,499E-17	0	16,0899

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

Codice documento
SS0558_F0.doc

Rev
F0

Data
20/06/2011

22	1,38	COMB11	Combination	-196,055	-7,807	0	8,499E-17	0	16,0899
22	1,47857	COMB11	Combination	-196,055	-5,484	0	8,499E-17	0	16,7449
22	1,47857	COMB11	Combination	-196,055	-7,277	0	8,499E-17	0	16,7449
22	1,57714	COMB11	Combination	-196,055	-4,954	0	8,499E-17	0	17,3477
22	1,57714	COMB11	Combination	-196,055	-6,77	0	8,499E-17	0	17,3477
22	1,67571	COMB11	Combination	-196,055	-4,447	0	8,499E-17	0	17,9006
22	1,67571	COMB11	Combination	-196,055	-6,285	0	8,499E-17	0	17,9006
22	1,77429	COMB11	Combination	-196,055	-3,962	0	8,499E-17	0	18,4056
22	1,77429	COMB11	Combination	-196,055	-5,821	0	8,499E-17	0	18,4056
22	1,87286	COMB11	Combination	-196,055	-3,498	0	8,499E-17	0	18,8649
22	1,87286	COMB11	Combination	-196,055	-5,377	0	8,499E-17	0	18,8649
22	1,97143	COMB11	Combination	-196,055	-3,055	0	8,499E-17	0	19,2805
22	1,97143	COMB11	Combination	-196,055	-4,953	0	8,499E-17	0	19,2805
22	2,07	COMB11	Combination	-196,055	-2,63	0	8,499E-17	0	19,6542
22	2,07	COMB11	Combination	-196,055	-4,547	0	8,499E-17	0	19,6542
22	2,16857	COMB11	Combination	-196,055	-2,224	0	8,499E-17	0	19,9879
22	2,16857	COMB11	Combination	-196,055	-4,158	0	8,499E-17	0	19,9879
22	2,26714	COMB11	Combination	-196,055	-1,835	0	8,499E-17	0	20,2833
22	2,26714	COMB11	Combination	-196,055	-3,785	0	8,499E-17	0	20,2833
22	2,36571	COMB11	Combination	-196,055	-1,463	0	8,499E-17	0	20,542
22	2,36571	COMB11	Combination	-196,055	-3,428	0	8,499E-17	0	20,542
22	2,46429	COMB11	Combination	-196,055	-1,106	0	8,499E-17	0	20,7655
22	2,46429	COMB11	Combination	-196,055	-3,086	0	8,499E-17	0	20,7655
22	2,56286	COMB11	Combination	-196,055	-0,763	0	8,499E-17	0	20,9552
22	2,56286	COMB11	Combination	-196,055	-2,757	0	8,499E-17	0	20,9552
22	2,66143	COMB11	Combination	-196,055	-0,434	0	8,499E-17	0	21,1124
22	2,66143	COMB11	Combination	-196,055	-2,44	0	8,499E-17	0	21,1124
22	2,76	COMB11	Combination	-196,055	-0,117	0	8,499E-17	0	21,2384
22	2,76	COMB11	Combination	-196,055	-2,134	0	8,499E-17	0	21,2384
22	2,85857	COMB11	Combination	-196,055	0,188	0	8,499E-17	0	21,3343
22	2,85857	COMB11	Combination	-196,055	-1,839	0	8,499E-17	0	21,3343
22	2,95714	COMB11	Combination	-196,055	0,483	0	8,499E-17	0	21,4012
22	2,95714	COMB11	Combination	-196,055	-1,554	0	8,499E-17	0	21,4012
22	3,05571	COMB11	Combination	-196,055	0,769	0	8,499E-17	0	21,4399
22	3,05571	COMB11	Combination	-196,055	-1,276	0	8,499E-17	0	21,4399
22	3,15429	COMB11	Combination	-196,055	1,046	0	8,499E-17	0	21,4512
22	3,15429	COMB11	Combination	-196,055	-1,006	0	8,499E-17	0	21,4512
22	3,25286	COMB11	Combination	-196,055	1,316	0	8,499E-17	0	21,4359
22	3,25286	COMB11	Combination	-196,055	-0,742	0	8,499E-17	0	21,4359
22	3,35143	COMB11	Combination	-196,055	1,58	0	8,499E-17	0	21,3946
22	3,35143	COMB11	Combination	-196,055	-0,484	0	8,499E-17	0	21,3946
22	3,45	COMB11	Combination	-196,055	1,839	0	8,499E-17	0	21,3279

MIN P	-196,055
MAX P	-719,602
MAX V2 positivo	2,795
MAX V2 negativo	-26,461
MAX M3 positivo	31,0551

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011

MAX M3 negativo 0

SLE

TABLE: Element Forces - Frames									
Frame	Station	OutputCase	CaseType	P	V2	V3	T	M2	M3
Text	m	Text	Text	KN	KN	KN	KN-m	KN-m	KN-m
22	0	COMB12	Combination	-289,944	-21,606	0	0	0	0
22	0,09857	COMB12	Combination	-289,944	-19,283	0	0	0	2,0152
22	0,09857	COMB12	Combination	-289,944	-20,526	0	0	0	2,0152
22	0,19714	COMB12	Combination	-289,944	-18,204	0	0	0	3,9241
22	0,19714	COMB12	Combination	-289,944	-19,483	0	0	0	3,9241
22	0,29571	COMB12	Combination	-289,944	-17,16	0	0	0	5,73
22	0,29571	COMB12	Combination	-289,944	-18,475	0	0	0	5,73
22	0,39429	COMB12	Combination	-289,944	-16,153	0	0	0	7,4367
22	0,39429	COMB12	Combination	-289,944	-17,503	0	0	0	7,4367
22	0,49286	COMB12	Combination	-289,944	-15,181	0	0	0	9,0475
22	0,49286	COMB12	Combination	-289,944	-16,566	0	0	0	9,0475
22	0,59143	COMB12	Combination	-289,944	-14,244	0	0	0	10,566
22	0,59143	COMB12	Combination	-289,944	-15,664	0	0	0	10,566
22	0,69	COMB12	Combination	-289,944	-13,341	0	0	0	11,9956
22	0,69	COMB12	Combination	-289,944	-14,796	0	0	0	11,9956
22	0,78857	COMB12	Combination	-289,944	-12,473	0	0	0	13,3396
22	0,78857	COMB12	Combination	-289,944	-13,961	0	0	0	13,3396
22	0,88714	COMB12	Combination	-289,944	-11,638	0	0	0	14,6012
22	0,88714	COMB12	Combination	-289,944	-13,158	0	0	0	14,6012
22	0,98571	COMB12	Combination	-289,944	-10,836	0	0	0	15,7838
22	0,98571	COMB12	Combination	-289,944	-12,388	0	0	0	15,7838
22	1,08429	COMB12	Combination	-289,944	-10,065	0	0	0	16,8904
22	1,08429	COMB12	Combination	-289,944	-11,649	0	0	0	16,8904
22	1,18286	COMB12	Combination	-289,944	-9,326	0	0	0	17,9242
22	1,18286	COMB12	Combination	-289,944	-10,939	0	0	0	17,9242
22	1,28143	COMB12	Combination	-289,944	-8,617	0	0	0	18,888
22	1,28143	COMB12	Combination	-289,944	-10,259	0	0	0	18,888
22	1,38	COMB12	Combination	-289,944	-7,937	0	0	0	19,7848
22	1,38	COMB12	Combination	-289,944	-9,608	0	0	0	19,7848
22	1,47857	COMB12	Combination	-289,944	-7,285	0	0	0	20,6174
22	1,47857	COMB12	Combination	-289,944	-8,983	0	0	0	20,6174
22	1,57714	COMB12	Combination	-289,944	-6,661	0	0	0	21,3884
22	1,57714	COMB12	Combination	-289,944	-8,385	0	0	0	21,3884
22	1,67571	COMB12	Combination	-289,944	-6,062	0	0	0	22,1004
22	1,67571	COMB12	Combination	-289,944	-7,812	0	0	0	22,1004
22	1,77429	COMB12	Combination	-289,944	-5,49	0	0	0	22,756
22	1,77429	COMB12	Combination	-289,944	-7,264	0	0	0	22,756
22	1,87286	COMB12	Combination	-289,944	-4,941	0	0	0	23,3575
22	1,87286	COMB12	Combination	-289,944	-6,738	0	0	0	23,3575

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011

22	1,97143	COMB12	Combination	-289,944	-4,415	0	0	0	23,9072
22	1,97143	COMB12	Combination	-289,944	-6,234	0	0	0	23,9072
22	2,07	COMB12	Combination	-289,944	-3,911	0	0	0	24,4073
22	2,07	COMB12	Combination	-289,944	-5,751	0	0	0	24,4073
22	2,16857	COMB12	Combination	-289,944	-3,428	0	0	0	24,8597
22	2,16857	COMB12	Combination	-289,944	-5,288	0	0	0	24,8597
22	2,26714	COMB12	Combination	-289,944	-2,965	0	0	0	25,2664
22	2,26714	COMB12	Combination	-289,944	-4,842	0	0	0	25,2664
22	2,36571	COMB12	Combination	-289,944	-2,52	0	0	0	25,6293
22	2,36571	COMB12	Combination	-289,944	-4,414	0	0	0	25,6293
22	2,46429	COMB12	Combination	-289,944	-2,092	0	0	0	25,9499
22	2,46429	COMB12	Combination	-289,944	-4,002	0	0	0	25,9499
22	2,56286	COMB12	Combination	-289,944	-1,68	0	0	0	26,2299
22	2,56286	COMB12	Combination	-289,944	-3,605	0	0	0	26,2299
22	2,66143	COMB12	Combination	-289,944	-1,282	0	0	0	26,4708
22	2,66143	COMB12	Combination	-289,944	-3,22	0	0	0	26,4708
22	2,76	COMB12	Combination	-289,944	-0,898	0	0	0	26,6738
22	2,76	COMB12	Combination	-289,944	-2,848	0	0	0	26,6738
22	2,85857	COMB12	Combination	-289,944	-0,526	0	0	0	26,8401
22	2,85857	COMB12	Combination	-289,944	-2,487	0	0	0	26,8401
22	2,95714	COMB12	Combination	-289,944	-0,165	0	0	0	26,9708
22	2,95714	COMB12	Combination	-289,944	-2,136	0	0	0	26,9708
22	3,05571	COMB12	Combination	-289,944	0,187	0	0	0	27,0668
22	3,05571	COMB12	Combination	-289,944	-1,792	0	0	0	27,0668
22	3,15429	COMB12	Combination	-289,944	0,531	0	0	0	27,129
22	3,15429	COMB12	Combination	-289,944	-1,456	0	0	0	27,129
22	3,25286	COMB12	Combination	-289,944	0,867	0	0	0	27,158
22	3,25286	COMB12	Combination	-289,944	-1,125	0	0	0	27,158
22	3,35143	COMB12	Combination	-289,944	1,198	0	0	0	27,1544
22	3,35143	COMB12	Combination	-289,944	-0,798	0	0	0	27,1544
22	3,45	COMB12	Combination	-289,944	1,524	0	0	0	27,1186
22	0	COMB13	Combination	-112,607	-23,624	0	0	0	0
22	0,09857	COMB13	Combination	-112,607	-21,301	0	0	0	2,2142
22	0,09857	COMB13	Combination	-112,607	-22,485	0	0	0	2,2142
22	0,19714	COMB13	Combination	-112,607	-20,162	0	0	0	4,316
22	0,19714	COMB13	Combination	-112,607	-21,383	0	0	0	4,316
22	0,29571	COMB13	Combination	-112,607	-19,06	0	0	0	6,3093
22	0,29571	COMB13	Combination	-112,607	-20,319	0	0	0	6,3093
22	0,39429	COMB13	Combination	-112,607	-17,997	0	0	0	8,1978
22	0,39429	COMB13	Combination	-112,607	-19,293	0	0	0	8,1978
22	0,49286	COMB13	Combination	-112,607	-16,97	0	0	0	9,985
22	0,49286	COMB13	Combination	-112,607	-18,304	0	0	0	9,985
22	0,59143	COMB13	Combination	-112,607	-15,981	0	0	0	11,6748
22	0,59143	COMB13	Combination	-112,607	-17,35	0	0	0	11,6748
22	0,69	COMB13	Combination	-112,607	-15,028	0	0	0	13,2706
22	0,69	COMB13	Combination	-112,607	-16,433	0	0	0	13,2706
22	0,78857	COMB13	Combination	-112,607	-14,11	0	0	0	14,7759
22	0,78857	COMB13	Combination	-112,607	-15,55	0	0	0	14,7759
22	0,88714	COMB13	Combination	-112,607	-13,228	0	0	0	16,1943

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011

22	0,88714	COMB13	Combination	-112,607	-14,702	0	0	0	16,1943
22	0,98571	COMB13	Combination	-112,607	-12,379	0	0	0	17,529
22	0,98571	COMB13	Combination	-112,607	-13,887	0	0	0	17,529
22	1,08429	COMB13	Combination	-112,607	-11,564	0	0	0	18,7834
22	1,08429	COMB13	Combination	-112,607	-13,104	0	0	0	18,7834
22	1,18286	COMB13	Combination	-112,607	-10,782	0	0	0	19,9606
22	1,18286	COMB13	Combination	-112,607	-12,353	0	0	0	19,9606
22	1,28143	COMB13	Combination	-112,607	-10,03	0	0	0	21,0638
22	1,28143	COMB13	Combination	-112,607	-11,632	0	0	0	21,0638
22	1,38	COMB13	Combination	-112,607	-9,309	0	0	0	22,0959
22	1,38	COMB13	Combination	-112,607	-10,941	0	0	0	22,0959
22	1,47857	COMB13	Combination	-112,607	-8,618	0	0	0	23,0599
22	1,47857	COMB13	Combination	-112,607	-10,277	0	0	0	23,0599
22	1,57714	COMB13	Combination	-112,607	-7,955	0	0	0	23,9584
22	1,57714	COMB13	Combination	-112,607	-9,641	0	0	0	23,9584
22	1,67571	COMB13	Combination	-112,607	-7,319	0	0	0	24,7943
22	1,67571	COMB13	Combination	-112,607	-9,031	0	0	0	24,7943
22	1,77429	COMB13	Combination	-112,607	-6,709	0	0	0	25,5701
22	1,77429	COMB13	Combination	-112,607	-8,446	0	0	0	25,5701
22	1,87286	COMB13	Combination	-112,607	-6,123	0	0	0	26,2881
22	1,87286	COMB13	Combination	-112,607	-7,884	0	0	0	26,2881
22	1,97143	COMB13	Combination	-112,607	-5,561	0	0	0	26,9508
22	1,97143	COMB13	Combination	-112,607	-7,344	0	0	0	26,9508
22	2,07	COMB13	Combination	-112,607	-5,022	0	0	0	27,5603
22	2,07	COMB13	Combination	-112,607	-6,826	0	0	0	27,5603
22	2,16857	COMB13	Combination	-112,607	-4,503	0	0	0	28,1186
22	2,16857	COMB13	Combination	-112,607	-6,326	0	0	0	28,1186
22	2,26714	COMB13	Combination	-112,607	-4,004	0	0	0	28,6277
22	2,26714	COMB13	Combination	-112,607	-5,845	0	0	0	28,6277
22	2,36571	COMB13	Combination	-112,607	-3,523	0	0	0	29,0894
22	2,36571	COMB13	Combination	-112,607	-5,381	0	0	0	29,0894
22	2,46429	COMB13	Combination	-112,607	-3,058	0	0	0	29,5054
22	2,46429	COMB13	Combination	-112,607	-4,932	0	0	0	29,5054
22	2,56286	COMB13	Combination	-112,607	-2,61	0	0	0	29,8771
22	2,56286	COMB13	Combination	-112,607	-4,497	0	0	0	29,8771
22	2,66143	COMB13	Combination	-112,607	-2,175	0	0	0	30,2059
22	2,66143	COMB13	Combination	-112,607	-4,075	0	0	0	30,2059
22	2,76	COMB13	Combination	-112,607	-1,753	0	0	0	30,4932
22	2,76	COMB13	Combination	-112,607	-3,664	0	0	0	30,4932
22	2,85857	COMB13	Combination	-112,607	-1,341	0	0	0	30,7399
22	2,85857	COMB13	Combination	-112,607	-3,263	0	0	0	30,7399
22	2,95714	COMB13	Combination	-112,607	-0,94	0	0	0	30,947
22	2,95714	COMB13	Combination	-112,607	-2,869	0	0	0	30,947
22	3,05571	COMB13	Combination	-112,607	-0,547	0	0	0	31,1154
22	3,05571	COMB13	Combination	-112,607	-2,483	0	0	0	31,1154
22	3,15429	COMB13	Combination	-112,607	-0,16	0	0	0	31,2456
22	3,15429	COMB13	Combination	-112,607	-2,102	0	0	0	31,2456
22	3,25286	COMB13	Combination	-112,607	0,221	0	0	0	31,3383
22	3,25286	COMB13	Combination	-112,607	-1,724	0	0	0	31,3383

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011

22	3,35143	COMB13	Combination	-112,607	0,599	0	0	0	31,3938
22	3,35143	COMB13	Combination	-112,607	-1,349	0	0	0	31,3938
22	3,45	COMB13	Combination	-112,607	0,974	0	0	0	31,4122
22	0	COMB14	Combination	-330,92	-22,068	0	0	0	0
22	0,09857	COMB14	Combination	-330,92	-19,746	0	0	0	2,0608
22	0,09857	COMB14	Combination	-330,92	-20,947	0	0	0	2,0608
22	0,19714	COMB14	Combination	-330,92	-18,624	0	0	0	4,0111
22	0,19714	COMB14	Combination	-330,92	-19,862	0	0	0	4,0111
22	0,29571	COMB14	Combination	-330,92	-17,54	0	0	0	5,8545
22	0,29571	COMB14	Combination	-330,92	-18,816	0	0	0	5,8545
22	0,39429	COMB14	Combination	-330,92	-16,493	0	0	0	7,5947
22	0,39429	COMB14	Combination	-330,92	-17,806	0	0	0	7,5947
22	0,49286	COMB14	Combination	-330,92	-15,483	0	0	0	9,2354
22	0,49286	COMB14	Combination	-330,92	-16,833	0	0	0	9,2354
22	0,59143	COMB14	Combination	-330,92	-14,51	0	0	0	10,7801
22	0,59143	COMB14	Combination	-330,92	-15,896	0	0	0	10,7801
22	0,69	COMB14	Combination	-330,92	-13,573	0	0	0	12,2325
22	0,69	COMB14	Combination	-330,92	-14,994	0	0	0	12,2325
22	0,78857	COMB14	Combination	-330,92	-12,671	0	0	0	13,596
22	0,78857	COMB14	Combination	-330,92	-14,127	0	0	0	13,596
22	0,88714	COMB14	Combination	-330,92	-11,804	0	0	0	14,874
22	0,88714	COMB14	Combination	-330,92	-13,294	0	0	0	14,874
22	0,98571	COMB14	Combination	-330,92	-10,971	0	0	0	16,0699
22	0,98571	COMB14	Combination	-330,92	-12,494	0	0	0	16,0699
22	1,08429	COMB14	Combination	-330,92	-10,171	0	0	0	17,187
22	1,08429	COMB14	Combination	-330,92	-11,726	0	0	0	17,187
22	1,18286	COMB14	Combination	-330,92	-9,404	0	0	0	18,2284
22	1,18286	COMB14	Combination	-330,92	-10,99	0	0	0	18,2284
22	1,28143	COMB14	Combination	-330,92	-8,668	0	0	0	19,1972
22	1,28143	COMB14	Combination	-330,92	-10,285	0	0	0	19,1972
22	1,38	COMB14	Combination	-330,92	-7,962	0	0	0	20,0966
22	1,38	COMB14	Combination	-330,92	-9,609	0	0	0	20,0966
22	1,47857	COMB14	Combination	-330,92	-7,287	0	0	0	20,9293
22	1,47857	COMB14	Combination	-330,92	-8,962	0	0	0	20,9293
22	1,57714	COMB14	Combination	-330,92	-6,639	0	0	0	21,6982
22	1,57714	COMB14	Combination	-330,92	-8,342	0	0	0	21,6982
22	1,67571	COMB14	Combination	-330,92	-6,02	0	0	0	22,4061
22	1,67571	COMB14	Combination	-330,92	-7,749	0	0	0	22,4061
22	1,77429	COMB14	Combination	-330,92	-5,427	0	0	0	23,0555
22	1,77429	COMB14	Combination	-330,92	-7,182	0	0	0	23,0555
22	1,87286	COMB14	Combination	-330,92	-4,859	0	0	0	23,6489
22	1,87286	COMB14	Combination	-330,92	-6,638	0	0	0	23,6489
22	1,97143	COMB14	Combination	-330,92	-4,315	0	0	0	24,1887
22	1,97143	COMB14	Combination	-330,92	-6,118	0	0	0	24,1887
22	2,07	COMB14	Combination	-330,92	-3,795	0	0	0	24,6773
22	2,07	COMB14	Combination	-330,92	-5,619	0	0	0	24,6773
22	2,16857	COMB14	Combination	-330,92	-3,296	0	0	0	25,1167
22	2,16857	COMB14	Combination	-330,92	-5,141	0	0	0	25,1167
22	2,26714	COMB14	Combination	-330,92	-2,819	0	0	0	25,509

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD	<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011	

22	2,26714	COMB14	Combination	-330,92	-4,683	0	0	0	25,509
22	2,36571	COMB14	Combination	-330,92	-2,36	0	0	0	25,8561
22	2,36571	COMB14	Combination	-330,92	-4,243	0	0	0	25,8561
22	2,46429	COMB14	Combination	-330,92	-1,92	0	0	0	26,1599
22	2,46429	COMB14	Combination	-330,92	-3,82	0	0	0	26,1599
22	2,56286	COMB14	Combination	-330,92	-1,497	0	0	0	26,422
22	2,56286	COMB14	Combination	-330,92	-3,413	0	0	0	26,422
22	2,66143	COMB14	Combination	-330,92	-1,09	0	0	0	26,6439
22	2,66143	COMB14	Combination	-330,92	-3,02	0	0	0	26,6439
22	2,76	COMB14	Combination	-330,92	-0,697	0	0	0	26,8271
22	2,76	COMB14	Combination	-330,92	-2,64	0	0	0	26,8271
22	2,85857	COMB14	Combination	-330,92	-0,318	0	0	0	26,9728
22	2,85857	COMB14	Combination	-330,92	-2,273	0	0	0	26,9728
22	2,95714	COMB14	Combination	-330,92	0,05	0	0	0	27,0824
22	2,95714	COMB14	Combination	-330,92	-1,915	0	0	0	27,0824
22	3,05571	COMB14	Combination	-330,92	0,407	0	0	0	27,1567
22	3,05571	COMB14	Combination	-330,92	-1,568	0	0	0	27,1567
22	3,15429	COMB14	Combination	-330,92	0,755	0	0	0	27,1968
22	3,15429	COMB14	Combination	-330,92	-1,228	0	0	0	27,1968
22	3,25286	COMB14	Combination	-330,92	1,095	0	0	0	27,2033
22	3,25286	COMB14	Combination	-330,92	-0,895	0	0	0	27,2033
22	3,35143	COMB14	Combination	-330,92	1,428	0	0	0	27,1771
22	3,35143	COMB14	Combination	-330,92	-0,568	0	0	0	27,1771
22	3,45	COMB14	Combination	-330,92	1,755	0	0	0	27,1186
22	0	COMB15	Combination	-153,583	-24,087	0	0	0	0
22	0,09857	COMB15	Combination	-153,583	-21,764	0	0	0	2,2598
22	0,09857	COMB15	Combination	-153,583	-22,905	0	0	0	2,2598
22	0,19714	COMB15	Combination	-153,583	-20,582	0	0	0	4,4031
22	0,19714	COMB15	Combination	-153,583	-21,763	0	0	0	4,4031
22	0,29571	COMB15	Combination	-153,583	-19,44	0	0	0	6,4338
22	0,29571	COMB15	Combination	-153,583	-20,66	0	0	0	6,4338
22	0,39429	COMB15	Combination	-153,583	-18,337	0	0	0	8,3558
22	0,39429	COMB15	Combination	-153,583	-19,596	0	0	0	8,3558
22	0,49286	COMB15	Combination	-153,583	-17,273	0	0	0	10,1729
22	0,49286	COMB15	Combination	-153,583	-18,57	0	0	0	10,1729
22	0,59143	COMB15	Combination	-153,583	-16,247	0	0	0	11,8889
22	0,59143	COMB15	Combination	-153,583	-17,582	0	0	0	11,8889
22	0,69	COMB15	Combination	-153,583	-15,259	0	0	0	13,5075
22	0,69	COMB15	Combination	-153,583	-16,631	0	0	0	13,5075
22	0,78857	COMB15	Combination	-153,583	-14,308	0	0	0	15,0324
22	0,78857	COMB15	Combination	-153,583	-15,716	0	0	0	15,0324
22	0,88714	COMB15	Combination	-153,583	-13,394	0	0	0	16,4671
22	0,88714	COMB15	Combination	-153,583	-14,837	0	0	0	16,4671
22	0,98571	COMB15	Combination	-153,583	-12,514	0	0	0	17,8151
22	0,98571	COMB15	Combination	-153,583	-13,993	0	0	0	17,8151
22	1,08429	COMB15	Combination	-153,583	-11,67	0	0	0	19,0799
22	1,08429	COMB15	Combination	-153,583	-13,182	0	0	0	19,0799
22	1,18286	COMB15	Combination	-153,583	-10,859	0	0	0	20,2648
22	1,18286	COMB15	Combination	-153,583	-12,404	0	0	0	20,2648

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO			
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD			<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011

22	1,28143	COMB15	Combination	-153,583	-10,081	0	0	0	21,373
22	1,28143	COMB15	Combination	-153,583	-11,658	0	0	0	21,373
22	1,38	COMB15	Combination	-153,583	-9,335	0	0	0	22,4077
22	1,38	COMB15	Combination	-153,583	-10,942	0	0	0	22,4077
22	1,47857	COMB15	Combination	-153,583	-8,62	0	0	0	23,3718
22	1,47857	COMB15	Combination	-153,583	-10,256	0	0	0	23,3718
22	1,57714	COMB15	Combination	-153,583	-7,934	0	0	0	24,2683
22	1,57714	COMB15	Combination	-153,583	-9,599	0	0	0	24,2683
22	1,67571	COMB15	Combination	-153,583	-7,276	0	0	0	25,1
22	1,67571	COMB15	Combination	-153,583	-8,968	0	0	0	25,1
22	1,77429	COMB15	Combination	-153,583	-6,646	0	0	0	25,8695
22	1,77429	COMB15	Combination	-153,583	-8,364	0	0	0	25,8695
22	1,87286	COMB15	Combination	-153,583	-6,041	0	0	0	26,5795
22	1,87286	COMB15	Combination	-153,583	-7,784	0	0	0	26,5795
22	1,97143	COMB15	Combination	-153,583	-5,462	0	0	0	27,2323
22	1,97143	COMB15	Combination	-153,583	-7,228	0	0	0	27,2323
22	2,07	COMB15	Combination	-153,583	-4,905	0	0	0	27,8303
22	2,07	COMB15	Combination	-153,583	-6,694	0	0	0	27,8303
22	2,16857	COMB15	Combination	-153,583	-4,371	0	0	0	28,3756
22	2,16857	COMB15	Combination	-153,583	-6,18	0	0	0	28,3756
22	2,26714	COMB15	Combination	-153,583	-3,857	0	0	0	28,8703
22	2,26714	COMB15	Combination	-153,583	-5,686	0	0	0	28,8703
22	2,36571	COMB15	Combination	-153,583	-3,363	0	0	0	29,3163
22	2,36571	COMB15	Combination	-153,583	-5,21	0	0	0	29,3163
22	2,46429	COMB15	Combination	-153,583	-2,887	0	0	0	29,7154
22	2,46429	COMB15	Combination	-153,583	-4,75	0	0	0	29,7154
22	2,56286	COMB15	Combination	-153,583	-2,427	0	0	0	30,0691
22	2,56286	COMB15	Combination	-153,583	-4,305	0	0	0	30,0691
22	2,66143	COMB15	Combination	-153,583	-1,983	0	0	0	30,379
22	2,66143	COMB15	Combination	-153,583	-3,875	0	0	0	30,379
22	2,76	COMB15	Combination	-153,583	-1,552	0	0	0	30,6465
22	2,76	COMB15	Combination	-153,583	-3,456	0	0	0	30,6465
22	2,85857	COMB15	Combination	-153,583	-1,133	0	0	0	30,8726
22	2,85857	COMB15	Combination	-153,583	-3,048	0	0	0	30,8726
22	2,95714	COMB15	Combination	-153,583	-0,725	0	0	0	31,0586
22	2,95714	COMB15	Combination	-153,583	-2,649	0	0	0	31,0586
22	3,05571	COMB15	Combination	-153,583	-0,327	0	0	0	31,2053
22	3,05571	COMB15	Combination	-153,583	-2,259	0	0	0	31,2053
22	3,15429	COMB15	Combination	-153,583	0,064	0	0	0	31,3134
22	3,15429	COMB15	Combination	-153,583	-1,874	0	0	0	31,3134
22	3,25286	COMB15	Combination	-153,583	0,449	0	0	0	31,3837
22	3,25286	COMB15	Combination	-153,583	-1,494	0	0	0	31,3837
22	3,35143	COMB15	Combination	-153,583	0,828	0	0	0	31,4165
22	3,35143	COMB15	Combination	-153,583	-1,118	0	0	0	31,4165
22	3,45	COMB15	Combination	-153,583	1,205	0	0	0	31,4122
22	0	COMB16	Combination	-379,99	-21,606	0	0	0	0
22	0,09857	COMB16	Combination	-379,99	-19,283	0	0	0	2,0152
22	0,09857	COMB16	Combination	-379,99	-20,526	0	0	0	2,0152
22	0,19714	COMB16	Combination	-379,99	-18,204	0	0	0	3,9241

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011

22	0,19714	COMB16	Combination	-379,99	-19,483	0	0	0	3,9241
22	0,29571	COMB16	Combination	-379,99	-17,16	0	0	0	5,73
22	0,29571	COMB16	Combination	-379,99	-18,475	0	0	0	5,73
22	0,39429	COMB16	Combination	-379,99	-16,153	0	0	0	7,4367
22	0,39429	COMB16	Combination	-379,99	-17,503	0	0	0	7,4367
22	0,49286	COMB16	Combination	-379,99	-15,181	0	0	0	9,0475
22	0,49286	COMB16	Combination	-379,99	-16,566	0	0	0	9,0475
22	0,59143	COMB16	Combination	-379,99	-14,244	0	0	0	10,566
22	0,59143	COMB16	Combination	-379,99	-15,664	0	0	0	10,566
22	0,69	COMB16	Combination	-379,99	-13,341	0	0	0	11,9956
22	0,69	COMB16	Combination	-379,99	-14,796	0	0	0	11,9956
22	0,78857	COMB16	Combination	-379,99	-12,473	0	0	0	13,3396
22	0,78857	COMB16	Combination	-379,99	-13,961	0	0	0	13,3396
22	0,88714	COMB16	Combination	-379,99	-11,638	0	0	0	14,6012
22	0,88714	COMB16	Combination	-379,99	-13,158	0	0	0	14,6012
22	0,98571	COMB16	Combination	-379,99	-10,836	0	0	0	15,7838
22	0,98571	COMB16	Combination	-379,99	-12,388	0	0	0	15,7838
22	1,08429	COMB16	Combination	-379,99	-10,065	0	0	0	16,8904
22	1,08429	COMB16	Combination	-379,99	-11,649	0	0	0	16,8904
22	1,18286	COMB16	Combination	-379,99	-9,326	0	0	0	17,9242
22	1,18286	COMB16	Combination	-379,99	-10,939	0	0	0	17,9242
22	1,28143	COMB16	Combination	-379,99	-8,617	0	0	0	18,888
22	1,28143	COMB16	Combination	-379,99	-10,259	0	0	0	18,888
22	1,38	COMB16	Combination	-379,99	-7,937	0	0	0	19,7848
22	1,38	COMB16	Combination	-379,99	-9,608	0	0	0	19,7848
22	1,47857	COMB16	Combination	-379,99	-7,285	0	0	0	20,6174
22	1,47857	COMB16	Combination	-379,99	-8,983	0	0	0	20,6174
22	1,57714	COMB16	Combination	-379,99	-6,661	0	0	0	21,3884
22	1,57714	COMB16	Combination	-379,99	-8,385	0	0	0	21,3884
22	1,67571	COMB16	Combination	-379,99	-6,062	0	0	0	22,1004
22	1,67571	COMB16	Combination	-379,99	-7,812	0	0	0	22,1004
22	1,77429	COMB16	Combination	-379,99	-5,49	0	0	0	22,756
22	1,77429	COMB16	Combination	-379,99	-7,264	0	0	0	22,756
22	1,87286	COMB16	Combination	-379,99	-4,941	0	0	0	23,3575
22	1,87286	COMB16	Combination	-379,99	-6,738	0	0	0	23,3575
22	1,97143	COMB16	Combination	-379,99	-4,415	0	0	0	23,9072
22	1,97143	COMB16	Combination	-379,99	-6,234	0	0	0	23,9072
22	2,07	COMB16	Combination	-379,99	-3,911	0	0	0	24,4073
22	2,07	COMB16	Combination	-379,99	-5,751	0	0	0	24,4073
22	2,16857	COMB16	Combination	-379,99	-3,428	0	0	0	24,8597
22	2,16857	COMB16	Combination	-379,99	-5,288	0	0	0	24,8597
22	2,26714	COMB16	Combination	-379,99	-2,965	0	0	0	25,2664
22	2,26714	COMB16	Combination	-379,99	-4,842	0	0	0	25,2664
22	2,36571	COMB16	Combination	-379,99	-2,52	0	0	0	25,6293
22	2,36571	COMB16	Combination	-379,99	-4,414	0	0	0	25,6293
22	2,46429	COMB16	Combination	-379,99	-2,092	0	0	0	25,9499
22	2,46429	COMB16	Combination	-379,99	-4,002	0	0	0	25,9499
22	2,56286	COMB16	Combination	-379,99	-1,68	0	0	0	26,2299
22	2,56286	COMB16	Combination	-379,99	-3,605	0	0	0	26,2299

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011

22	2,66143	COMB16	Combination	-379,99	-1,282	0	0	0	26,4708
22	2,66143	COMB16	Combination	-379,99	-3,22	0	0	0	26,4708
22	2,76	COMB16	Combination	-379,99	-0,898	0	0	0	26,6738
22	2,76	COMB16	Combination	-379,99	-2,848	0	0	0	26,6738
22	2,85857	COMB16	Combination	-379,99	-0,526	0	0	0	26,8401
22	2,85857	COMB16	Combination	-379,99	-2,487	0	0	0	26,8401
22	2,95714	COMB16	Combination	-379,99	-0,165	0	0	0	26,9708
22	2,95714	COMB16	Combination	-379,99	-2,136	0	0	0	26,9708
22	3,05571	COMB16	Combination	-379,99	0,187	0	0	0	27,0668
22	3,05571	COMB16	Combination	-379,99	-1,792	0	0	0	27,0668
22	3,15429	COMB16	Combination	-379,99	0,531	0	0	0	27,129
22	3,15429	COMB16	Combination	-379,99	-1,456	0	0	0	27,129
22	3,25286	COMB16	Combination	-379,99	0,867	0	0	0	27,158
22	3,25286	COMB16	Combination	-379,99	-1,125	0	0	0	27,158
22	3,35143	COMB16	Combination	-379,99	1,198	0	0	0	27,1544
22	3,35143	COMB16	Combination	-379,99	-0,798	0	0	0	27,1544
22	3,45	COMB16	Combination	-379,99	1,524	0	0	0	27,1186
22	0	COMB17	Combination	-202,653	-23,624	0	0	0	0
22	0,09857	COMB17	Combination	-202,653	-21,301	0	0	0	2,2142
22	0,09857	COMB17	Combination	-202,653	-22,485	0	0	0	2,2142
22	0,19714	COMB17	Combination	-202,653	-20,162	0	0	0	4,316
22	0,19714	COMB17	Combination	-202,653	-21,383	0	0	0	4,316
22	0,29571	COMB17	Combination	-202,653	-19,06	0	0	0	6,3093
22	0,29571	COMB17	Combination	-202,653	-20,319	0	0	0	6,3093
22	0,39429	COMB17	Combination	-202,653	-17,997	0	0	0	8,1978
22	0,39429	COMB17	Combination	-202,653	-19,293	0	0	0	8,1978
22	0,49286	COMB17	Combination	-202,653	-16,97	0	0	0	9,985
22	0,49286	COMB17	Combination	-202,653	-18,304	0	0	0	9,985
22	0,59143	COMB17	Combination	-202,653	-15,981	0	0	0	11,6748
22	0,59143	COMB17	Combination	-202,653	-17,35	0	0	0	11,6748
22	0,69	COMB17	Combination	-202,653	-15,028	0	0	0	13,2706
22	0,69	COMB17	Combination	-202,653	-16,433	0	0	0	13,2706
22	0,78857	COMB17	Combination	-202,653	-14,11	0	0	0	14,7759
22	0,78857	COMB17	Combination	-202,653	-15,55	0	0	0	14,7759
22	0,88714	COMB17	Combination	-202,653	-13,228	0	0	0	16,1943
22	0,88714	COMB17	Combination	-202,653	-14,702	0	0	0	16,1943
22	0,98571	COMB17	Combination	-202,653	-12,379	0	0	0	17,529
22	0,98571	COMB17	Combination	-202,653	-13,887	0	0	0	17,529
22	1,08429	COMB17	Combination	-202,653	-11,564	0	0	0	18,7834
22	1,08429	COMB17	Combination	-202,653	-13,104	0	0	0	18,7834
22	1,18286	COMB17	Combination	-202,653	-10,782	0	0	0	19,9606
22	1,18286	COMB17	Combination	-202,653	-12,353	0	0	0	19,9606
22	1,28143	COMB17	Combination	-202,653	-10,03	0	0	0	21,0638
22	1,28143	COMB17	Combination	-202,653	-11,632	0	0	0	21,0638
22	1,38	COMB17	Combination	-202,653	-9,309	0	0	0	22,0959
22	1,38	COMB17	Combination	-202,653	-10,941	0	0	0	22,0959
22	1,47857	COMB17	Combination	-202,653	-8,618	0	0	0	23,0599
22	1,47857	COMB17	Combination	-202,653	-10,277	0	0	0	23,0599
22	1,57714	COMB17	Combination	-202,653	-7,955	0	0	0	23,9584

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011

22	1,57714	COMB17	Combination	-202,653	-9,641	0	0	0	23,9584
22	1,67571	COMB17	Combination	-202,653	-7,319	0	0	0	24,7943
22	1,67571	COMB17	Combination	-202,653	-9,031	0	0	0	24,7943
22	1,77429	COMB17	Combination	-202,653	-6,709	0	0	0	25,5701
22	1,77429	COMB17	Combination	-202,653	-8,446	0	0	0	25,5701
22	1,87286	COMB17	Combination	-202,653	-6,123	0	0	0	26,2881
22	1,87286	COMB17	Combination	-202,653	-7,884	0	0	0	26,2881
22	1,97143	COMB17	Combination	-202,653	-5,561	0	0	0	26,9508
22	1,97143	COMB17	Combination	-202,653	-7,344	0	0	0	26,9508
22	2,07	COMB17	Combination	-202,653	-5,022	0	0	0	27,5603
22	2,07	COMB17	Combination	-202,653	-6,826	0	0	0	27,5603
22	2,16857	COMB17	Combination	-202,653	-4,503	0	0	0	28,1186
22	2,16857	COMB17	Combination	-202,653	-6,326	0	0	0	28,1186
22	2,26714	COMB17	Combination	-202,653	-4,004	0	0	0	28,6277
22	2,26714	COMB17	Combination	-202,653	-5,845	0	0	0	28,6277
22	2,36571	COMB17	Combination	-202,653	-3,523	0	0	0	29,0894
22	2,36571	COMB17	Combination	-202,653	-5,381	0	0	0	29,0894
22	2,46429	COMB17	Combination	-202,653	-3,058	0	0	0	29,5054
22	2,46429	COMB17	Combination	-202,653	-4,932	0	0	0	29,5054
22	2,56286	COMB17	Combination	-202,653	-2,61	0	0	0	29,8771
22	2,56286	COMB17	Combination	-202,653	-4,497	0	0	0	29,8771
22	2,66143	COMB17	Combination	-202,653	-2,175	0	0	0	30,2059
22	2,66143	COMB17	Combination	-202,653	-4,075	0	0	0	30,2059
22	2,76	COMB17	Combination	-202,653	-1,753	0	0	0	30,4932
22	2,76	COMB17	Combination	-202,653	-3,664	0	0	0	30,4932
22	2,85857	COMB17	Combination	-202,653	-1,341	0	0	0	30,7399
22	2,85857	COMB17	Combination	-202,653	-3,263	0	0	0	30,7399
22	2,95714	COMB17	Combination	-202,653	-0,94	0	0	0	30,947
22	2,95714	COMB17	Combination	-202,653	-2,869	0	0	0	30,947
22	3,05571	COMB17	Combination	-202,653	-0,547	0	0	0	31,1154
22	3,05571	COMB17	Combination	-202,653	-2,483	0	0	0	31,1154
22	3,15429	COMB17	Combination	-202,653	-0,16	0	0	0	31,2456
22	3,15429	COMB17	Combination	-202,653	-2,102	0	0	0	31,2456
22	3,25286	COMB17	Combination	-202,653	0,221	0	0	0	31,3383
22	3,25286	COMB17	Combination	-202,653	-1,724	0	0	0	31,3383
22	3,35143	COMB17	Combination	-202,653	0,599	0	0	0	31,3938
22	3,35143	COMB17	Combination	-202,653	-1,349	0	0	0	31,3938
22	3,45	COMB17	Combination	-202,653	0,974	0	0	0	31,4122
22	0	COMB18	Combination	-442,082	-22,307	0	0	0	0
22	0,09857	COMB18	Combination	-442,082	-19,984	0	0	0	2,0843
22	0,09857	COMB18	Combination	-442,082	-21,163	0	0	0	2,0843
22	0,19714	COMB18	Combination	-442,082	-18,841	0	0	0	4,0559
22	0,19714	COMB18	Combination	-442,082	-20,058	0	0	0	4,0559
22	0,29571	COMB18	Combination	-442,082	-17,735	0	0	0	5,9186
22	0,29571	COMB18	Combination	-442,082	-18,991	0	0	0	5,9186
22	0,39429	COMB18	Combination	-442,082	-16,668	0	0	0	7,6761
22	0,39429	COMB18	Combination	-442,082	-17,962	0	0	0	7,6761
22	0,49286	COMB18	Combination	-442,082	-15,639	0	0	0	9,3322
22	0,49286	COMB18	Combination	-442,082	-16,97	0	0	0	9,3322

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD	<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011	

22	0,59143	COMB18	Combination	-442,082	-14,647	0	0	0	10,8905
22	0,59143	COMB18	Combination	-442,082	-16,015	0	0	0	10,8905
22	0,69	COMB18	Combination	-442,082	-13,692	0	0	0	12,3546
22	0,69	COMB18	Combination	-442,082	-15,096	0	0	0	12,3546
22	0,78857	COMB18	Combination	-442,082	-12,773	0	0	0	13,7281
22	0,78857	COMB18	Combination	-442,082	-14,212	0	0	0	13,7281
22	0,88714	COMB18	Combination	-442,082	-11,89	0	0	0	15,0146
22	0,88714	COMB18	Combination	-442,082	-13,363	0	0	0	15,0146
22	0,98571	COMB18	Combination	-442,082	-11,041	0	0	0	16,2173
22	0,98571	COMB18	Combination	-442,082	-12,548	0	0	0	16,2173
22	1,08429	COMB18	Combination	-442,082	-10,226	0	0	0	17,3398
22	1,08429	COMB18	Combination	-442,082	-11,766	0	0	0	17,3398
22	1,18286	COMB18	Combination	-442,082	-9,444	0	0	0	18,3851
22	1,18286	COMB18	Combination	-442,082	-11,017	0	0	0	18,3851
22	1,28143	COMB18	Combination	-442,082	-8,694	0	0	0	19,3566
22	1,28143	COMB18	Combination	-442,082	-10,298	0	0	0	19,3566
22	1,38	COMB18	Combination	-442,082	-7,976	0	0	0	20,2572
22	1,38	COMB18	Combination	-442,082	-9,61	0	0	0	20,2572
22	1,47857	COMB18	Combination	-442,082	-7,287	0	0	0	21,09
22	1,47857	COMB18	Combination	-442,082	-8,951	0	0	0	21,09
22	1,57714	COMB18	Combination	-442,082	-6,629	0	0	0	21,8579
22	1,57714	COMB18	Combination	-442,082	-8,32	0	0	0	21,8579
22	1,67571	COMB18	Combination	-442,082	-5,998	0	0	0	22,5636
22	1,67571	COMB18	Combination	-442,082	-7,717	0	0	0	22,5636
22	1,77429	COMB18	Combination	-442,082	-5,394	0	0	0	23,2098
22	1,77429	COMB18	Combination	-442,082	-7,139	0	0	0	23,2098
22	1,87286	COMB18	Combination	-442,082	-4,817	0	0	0	23,799
22	1,87286	COMB18	Combination	-442,082	-6,587	0	0	0	23,799
22	1,97143	COMB18	Combination	-442,082	-4,264	0	0	0	24,3338
22	1,97143	COMB18	Combination	-442,082	-6,058	0	0	0	24,3338
22	2,07	COMB18	Combination	-442,082	-3,735	0	0	0	24,8164
22	2,07	COMB18	Combination	-442,082	-5,551	0	0	0	24,8164
22	2,16857	COMB18	Combination	-442,082	-3,228	0	0	0	25,2491
22	2,16857	COMB18	Combination	-442,082	-5,066	0	0	0	25,2491
22	2,26714	COMB18	Combination	-442,082	-2,743	0	0	0	25,634
22	2,26714	COMB18	Combination	-442,082	-4,601	0	0	0	25,634
22	2,36571	COMB18	Combination	-442,082	-2,278	0	0	0	25,9731
22	2,36571	COMB18	Combination	-442,082	-4,155	0	0	0	25,9731
22	2,46429	COMB18	Combination	-442,082	-1,832	0	0	0	26,2681
22	2,46429	COMB18	Combination	-442,082	-3,726	0	0	0	26,2681
22	2,56286	COMB18	Combination	-442,082	-1,403	0	0	0	26,5209
22	2,56286	COMB18	Combination	-442,082	-3,314	0	0	0	26,5209
22	2,66143	COMB18	Combination	-442,082	-0,991	0	0	0	26,7331
22	2,66143	COMB18	Combination	-442,082	-2,916	0	0	0	26,7331
22	2,76	COMB18	Combination	-442,082	-0,594	0	0	0	26,9061
22	2,76	COMB18	Combination	-442,082	-2,533	0	0	0	26,9061
22	2,85857	COMB18	Combination	-442,082	-0,21	0	0	0	27,0413
22	2,85857	COMB18	Combination	-442,082	-2,162	0	0	0	27,0413
22	2,95714	COMB18	Combination	-442,082	0,161	0	0	0	27,1399

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011

22	2,95714	COMB18	Combination	-442,082	-1,802	0	0	0	27,1399
22	3,05571	COMB18	Combination	-442,082	0,521	0	0	0	27,203
22	3,05571	COMB18	Combination	-442,082	-1,452	0	0	0	27,203
22	3,15429	COMB18	Combination	-442,082	0,871	0	0	0	27,2317
22	3,15429	COMB18	Combination	-442,082	-1,111	0	0	0	27,2317
22	3,25286	COMB18	Combination	-442,082	1,212	0	0	0	27,2267
22	3,25286	COMB18	Combination	-442,082	-0,777	0	0	0	27,2267
22	3,35143	COMB18	Combination	-442,082	1,546	0	0	0	27,1888
22	3,35143	COMB18	Combination	-442,082	-0,449	0	0	0	27,1888
22	3,45	COMB18	Combination	-442,082	1,874	0	0	0	27,1186
22	0	COMB19	Combination	-264,745	-24,325	0	0	0	0
22	0,09857	COMB19	Combination	-264,745	-22,002	0	0	0	2,2833
22	0,09857	COMB19	Combination	-264,745	-23,122	0	0	0	2,2833
22	0,19714	COMB19	Combination	-264,745	-20,799	0	0	0	4,4479
22	0,19714	COMB19	Combination	-264,745	-21,958	0	0	0	4,4479
22	0,29571	COMB19	Combination	-264,745	-19,636	0	0	0	6,4979
22	0,29571	COMB19	Combination	-264,745	-20,835	0	0	0	6,4979
22	0,39429	COMB19	Combination	-264,745	-18,513	0	0	0	8,4372
22	0,39429	COMB19	Combination	-264,745	-19,752	0	0	0	8,4372
22	0,49286	COMB19	Combination	-264,745	-17,429	0	0	0	10,2697
22	0,49286	COMB19	Combination	-264,745	-18,707	0	0	0	10,2697
22	0,59143	COMB19	Combination	-264,745	-16,385	0	0	0	11,9992
22	0,59143	COMB19	Combination	-264,745	-17,701	0	0	0	11,9992
22	0,69	COMB19	Combination	-264,745	-15,379	0	0	0	13,6296
22	0,69	COMB19	Combination	-264,745	-16,733	0	0	0	13,6296
22	0,78857	COMB19	Combination	-264,745	-14,41	0	0	0	15,1645
22	0,78857	COMB19	Combination	-264,745	-15,802	0	0	0	15,1645
22	0,88714	COMB19	Combination	-264,745	-13,479	0	0	0	16,6076
22	0,88714	COMB19	Combination	-264,745	-14,907	0	0	0	16,6076
22	0,98571	COMB19	Combination	-264,745	-12,584	0	0	0	17,9625
22	0,98571	COMB19	Combination	-264,745	-14,047	0	0	0	17,9625
22	1,08429	COMB19	Combination	-264,745	-11,725	0	0	0	19,2327
22	1,08429	COMB19	Combination	-264,745	-13,222	0	0	0	19,2327
22	1,18286	COMB19	Combination	-264,745	-10,899	0	0	0	20,4216
22	1,18286	COMB19	Combination	-264,745	-12,43	0	0	0	20,4216
22	1,28143	COMB19	Combination	-264,745	-10,108	0	0	0	21,5324
22	1,28143	COMB19	Combination	-264,745	-11,671	0	0	0	21,5324
22	1,38	COMB19	Combination	-264,745	-9,348	0	0	0	22,5683
22	1,38	COMB19	Combination	-264,745	-10,943	0	0	0	22,5683
22	1,47857	COMB19	Combination	-264,745	-8,62	0	0	0	23,5325
22	1,47857	COMB19	Combination	-264,745	-10,245	0	0	0	23,5325
22	1,57714	COMB19	Combination	-264,745	-7,923	0	0	0	24,428
22	1,57714	COMB19	Combination	-264,745	-9,577	0	0	0	24,428
22	1,67571	COMB19	Combination	-264,745	-7,254	0	0	0	25,2575
22	1,67571	COMB19	Combination	-264,745	-8,936	0	0	0	25,2575
22	1,77429	COMB19	Combination	-264,745	-6,613	0	0	0	26,0238
22	1,77429	COMB19	Combination	-264,745	-8,322	0	0	0	26,0238
22	1,87286	COMB19	Combination	-264,745	-5,999	0	0	0	26,7296
22	1,87286	COMB19	Combination	-264,745	-7,733	0	0	0	26,7296

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011

22	1,97143	COMB19	Combination	-264,745	-5,41	0	0	0	27,3774
22	1,97143	COMB19	Combination	-264,745	-7,168	0	0	0	27,3774
22	2,07	COMB19	Combination	-264,745	-4,845	0	0	0	27,9694
22	2,07	COMB19	Combination	-264,745	-6,626	0	0	0	27,9694
22	2,16857	COMB19	Combination	-264,745	-4,303	0	0	0	28,5081
22	2,16857	COMB19	Combination	-264,745	-6,105	0	0	0	28,5081
22	2,26714	COMB19	Combination	-264,745	-3,782	0	0	0	28,9953
22	2,26714	COMB19	Combination	-264,745	-5,604	0	0	0	28,9953
22	2,36571	COMB19	Combination	-264,745	-3,281	0	0	0	29,4332
22	2,36571	COMB19	Combination	-264,745	-5,121	0	0	0	29,4332
22	2,46429	COMB19	Combination	-264,745	-2,799	0	0	0	29,8236
22	2,46429	COMB19	Combination	-264,745	-4,656	0	0	0	29,8236
22	2,56286	COMB19	Combination	-264,745	-2,333	0	0	0	30,1681
22	2,56286	COMB19	Combination	-264,745	-4,206	0	0	0	30,1681
22	2,66143	COMB19	Combination	-264,745	-1,884	0	0	0	30,4682
22	2,66143	COMB19	Combination	-264,745	-3,771	0	0	0	30,4682
22	2,76	COMB19	Combination	-264,745	-1,448	0	0	0	30,7255
22	2,76	COMB19	Combination	-264,745	-3,349	0	0	0	30,7255
22	2,85857	COMB19	Combination	-264,745	-1,026	0	0	0	30,9411
22	2,85857	COMB19	Combination	-264,745	-2,937	0	0	0	30,9411
22	2,95714	COMB19	Combination	-264,745	-0,615	0	0	0	31,1161
22	2,95714	COMB19	Combination	-264,745	-2,536	0	0	0	31,1161
22	3,05571	COMB19	Combination	-264,745	-0,213	0	0	0	31,2516
22	3,05571	COMB19	Combination	-264,745	-2,143	0	0	0	31,2516
22	3,15429	COMB19	Combination	-264,745	0,18	0	0	0	31,3484
22	3,15429	COMB19	Combination	-264,745	-1,757	0	0	0	31,3484
22	3,25286	COMB19	Combination	-264,745	0,566	0	0	0	31,4071
22	3,25286	COMB19	Combination	-264,745	-1,376	0	0	0	31,4071
22	3,35143	COMB19	Combination	-264,745	0,947	0	0	0	31,4282
22	3,35143	COMB19	Combination	-264,745	-0,999	0	0	0	31,4282
22	3,45	COMB19	Combination	-264,745	1,324	0	0	0	31,4122
22	0	COMB20	Combination	-115,2	-21,606	0	0	0	0
22	0,09857	COMB20	Combination	-115,2	-19,283	0	0	0	2,0152
22	0,09857	COMB20	Combination	-115,2	-20,526	0	0	0	2,0152
22	0,19714	COMB20	Combination	-115,2	-18,204	0	0	0	3,9241
22	0,19714	COMB20	Combination	-115,2	-19,483	0	0	0	3,9241
22	0,29571	COMB20	Combination	-115,2	-17,16	0	0	0	5,73
22	0,29571	COMB20	Combination	-115,2	-18,475	0	0	0	5,73
22	0,39429	COMB20	Combination	-115,2	-16,153	0	0	0	7,4367
22	0,39429	COMB20	Combination	-115,2	-17,503	0	0	0	7,4367
22	0,49286	COMB20	Combination	-115,2	-15,181	0	0	0	9,0475
22	0,49286	COMB20	Combination	-115,2	-16,566	0	0	0	9,0475
22	0,59143	COMB20	Combination	-115,2	-14,244	0	0	0	10,566
22	0,59143	COMB20	Combination	-115,2	-15,664	0	0	0	10,566
22	0,69	COMB20	Combination	-115,2	-13,341	0	0	0	11,9956
22	0,69	COMB20	Combination	-115,2	-14,796	0	0	0	11,9956
22	0,78857	COMB20	Combination	-115,2	-12,473	0	0	0	13,3396
22	0,78857	COMB20	Combination	-115,2	-13,961	0	0	0	13,3396
22	0,88714	COMB20	Combination	-115,2	-11,638	0	0	0	14,6012

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011

22	0,88714	COMB20	Combination	-115,2	-13,158	0	0	0	14,6012
22	0,98571	COMB20	Combination	-115,2	-10,836	0	0	0	15,7838
22	0,98571	COMB20	Combination	-115,2	-12,388	0	0	0	15,7838
22	1,08429	COMB20	Combination	-115,2	-10,065	0	0	0	16,8904
22	1,08429	COMB20	Combination	-115,2	-11,649	0	0	0	16,8904
22	1,18286	COMB20	Combination	-115,2	-9,326	0	0	0	17,9242
22	1,18286	COMB20	Combination	-115,2	-10,939	0	0	0	17,9242
22	1,28143	COMB20	Combination	-115,2	-8,617	0	0	0	18,888
22	1,28143	COMB20	Combination	-115,2	-10,259	0	0	0	18,888
22	1,38	COMB20	Combination	-115,2	-7,937	0	0	0	19,7848
22	1,38	COMB20	Combination	-115,2	-9,608	0	0	0	19,7848
22	1,47857	COMB20	Combination	-115,2	-7,285	0	0	0	20,6174
22	1,47857	COMB20	Combination	-115,2	-8,983	0	0	0	20,6174
22	1,57714	COMB20	Combination	-115,2	-6,661	0	0	0	21,3884
22	1,57714	COMB20	Combination	-115,2	-8,385	0	0	0	21,3884
22	1,67571	COMB20	Combination	-115,2	-6,062	0	0	0	22,1004
22	1,67571	COMB20	Combination	-115,2	-7,812	0	0	0	22,1004
22	1,77429	COMB20	Combination	-115,2	-5,49	0	0	0	22,756
22	1,77429	COMB20	Combination	-115,2	-7,264	0	0	0	22,756
22	1,87286	COMB20	Combination	-115,2	-4,941	0	0	0	23,3575
22	1,87286	COMB20	Combination	-115,2	-6,738	0	0	0	23,3575
22	1,97143	COMB20	Combination	-115,2	-4,415	0	0	0	23,9072
22	1,97143	COMB20	Combination	-115,2	-6,234	0	0	0	23,9072
22	2,07	COMB20	Combination	-115,2	-3,911	0	0	0	24,4073
22	2,07	COMB20	Combination	-115,2	-5,751	0	0	0	24,4073
22	2,16857	COMB20	Combination	-115,2	-3,428	0	0	0	24,8597
22	2,16857	COMB20	Combination	-115,2	-5,288	0	0	0	24,8597
22	2,26714	COMB20	Combination	-115,2	-2,965	0	0	0	25,2664
22	2,26714	COMB20	Combination	-115,2	-4,842	0	0	0	25,2664
22	2,36571	COMB20	Combination	-115,2	-2,52	0	0	0	25,6293
22	2,36571	COMB20	Combination	-115,2	-4,414	0	0	0	25,6293
22	2,46429	COMB20	Combination	-115,2	-2,092	0	0	0	25,9499
22	2,46429	COMB20	Combination	-115,2	-4,002	0	0	0	25,9499
22	2,56286	COMB20	Combination	-115,2	-1,68	0	0	0	26,2299
22	2,56286	COMB20	Combination	-115,2	-3,605	0	0	0	26,2299
22	2,66143	COMB20	Combination	-115,2	-1,282	0	0	0	26,4708
22	2,66143	COMB20	Combination	-115,2	-3,22	0	0	0	26,4708
22	2,76	COMB20	Combination	-115,2	-0,898	0	0	0	26,6738
22	2,76	COMB20	Combination	-115,2	-2,848	0	0	0	26,6738
22	2,85857	COMB20	Combination	-115,2	-0,526	0	0	0	26,8401
22	2,85857	COMB20	Combination	-115,2	-2,487	0	0	0	26,8401
22	2,95714	COMB20	Combination	-115,2	-0,165	0	0	0	26,9708
22	2,95714	COMB20	Combination	-115,2	-2,136	0	0	0	26,9708
22	3,05571	COMB20	Combination	-115,2	0,187	0	0	0	27,0668
22	3,05571	COMB20	Combination	-115,2	-1,792	0	0	0	27,0668
22	3,15429	COMB20	Combination	-115,2	0,531	0	0	0	27,129
22	3,15429	COMB20	Combination	-115,2	-1,456	0	0	0	27,129
22	3,25286	COMB20	Combination	-115,2	0,867	0	0	0	27,158
22	3,25286	COMB20	Combination	-115,2	-1,125	0	0	0	27,158

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011

22	3,35143	COMB20	Combination	-115,2	1,198	0	0	0	27,1544
22	3,35143	COMB20	Combination	-115,2	-0,798	0	0	0	27,1544
22	3,45	COMB20	Combination	-115,2	1,524	0	0	0	27,1186
22	0	COMB21	Combination	62,137	-23,624	0	0	0	0
22	0,09857	COMB21	Combination	62,137	-21,301	0	0	0	2,2142
22	0,09857	COMB21	Combination	62,137	-22,485	0	0	0	2,2142
22	0,19714	COMB21	Combination	62,137	-20,162	0	0	0	4,316
22	0,19714	COMB21	Combination	62,137	-21,383	0	0	0	4,316
22	0,29571	COMB21	Combination	62,137	-19,06	0	0	0	6,3093
22	0,29571	COMB21	Combination	62,137	-20,319	0	0	0	6,3093
22	0,39429	COMB21	Combination	62,137	-17,997	0	0	0	8,1978
22	0,39429	COMB21	Combination	62,137	-19,293	0	0	0	8,1978
22	0,49286	COMB21	Combination	62,137	-16,97	0	0	0	9,985
22	0,49286	COMB21	Combination	62,137	-18,304	0	0	0	9,985
22	0,59143	COMB21	Combination	62,137	-15,981	0	0	0	11,6748
22	0,59143	COMB21	Combination	62,137	-17,35	0	0	0	11,6748
22	0,69	COMB21	Combination	62,137	-15,028	0	0	0	13,2706
22	0,69	COMB21	Combination	62,137	-16,433	0	0	0	13,2706
22	0,78857	COMB21	Combination	62,137	-14,11	0	0	0	14,7759
22	0,78857	COMB21	Combination	62,137	-15,55	0	0	0	14,7759
22	0,88714	COMB21	Combination	62,137	-13,228	0	0	0	16,1943
22	0,88714	COMB21	Combination	62,137	-14,702	0	0	0	16,1943
22	0,98571	COMB21	Combination	62,137	-12,379	0	0	0	17,529
22	0,98571	COMB21	Combination	62,137	-13,887	0	0	0	17,529
22	1,08429	COMB21	Combination	62,137	-11,564	0	0	0	18,7834
22	1,08429	COMB21	Combination	62,137	-13,104	0	0	0	18,7834
22	1,18286	COMB21	Combination	62,137	-10,782	0	0	0	19,9606
22	1,18286	COMB21	Combination	62,137	-12,353	0	0	0	19,9606
22	1,28143	COMB21	Combination	62,137	-10,03	0	0	0	21,0638
22	1,28143	COMB21	Combination	62,137	-11,632	0	0	0	21,0638
22	1,38	COMB21	Combination	62,137	-9,309	0	0	0	22,0959
22	1,38	COMB21	Combination	62,137	-10,941	0	0	0	22,0959
22	1,47857	COMB21	Combination	62,137	-8,618	0	0	0	23,0599
22	1,47857	COMB21	Combination	62,137	-10,277	0	0	0	23,0599
22	1,57714	COMB21	Combination	62,137	-7,955	0	0	0	23,9584
22	1,57714	COMB21	Combination	62,137	-9,641	0	0	0	23,9584
22	1,67571	COMB21	Combination	62,137	-7,319	0	0	0	24,7943
22	1,67571	COMB21	Combination	62,137	-9,031	0	0	0	24,7943
22	1,77429	COMB21	Combination	62,137	-6,709	0	0	0	25,5701
22	1,77429	COMB21	Combination	62,137	-8,446	0	0	0	25,5701
22	1,87286	COMB21	Combination	62,137	-6,123	0	0	0	26,2881
22	1,87286	COMB21	Combination	62,137	-7,884	0	0	0	26,2881
22	1,97143	COMB21	Combination	62,137	-5,561	0	0	0	26,9508
22	1,97143	COMB21	Combination	62,137	-7,344	0	0	0	26,9508
22	2,07	COMB21	Combination	62,137	-5,022	0	0	0	27,5603
22	2,07	COMB21	Combination	62,137	-6,826	0	0	0	27,5603
22	2,16857	COMB21	Combination	62,137	-4,503	0	0	0	28,1186
22	2,16857	COMB21	Combination	62,137	-6,326	0	0	0	28,1186
22	2,26714	COMB21	Combination	62,137	-4,004	0	0	0	28,6277

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

Codice documento
SS0558_F0.doc

Rev
F0

Data
20/06/2011

22	2,26714	COMB21	Combination	62,137	-5,845	0	0	0	28,6277
22	2,36571	COMB21	Combination	62,137	-3,523	0	0	0	29,0894
22	2,36571	COMB21	Combination	62,137	-5,381	0	0	0	29,0894
22	2,46429	COMB21	Combination	62,137	-3,058	0	0	0	29,5054
22	2,46429	COMB21	Combination	62,137	-4,932	0	0	0	29,5054
22	2,56286	COMB21	Combination	62,137	-2,61	0	0	0	29,8771
22	2,56286	COMB21	Combination	62,137	-4,497	0	0	0	29,8771
22	2,66143	COMB21	Combination	62,137	-2,175	0	0	0	30,2059
22	2,66143	COMB21	Combination	62,137	-4,075	0	0	0	30,2059
22	2,76	COMB21	Combination	62,137	-1,753	0	0	0	30,4932
22	2,76	COMB21	Combination	62,137	-3,664	0	0	0	30,4932
22	2,85857	COMB21	Combination	62,137	-1,341	0	0	0	30,7399
22	2,85857	COMB21	Combination	62,137	-3,263	0	0	0	30,7399
22	2,95714	COMB21	Combination	62,137	-0,94	0	0	0	30,947
22	2,95714	COMB21	Combination	62,137	-2,869	0	0	0	30,947
22	3,05571	COMB21	Combination	62,137	-0,547	0	0	0	31,1154
22	3,05571	COMB21	Combination	62,137	-2,483	0	0	0	31,1154
22	3,15429	COMB21	Combination	62,137	-0,16	0	0	0	31,2456
22	3,15429	COMB21	Combination	62,137	-2,102	0	0	0	31,2456
22	3,25286	COMB21	Combination	62,137	0,221	0	0	0	31,3383
22	3,25286	COMB21	Combination	62,137	-1,724	0	0	0	31,3383
22	3,35143	COMB21	Combination	62,137	0,599	0	0	0	31,3938
22	3,35143	COMB21	Combination	62,137	-1,349	0	0	0	31,3938
22	3,45	COMB21	Combination	62,137	0,974	0	0	0	31,4122

MIN P	62,137
MAX P	-442,082
MAX V2 positivo	1,874
MAX V2 negativo	-24,325
MAX M3 positivo	31,4282
MAX M3 negativo	0

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011

ASTA 23

SLU

TABLE: Element Forces - Frames

Frame	Station	OutputCase	CaseType	P	V2	V3	T	M2	M3
Text	m	Text	Text	KN	KN	KN	KN-m	KN-m	KN-m
23	0	COMB1	Combination	15,561	-0,382	0	9,978E-17	0	30,7735
23	0,09857	COMB1	Combination	15,561	2,638	0	9,978E-17	0	30,6623
23	0,09857	COMB1	Combination	15,561	-0,019	0	9,978E-17	0	30,6623
23	0,19714	COMB1	Combination	15,561	3,001	0	9,978E-17	0	30,5153
23	0,19714	COMB1	Combination	15,561	0,343	0	9,978E-17	0	30,5153
23	0,29571	COMB1	Combination	15,561	3,362	0	9,978E-17	0	30,3327
23	0,29571	COMB1	Combination	15,561	0,703	0	9,978E-17	0	30,3327
23	0,39429	COMB1	Combination	15,561	3,722	0	9,978E-17	0	30,1146
23	0,39429	COMB1	Combination	15,561	1,064	0	9,978E-17	0	30,1146
23	0,49286	COMB1	Combination	15,561	4,084	0	9,978E-17	0	29,8609
23	0,49286	COMB1	Combination	15,561	1,427	0	9,978E-17	0	29,8609
23	0,59143	COMB1	Combination	15,561	4,447	0	9,978E-17	0	29,5714
23	0,59143	COMB1	Combination	15,561	1,794	0	9,978E-17	0	29,5714
23	0,69	COMB1	Combination	15,561	4,814	0	9,978E-17	0	29,2457
23	0,69	COMB1	Combination	15,561	2,166	0	9,978E-17	0	29,2457
23	0,78857	COMB1	Combination	15,561	5,186	0	9,978E-17	0	28,8834
23	0,78857	COMB1	Combination	15,561	2,544	0	9,978E-17	0	28,8834
23	0,88714	COMB1	Combination	15,561	5,564	0	9,978E-17	0	28,4837
23	0,88714	COMB1	Combination	15,561	2,93	0	9,978E-17	0	28,4837
23	0,98571	COMB1	Combination	15,561	5,95	0	9,978E-17	0	28,0461
23	0,98571	COMB1	Combination	15,561	3,326	0	9,978E-17	0	28,0461
23	1,08429	COMB1	Combination	15,561	6,345	0	9,978E-17	0	27,5694
23	1,08429	COMB1	Combination	15,561	3,731	0	9,978E-17	0	27,5694
23	1,18286	COMB1	Combination	15,561	6,751	0	9,978E-17	0	27,0528
23	1,18286	COMB1	Combination	15,561	4,149	0	9,978E-17	0	27,0528
23	1,28143	COMB1	Combination	15,561	7,168	0	9,978E-17	0	26,4951
23	1,28143	COMB1	Combination	15,561	4,579	0	9,978E-17	0	26,4951
23	1,38	COMB1	Combination	15,561	7,599	0	9,978E-17	0	25,8949
23	1,38	COMB1	Combination	15,561	5,024	0	9,978E-17	0	25,8949
23	1,47857	COMB1	Combination	15,561	8,044	0	9,978E-17	0	25,2508
23	1,47857	COMB1	Combination	15,561	5,485	0	9,978E-17	0	25,2508
23	1,57714	COMB1	Combination	15,561	8,504	0	9,978E-17	0	24,5613
23	1,57714	COMB1	Combination	15,561	5,962	0	9,978E-17	0	24,5613
23	1,67571	COMB1	Combination	15,561	8,982	0	9,978E-17	0	23,8248
23	1,67571	COMB1	Combination	15,561	6,458	0	9,978E-17	0	23,8248
23	1,77429	COMB1	Combination	15,561	9,477	0	9,978E-17	0	23,0395
23	1,77429	COMB1	Combination	15,561	6,972	0	9,978E-17	0	23,0395
23	1,87286	COMB1	Combination	15,561	9,992	0	9,978E-17	0	22,2034
23	1,87286	COMB1	Combination	15,561	7,507	0	9,978E-17	0	22,2034
23	1,97143	COMB1	Combination	15,561	10,527	0	9,978E-17	0	21,3145
23	1,97143	COMB1	Combination	15,561	8,064	0	9,978E-17	0	21,3145
23	2,07	COMB1	Combination	15,561	11,083	0	9,978E-17	0	20,3709

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

Codice documento
SS0558_F0.doc

Rev
F0

Data
20/06/2011

23	2,07	COMB1	Combination	15,561	8,643	0	9,978E-17	0	20,3709
23	2,16857	COMB1	Combination	15,561	11,662	0	9,978E-17	0	19,3701
23	2,16857	COMB1	Combination	15,561	9,245	0	9,978E-17	0	19,3701
23	2,26714	COMB1	Combination	15,561	12,265	0	9,978E-17	0	18,31
23	2,26714	COMB1	Combination	15,561	9,872	0	9,978E-17	0	18,31
23	2,36571	COMB1	Combination	15,561	12,891	0	9,978E-17	0	17,1881
23	2,36571	COMB1	Combination	15,561	10,524	0	9,978E-17	0	17,1881
23	2,46429	COMB1	Combination	15,561	13,544	0	9,978E-17	0	16,0019
23	2,46429	COMB1	Combination	15,561	11,203	0	9,978E-17	0	16,0019
23	2,56286	COMB1	Combination	15,561	14,222	0	9,978E-17	0	14,7488
23	2,56286	COMB1	Combination	15,561	11,908	0	9,978E-17	0	14,7488
23	2,66143	COMB1	Combination	15,561	14,927	0	9,978E-17	0	13,4262
23	2,66143	COMB1	Combination	15,561	12,641	0	9,978E-17	0	13,4262
23	2,76	COMB1	Combination	15,561	15,661	0	9,978E-17	0	12,0314
23	2,76	COMB1	Combination	15,561	13,403	0	9,978E-17	0	12,0314
23	2,85857	COMB1	Combination	15,561	16,423	0	9,978E-17	0	10,5614
23	2,85857	COMB1	Combination	15,561	14,194	0	9,978E-17	0	10,5614
23	2,95714	COMB1	Combination	15,561	17,213	0	9,978E-17	0	9,0134
23	2,95714	COMB1	Combination	15,561	15,015	0	9,978E-17	0	9,0134
23	3,05571	COMB1	Combination	15,561	18,034	0	9,978E-17	0	7,3846
23	3,05571	COMB1	Combination	15,561	15,866	0	9,978E-17	0	7,3846
23	3,15429	COMB1	Combination	15,561	18,885	0	9,978E-17	0	5,6719
23	3,15429	COMB1	Combination	15,561	16,747	0	9,978E-17	0	5,6719
23	3,25286	COMB1	Combination	15,561	19,767	0	9,978E-17	0	3,8722
23	3,25286	COMB1	Combination	15,561	17,66	0	9,978E-17	0	3,8722
23	3,35143	COMB1	Combination	15,561	20,68	0	9,978E-17	0	1,9827
23	3,35143	COMB1	Combination	15,561	18,604	0	9,978E-17	0	1,9827
23	3,45	COMB1	Combination	15,561	21,624	0	9,978E-17	0	8,496E-14
23	0	COMB2	Combination	208,083	-0,036	0	1,372E-16	0	30,7735
23	0,09857	COMB2	Combination	208,083	2,984	0	1,372E-16	0	30,6282
23	0,09857	COMB2	Combination	208,083	0,326	0	1,372E-16	0	30,6282
23	0,19714	COMB2	Combination	208,083	3,345	0	1,372E-16	0	30,4472
23	0,19714	COMB2	Combination	208,083	0,684	0	1,372E-16	0	30,4472
23	0,29571	COMB2	Combination	208,083	3,703	0	1,372E-16	0	30,231
23	0,29571	COMB2	Combination	208,083	1,039	0	1,372E-16	0	30,231
23	0,39429	COMB2	Combination	208,083	4,059	0	1,372E-16	0	29,9797
23	0,39429	COMB2	Combination	208,083	1,394	0	1,372E-16	0	29,9797
23	0,49286	COMB2	Combination	208,083	4,414	0	1,372E-16	0	29,6935
23	0,49286	COMB2	Combination	208,083	1,749	0	1,372E-16	0	29,6935
23	0,59143	COMB2	Combination	208,083	4,769	0	1,372E-16	0	29,3722
23	0,59143	COMB2	Combination	208,083	2,107	0	1,372E-16	0	29,3722
23	0,69	COMB2	Combination	208,083	5,126	0	1,372E-16	0	29,0158
23	0,69	COMB2	Combination	208,083	2,467	0	1,372E-16	0	29,0158
23	0,78857	COMB2	Combination	208,083	5,487	0	1,372E-16	0	28,6238
23	0,78857	COMB2	Combination	208,083	2,832	0	1,372E-16	0	28,6238
23	0,88714	COMB2	Combination	208,083	5,852	0	1,372E-16	0	28,1957
23	0,88714	COMB2	Combination	208,083	3,204	0	1,372E-16	0	28,1957
23	0,98571	COMB2	Combination	208,083	6,223	0	1,372E-16	0	27,7311
23	0,98571	COMB2	Combination	208,083	3,583	0	1,372E-16	0	27,7311

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

Codice documento
SS0558_F0.doc

Rev
F0

Data
20/06/2011

23	1,08429	COMB2	Combination	208,083	6,602	0	1,372E-16	0	27,2291
23	1,08429	COMB2	Combination	208,083	3,97	0	1,372E-16	0	27,2291
23	1,18286	COMB2	Combination	208,083	6,99	0	1,372E-16	0	26,6889
23	1,18286	COMB2	Combination	208,083	4,368	0	1,372E-16	0	26,6889
23	1,28143	COMB2	Combination	208,083	7,388	0	1,372E-16	0	26,1096
23	1,28143	COMB2	Combination	208,083	4,777	0	1,372E-16	0	26,1096
23	1,38	COMB2	Combination	208,083	7,797	0	1,372E-16	0	25,4898
23	1,38	COMB2	Combination	208,083	5,199	0	1,372E-16	0	25,4898
23	1,47857	COMB2	Combination	208,083	8,218	0	1,372E-16	0	24,8286
23	1,47857	COMB2	Combination	208,083	5,635	0	1,372E-16	0	24,8286
23	1,57714	COMB2	Combination	208,083	8,654	0	1,372E-16	0	24,1243
23	1,57714	COMB2	Combination	208,083	6,085	0	1,372E-16	0	24,1243
23	1,67571	COMB2	Combination	208,083	9,105	0	1,372E-16	0	23,3757
23	1,67571	COMB2	Combination	208,083	6,552	0	1,372E-16	0	23,3757
23	1,77429	COMB2	Combination	208,083	9,572	0	1,372E-16	0	22,581
23	1,77429	COMB2	Combination	208,083	7,036	0	1,372E-16	0	22,581
23	1,87286	COMB2	Combination	208,083	10,056	0	1,372E-16	0	21,7386
23	1,87286	COMB2	Combination	208,083	7,539	0	1,372E-16	0	21,7386
23	1,97143	COMB2	Combination	208,083	10,559	0	1,372E-16	0	20,8466
23	1,97143	COMB2	Combination	208,083	8,061	0	1,372E-16	0	20,8466
23	2,07	COMB2	Combination	208,083	11,081	0	1,372E-16	0	19,9032
23	2,07	COMB2	Combination	208,083	8,604	0	1,372E-16	0	19,9032
23	2,16857	COMB2	Combination	208,083	11,624	0	1,372E-16	0	18,9063
23	2,16857	COMB2	Combination	208,083	9,168	0	1,372E-16	0	18,9063
23	2,26714	COMB2	Combination	208,083	12,188	0	1,372E-16	0	17,8537
23	2,26714	COMB2	Combination	208,083	9,755	0	1,372E-16	0	17,8537
23	2,36571	COMB2	Combination	208,083	12,775	0	1,372E-16	0	16,7433
23	2,36571	COMB2	Combination	208,083	10,365	0	1,372E-16	0	16,7433
23	2,46429	COMB2	Combination	208,083	13,385	0	1,372E-16	0	15,5727
23	2,46429	COMB2	Combination	208,083	11	0	1,372E-16	0	15,5727
23	2,56286	COMB2	Combination	208,083	14,019	0	1,372E-16	0	14,3397
23	2,56286	COMB2	Combination	208,083	11,659	0	1,372E-16	0	14,3397
23	2,66143	COMB2	Combination	208,083	14,679	0	1,372E-16	0	13,0416
23	2,66143	COMB2	Combination	208,083	12,344	0	1,372E-16	0	13,0416
23	2,76	COMB2	Combination	208,083	15,364	0	1,372E-16	0	11,676
23	2,76	COMB2	Combination	208,083	13,056	0	1,372E-16	0	11,676
23	2,85857	COMB2	Combination	208,083	16,075	0	1,372E-16	0	10,2402
23	2,85857	COMB2	Combination	208,083	13,794	0	1,372E-16	0	10,2402
23	2,95714	COMB2	Combination	208,083	16,814	0	1,372E-16	0	8,7317
23	2,95714	COMB2	Combination	208,083	14,561	0	1,372E-16	0	8,7317
23	3,05571	COMB2	Combination	208,083	17,58	0	1,372E-16	0	7,1476
23	3,05571	COMB2	Combination	208,083	15,355	0	1,372E-16	0	7,1476
23	3,15429	COMB2	Combination	208,083	18,374	0	1,372E-16	0	5,4852
23	3,15429	COMB2	Combination	208,083	16,178	0	1,372E-16	0	5,4852
23	3,25286	COMB2	Combination	208,083	19,197	0	1,372E-16	0	3,7417
23	3,25286	COMB2	Combination	208,083	17,03	0	1,372E-16	0	3,7417
23	3,35143	COMB2	Combination	208,083	20,049	0	1,372E-16	0	1,9143
23	3,35143	COMB2	Combination	208,083	17,91	0	1,372E-16	0	1,9143
23	3,45	COMB2	Combination	208,083	20,93	0	1,372E-16	0	8,109E-14

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD	Codice documento	Rev	Data
	SS0558_F0.doc	F0	20/06/2011

23	0	COMB3	Combination	-119,508	-0,382	0	9,978E-17	0	30,7735
23	0,09857	COMB3	Combination	-119,508	2,638	0	9,978E-17	0	30,6623
23	0,09857	COMB3	Combination	-119,508	-0,019	0	9,978E-17	0	30,6623
23	0,19714	COMB3	Combination	-119,508	3,001	0	9,978E-17	0	30,5153
23	0,19714	COMB3	Combination	-119,508	0,343	0	9,978E-17	0	30,5153
23	0,29571	COMB3	Combination	-119,508	3,362	0	9,978E-17	0	30,3327
23	0,29571	COMB3	Combination	-119,508	0,703	0	9,978E-17	0	30,3327
23	0,39429	COMB3	Combination	-119,508	3,722	0	9,978E-17	0	30,1146
23	0,39429	COMB3	Combination	-119,508	1,064	0	9,978E-17	0	30,1146
23	0,49286	COMB3	Combination	-119,508	4,084	0	9,978E-17	0	29,8609
23	0,49286	COMB3	Combination	-119,508	1,427	0	9,978E-17	0	29,8609
23	0,59143	COMB3	Combination	-119,508	4,447	0	9,978E-17	0	29,5714
23	0,59143	COMB3	Combination	-119,508	1,794	0	9,978E-17	0	29,5714
23	0,69	COMB3	Combination	-119,508	4,814	0	9,978E-17	0	29,2457
23	0,69	COMB3	Combination	-119,508	2,166	0	9,978E-17	0	29,2457
23	0,78857	COMB3	Combination	-119,508	5,186	0	9,978E-17	0	28,8834
23	0,78857	COMB3	Combination	-119,508	2,544	0	9,978E-17	0	28,8834
23	0,88714	COMB3	Combination	-119,508	5,564	0	9,978E-17	0	28,4837
23	0,88714	COMB3	Combination	-119,508	2,93	0	9,978E-17	0	28,4837
23	0,98571	COMB3	Combination	-119,508	5,95	0	9,978E-17	0	28,0461
23	0,98571	COMB3	Combination	-119,508	3,326	0	9,978E-17	0	28,0461
23	1,08429	COMB3	Combination	-119,508	6,345	0	9,978E-17	0	27,5694
23	1,08429	COMB3	Combination	-119,508	3,731	0	9,978E-17	0	27,5694
23	1,18286	COMB3	Combination	-119,508	6,751	0	9,978E-17	0	27,0528
23	1,18286	COMB3	Combination	-119,508	4,149	0	9,978E-17	0	27,0528
23	1,28143	COMB3	Combination	-119,508	7,168	0	9,978E-17	0	26,4951
23	1,28143	COMB3	Combination	-119,508	4,579	0	9,978E-17	0	26,4951
23	1,38	COMB3	Combination	-119,508	7,599	0	9,978E-17	0	25,8949
23	1,38	COMB3	Combination	-119,508	5,024	0	9,978E-17	0	25,8949
23	1,47857	COMB3	Combination	-119,508	8,044	0	9,978E-17	0	25,2508
23	1,47857	COMB3	Combination	-119,508	5,485	0	9,978E-17	0	25,2508
23	1,57714	COMB3	Combination	-119,508	8,504	0	9,978E-17	0	24,5613
23	1,57714	COMB3	Combination	-119,508	5,962	0	9,978E-17	0	24,5613
23	1,67571	COMB3	Combination	-119,508	8,982	0	9,978E-17	0	23,8248
23	1,67571	COMB3	Combination	-119,508	6,458	0	9,978E-17	0	23,8248
23	1,77429	COMB3	Combination	-119,508	9,477	0	9,978E-17	0	23,0395
23	1,77429	COMB3	Combination	-119,508	6,972	0	9,978E-17	0	23,0395
23	1,87286	COMB3	Combination	-119,508	9,992	0	9,978E-17	0	22,2034
23	1,87286	COMB3	Combination	-119,508	7,507	0	9,978E-17	0	22,2034
23	1,97143	COMB3	Combination	-119,508	10,527	0	9,978E-17	0	21,3145
23	1,97143	COMB3	Combination	-119,508	8,064	0	9,978E-17	0	21,3145
23	2,07	COMB3	Combination	-119,508	11,083	0	9,978E-17	0	20,3709
23	2,07	COMB3	Combination	-119,508	8,643	0	9,978E-17	0	20,3709
23	2,16857	COMB3	Combination	-119,508	11,662	0	9,978E-17	0	19,3701
23	2,16857	COMB3	Combination	-119,508	9,245	0	9,978E-17	0	19,3701
23	2,26714	COMB3	Combination	-119,508	12,265	0	9,978E-17	0	18,31
23	2,26714	COMB3	Combination	-119,508	9,872	0	9,978E-17	0	18,31
23	2,36571	COMB3	Combination	-119,508	12,891	0	9,978E-17	0	17,1881
23	2,36571	COMB3	Combination	-119,508	10,524	0	9,978E-17	0	17,1881

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

Codice documento
SS0558_F0.doc

Rev
F0

Data
20/06/2011

23	2,46429	COMB3	Combination	-119,508	13,544	0	9,978E-17	0	16,0019
23	2,46429	COMB3	Combination	-119,508	11,203	0	9,978E-17	0	16,0019
23	2,56286	COMB3	Combination	-119,508	14,222	0	9,978E-17	0	14,7488
23	2,56286	COMB3	Combination	-119,508	11,908	0	9,978E-17	0	14,7488
23	2,66143	COMB3	Combination	-119,508	14,927	0	9,978E-17	0	13,4262
23	2,66143	COMB3	Combination	-119,508	12,641	0	9,978E-17	0	13,4262
23	2,76	COMB3	Combination	-119,508	15,661	0	9,978E-17	0	12,0314
23	2,76	COMB3	Combination	-119,508	13,403	0	9,978E-17	0	12,0314
23	2,85857	COMB3	Combination	-119,508	16,423	0	9,978E-17	0	10,5614
23	2,85857	COMB3	Combination	-119,508	14,194	0	9,978E-17	0	10,5614
23	2,95714	COMB3	Combination	-119,508	17,213	0	9,978E-17	0	9,0134
23	2,95714	COMB3	Combination	-119,508	15,015	0	9,978E-17	0	9,0134
23	3,05571	COMB3	Combination	-119,508	18,034	0	9,978E-17	0	7,3846
23	3,05571	COMB3	Combination	-119,508	15,866	0	9,978E-17	0	7,3846
23	3,15429	COMB3	Combination	-119,508	18,885	0	9,978E-17	0	5,6719
23	3,15429	COMB3	Combination	-119,508	16,747	0	9,978E-17	0	5,6719
23	3,25286	COMB3	Combination	-119,508	19,767	0	9,978E-17	0	3,8722
23	3,25286	COMB3	Combination	-119,508	17,66	0	9,978E-17	0	3,8722
23	3,35143	COMB3	Combination	-119,508	20,68	0	9,978E-17	0	1,9827
23	3,35143	COMB3	Combination	-119,508	18,604	0	9,978E-17	0	1,9827
23	3,45	COMB3	Combination	-119,508	21,624	0	9,978E-17	0	8,947E-14
23	0	COMB4	Combination	172,223	0,143	0	1,564E-16	0	30,7735
23	0,09857	COMB4	Combination	172,223	3,162	0	1,564E-16	0	30,6106
23	0,09857	COMB4	Combination	172,223	0,504	0	1,564E-16	0	30,6106
23	0,19714	COMB4	Combination	172,223	3,523	0	1,564E-16	0	30,4122
23	0,19714	COMB4	Combination	172,223	0,86	0	1,564E-16	0	30,4122
23	0,29571	COMB4	Combination	172,223	3,879	0	1,564E-16	0	30,1786
23	0,29571	COMB4	Combination	172,223	1,213	0	1,564E-16	0	30,1786
23	0,39429	COMB4	Combination	172,223	4,232	0	1,564E-16	0	29,9102
23	0,39429	COMB4	Combination	172,223	1,564	0	1,564E-16	0	29,9102
23	0,49286	COMB4	Combination	172,223	4,584	0	1,564E-16	0	29,6072
23	0,49286	COMB4	Combination	172,223	1,915	0	1,564E-16	0	29,6072
23	0,59143	COMB4	Combination	172,223	4,935	0	1,564E-16	0	29,2696
23	0,59143	COMB4	Combination	172,223	2,268	0	1,564E-16	0	29,2696
23	0,69	COMB4	Combination	172,223	5,287	0	1,564E-16	0	28,8973
23	0,69	COMB4	Combination	172,223	2,622	0	1,564E-16	0	28,8973
23	0,78857	COMB4	Combination	172,223	5,642	0	1,564E-16	0	28,49
23	0,78857	COMB4	Combination	172,223	2,981	0	1,564E-16	0	28,49
23	0,88714	COMB4	Combination	172,223	6	0	1,564E-16	0	28,0473
23	0,88714	COMB4	Combination	172,223	3,345	0	1,564E-16	0	28,0473
23	0,98571	COMB4	Combination	172,223	6,364	0	1,564E-16	0	27,5688
23	0,98571	COMB4	Combination	172,223	3,715	0	1,564E-16	0	27,5688
23	1,08429	COMB4	Combination	172,223	6,735	0	1,564E-16	0	27,0538
23	1,08429	COMB4	Combination	172,223	4,094	0	1,564E-16	0	27,0538
23	1,18286	COMB4	Combination	172,223	7,113	0	1,564E-16	0	26,5014
23	1,18286	COMB4	Combination	172,223	4,481	0	1,564E-16	0	26,5014
23	1,28143	COMB4	Combination	172,223	7,501	0	1,564E-16	0	25,9109
23	1,28143	COMB4	Combination	172,223	4,879	0	1,564E-16	0	25,9109
23	1,38	COMB4	Combination	172,223	7,899	0	1,564E-16	0	25,2811

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

Codice documento
SS0558_F0.doc

Rev
F0

Data
20/06/2011

23	1,38	COMB4	Combination	172,223	5,289	0	1,564E-16	0	25,2811
23	1,47857	COMB4	Combination	172,223	8,309	0	1,564E-16	0	24,611
23	1,47857	COMB4	Combination	172,223	5,712	0	1,564E-16	0	24,611
23	1,57714	COMB4	Combination	172,223	8,731	0	1,564E-16	0	23,8991
23	1,57714	COMB4	Combination	172,223	6,149	0	1,564E-16	0	23,8991
23	1,67571	COMB4	Combination	172,223	9,168	0	1,564E-16	0	23,1442
23	1,67571	COMB4	Combination	172,223	6,601	0	1,564E-16	0	23,1442
23	1,77429	COMB4	Combination	172,223	9,62	0	1,564E-16	0	22,3447
23	1,77429	COMB4	Combination	172,223	7,069	0	1,564E-16	0	22,3447
23	1,87286	COMB4	Combination	172,223	10,089	0	1,564E-16	0	21,4991
23	1,87286	COMB4	Combination	172,223	7,555	0	1,564E-16	0	21,4991
23	1,97143	COMB4	Combination	172,223	10,575	0	1,564E-16	0	20,6055
23	1,97143	COMB4	Combination	172,223	8,06	0	1,564E-16	0	20,6055
23	2,07	COMB4	Combination	172,223	11,08	0	1,564E-16	0	19,6622
23	2,07	COMB4	Combination	172,223	8,584	0	1,564E-16	0	19,6622
23	2,16857	COMB4	Combination	172,223	11,604	0	1,564E-16	0	18,6672
23	2,16857	COMB4	Combination	172,223	9,129	0	1,564E-16	0	18,6672
23	2,26714	COMB4	Combination	172,223	12,148	0	1,564E-16	0	17,6186
23	2,26714	COMB4	Combination	172,223	9,695	0	1,564E-16	0	17,6186
23	2,36571	COMB4	Combination	172,223	12,715	0	1,564E-16	0	16,5141
23	2,36571	COMB4	Combination	172,223	10,284	0	1,564E-16	0	16,5141
23	2,46429	COMB4	Combination	172,223	13,303	0	1,564E-16	0	15,3516
23	2,46429	COMB4	Combination	172,223	10,895	0	1,564E-16	0	15,3516
23	2,56286	COMB4	Combination	172,223	13,915	0	1,564E-16	0	14,1288
23	2,56286	COMB4	Combination	172,223	11,531	0	1,564E-16	0	14,1288
23	2,66143	COMB4	Combination	172,223	14,55	0	1,564E-16	0	12,8434
23	2,66143	COMB4	Combination	172,223	12,191	0	1,564E-16	0	12,8434
23	2,76	COMB4	Combination	172,223	15,211	0	1,564E-16	0	11,4928
23	2,76	COMB4	Combination	172,223	12,877	0	1,564E-16	0	11,4928
23	2,85857	COMB4	Combination	172,223	15,896	0	1,564E-16	0	10,0747
23	2,85857	COMB4	Combination	172,223	13,589	0	1,564E-16	0	10,0747
23	2,95714	COMB4	Combination	172,223	16,608	0	1,564E-16	0	8,5865
23	2,95714	COMB4	Combination	172,223	14,327	0	1,564E-16	0	8,5865
23	3,05571	COMB4	Combination	172,223	17,346	0	1,564E-16	0	7,0254
23	3,05571	COMB4	Combination	172,223	15,092	0	1,564E-16	0	7,0254
23	3,15429	COMB4	Combination	172,223	18,111	0	1,564E-16	0	5,389
23	3,15429	COMB4	Combination	172,223	15,884	0	1,564E-16	0	5,389
23	3,25286	COMB4	Combination	172,223	18,904	0	1,564E-16	0	3,6744
23	3,25286	COMB4	Combination	172,223	16,705	0	1,564E-16	0	3,6744
23	3,35143	COMB4	Combination	172,223	19,724	0	1,564E-16	0	1,879
23	3,35143	COMB4	Combination	172,223	17,553	0	1,564E-16	0	1,879
23	3,45	COMB4	Combination	172,223	20,572	0	1,564E-16	0	9,463E-14
23	0	COMB5	Combination	-21,619	-0,123	0	9,719E-17	0	30,2673
23	0,09857	COMB5	Combination	-21,619	2,199	0	9,719E-17	0	30,165
23	0,09857	COMB5	Combination	-21,619	0,234	0	9,719E-17	0	30,165
23	0,19714	COMB5	Combination	-21,619	2,557	0	9,719E-17	0	30,0274
23	0,19714	COMB5	Combination	-21,619	0,59	0	9,719E-17	0	30,0274
23	0,29571	COMB5	Combination	-21,619	2,913	0	9,719E-17	0	29,8548
23	0,29571	COMB5	Combination	-21,619	0,946	0	9,719E-17	0	29,8548

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

Codice documento
SS0558_F0.doc

Rev
F0

Data
20/06/2011

23	0,39429	COMB5	Combination	-21,619	3,268	0	9,719E-17	0	29,6471
23	0,39429	COMB5	Combination	-21,619	1,302	0	9,719E-17	0	29,6471
23	0,49286	COMB5	Combination	-21,619	3,625	0	9,719E-17	0	29,4043
23	0,49286	COMB5	Combination	-21,619	1,661	0	9,719E-17	0	29,4043
23	0,59143	COMB5	Combination	-21,619	3,984	0	9,719E-17	0	29,126
23	0,59143	COMB5	Combination	-21,619	2,024	0	9,719E-17	0	29,126
23	0,69	COMB5	Combination	-21,619	4,347	0	9,719E-17	0	28,8121
23	0,69	COMB5	Combination	-21,619	2,392	0	9,719E-17	0	28,8121
23	0,78857	COMB5	Combination	-21,619	4,715	0	9,719E-17	0	28,4618
23	0,78857	COMB5	Combination	-21,619	2,767	0	9,719E-17	0	28,4618
23	0,88714	COMB5	Combination	-21,619	5,089	0	9,719E-17	0	28,0746
23	0,88714	COMB5	Combination	-21,619	3,15	0	9,719E-17	0	28,0746
23	0,98571	COMB5	Combination	-21,619	5,472	0	9,719E-17	0	27,6497
23	0,98571	COMB5	Combination	-21,619	3,542	0	9,719E-17	0	27,6497
23	1,08429	COMB5	Combination	-21,619	5,864	0	9,719E-17	0	27,1861
23	1,08429	COMB5	Combination	-21,619	3,944	0	9,719E-17	0	27,1861
23	1,18286	COMB5	Combination	-21,619	6,267	0	9,719E-17	0	26,6828
23	1,18286	COMB5	Combination	-21,619	4,359	0	9,719E-17	0	26,6828
23	1,28143	COMB5	Combination	-21,619	6,682	0	9,719E-17	0	26,1387
23	1,28143	COMB5	Combination	-21,619	4,787	0	9,719E-17	0	26,1387
23	1,38	COMB5	Combination	-21,619	7,11	0	9,719E-17	0	25,5524
23	1,38	COMB5	Combination	-21,619	5,229	0	9,719E-17	0	25,5524
23	1,47857	COMB5	Combination	-21,619	7,552	0	9,719E-17	0	24,9225
23	1,47857	COMB5	Combination	-21,619	5,687	0	9,719E-17	0	24,9225
23	1,57714	COMB5	Combination	-21,619	8,01	0	9,719E-17	0	24,2474
23	1,57714	COMB5	Combination	-21,619	6,163	0	9,719E-17	0	24,2474
23	1,67571	COMB5	Combination	-21,619	8,485	0	9,719E-17	0	23,5254
23	1,67571	COMB5	Combination	-21,619	6,656	0	9,719E-17	0	23,5254
23	1,77429	COMB5	Combination	-21,619	8,978	0	9,719E-17	0	22,7549
23	1,77429	COMB5	Combination	-21,619	7,168	0	9,719E-17	0	22,7549
23	1,87286	COMB5	Combination	-21,619	9,491	0	9,719E-17	0	21,9338
23	1,87286	COMB5	Combination	-21,619	7,701	0	9,719E-17	0	21,9338
23	1,97143	COMB5	Combination	-21,619	10,024	0	9,719E-17	0	21,0603
23	1,97143	COMB5	Combination	-21,619	8,255	0	9,719E-17	0	21,0603
23	2,07	COMB5	Combination	-21,619	10,578	0	9,719E-17	0	20,132
23	2,07	COMB5	Combination	-21,619	8,832	0	9,719E-17	0	20,132
23	2,16857	COMB5	Combination	-21,619	11,155	0	9,719E-17	0	19,147
23	2,16857	COMB5	Combination	-21,619	9,433	0	9,719E-17	0	19,147
23	2,26714	COMB5	Combination	-21,619	11,755	0	9,719E-17	0	18,1027
23	2,26714	COMB5	Combination	-21,619	10,057	0	9,719E-17	0	18,1027
23	2,36571	COMB5	Combination	-21,619	12,38	0	9,719E-17	0	16,9969
23	2,36571	COMB5	Combination	-21,619	10,707	0	9,719E-17	0	16,9969
23	2,46429	COMB5	Combination	-21,619	13,03	0	9,719E-17	0	15,827
23	2,46429	COMB5	Combination	-21,619	11,384	0	9,719E-17	0	15,827
23	2,56286	COMB5	Combination	-21,619	13,706	0	9,719E-17	0	14,5904
23	2,56286	COMB5	Combination	-21,619	12,087	0	9,719E-17	0	14,5904
23	2,66143	COMB5	Combination	-21,619	14,41	0	9,719E-17	0	13,2845
23	2,66143	COMB5	Combination	-21,619	12,818	0	9,719E-17	0	13,2845
23	2,76	COMB5	Combination	-21,619	15,141	0	9,719E-17	0	11,9065

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

Codice documento
SS0558_F0.doc

Rev
F0

Data
20/06/2011

23	2,76	COMB5	Combination	-21,619	13,578	0	9,719E-17	0	11,9065
23	2,85857	COMB5	Combination	-21,619	15,9	0	9,719E-17	0	10,4537
23	2,85857	COMB5	Combination	-21,619	14,366	0	9,719E-17	0	10,4537
23	2,95714	COMB5	Combination	-21,619	16,689	0	9,719E-17	0	8,9231
23	2,95714	COMB5	Combination	-21,619	15,185	0	9,719E-17	0	8,9231
23	3,05571	COMB5	Combination	-21,619	17,507	0	9,719E-17	0	7,3118
23	3,05571	COMB5	Combination	-21,619	16,033	0	9,719E-17	0	7,3118
23	3,15429	COMB5	Combination	-21,619	18,356	0	9,719E-17	0	5,6169
23	3,15429	COMB5	Combination	-21,619	16,913	0	9,719E-17	0	5,6169
23	3,25286	COMB5	Combination	-21,619	19,235	0	9,719E-17	0	3,8354
23	3,25286	COMB5	Combination	-21,619	17,823	0	9,719E-17	0	3,8354
23	3,35143	COMB5	Combination	-21,619	20,145	0	9,719E-17	0	1,9641
23	3,35143	COMB5	Combination	-21,619	18,764	0	9,719E-17	0	1,9641
23	3,45	COMB5	Combination	-21,619	21,087	0	9,719E-17	0	7,831E-14
23	0	COMB6	Combination	277,677	-0,382	0	9,978E-17	0	30,7735
23	0,09857	COMB6	Combination	277,677	2,638	0	9,978E-17	0	30,6623
23	0,09857	COMB6	Combination	277,677	-0,019	0	9,978E-17	0	30,6623
23	0,19714	COMB6	Combination	277,677	3,001	0	9,978E-17	0	30,5153
23	0,19714	COMB6	Combination	277,677	0,343	0	9,978E-17	0	30,5153
23	0,29571	COMB6	Combination	277,677	3,362	0	9,978E-17	0	30,3327
23	0,29571	COMB6	Combination	277,677	0,703	0	9,978E-17	0	30,3327
23	0,39429	COMB6	Combination	277,677	3,722	0	9,978E-17	0	30,1146
23	0,39429	COMB6	Combination	277,677	1,064	0	9,978E-17	0	30,1146
23	0,49286	COMB6	Combination	277,677	4,084	0	9,978E-17	0	29,8609
23	0,49286	COMB6	Combination	277,677	1,427	0	9,978E-17	0	29,8609
23	0,59143	COMB6	Combination	277,677	4,447	0	9,978E-17	0	29,5714
23	0,59143	COMB6	Combination	277,677	1,794	0	9,978E-17	0	29,5714
23	0,69	COMB6	Combination	277,677	4,814	0	9,978E-17	0	29,2457
23	0,69	COMB6	Combination	277,677	2,166	0	9,978E-17	0	29,2457
23	0,78857	COMB6	Combination	277,677	5,186	0	9,978E-17	0	28,8834
23	0,78857	COMB6	Combination	277,677	2,544	0	9,978E-17	0	28,8834
23	0,88714	COMB6	Combination	277,677	5,564	0	9,978E-17	0	28,4837
23	0,88714	COMB6	Combination	277,677	2,93	0	9,978E-17	0	28,4837
23	0,98571	COMB6	Combination	277,677	5,95	0	9,978E-17	0	28,0461
23	0,98571	COMB6	Combination	277,677	3,326	0	9,978E-17	0	28,0461
23	1,08429	COMB6	Combination	277,677	6,345	0	9,978E-17	0	27,5694
23	1,08429	COMB6	Combination	277,677	3,731	0	9,978E-17	0	27,5694
23	1,18286	COMB6	Combination	277,677	6,751	0	9,978E-17	0	27,0528
23	1,18286	COMB6	Combination	277,677	4,149	0	9,978E-17	0	27,0528
23	1,28143	COMB6	Combination	277,677	7,168	0	9,978E-17	0	26,4951
23	1,28143	COMB6	Combination	277,677	4,579	0	9,978E-17	0	26,4951
23	1,38	COMB6	Combination	277,677	7,599	0	9,978E-17	0	25,8949
23	1,38	COMB6	Combination	277,677	5,024	0	9,978E-17	0	25,8949
23	1,47857	COMB6	Combination	277,677	8,044	0	9,978E-17	0	25,2508
23	1,47857	COMB6	Combination	277,677	5,485	0	9,978E-17	0	25,2508
23	1,57714	COMB6	Combination	277,677	8,504	0	9,978E-17	0	24,5613
23	1,57714	COMB6	Combination	277,677	5,962	0	9,978E-17	0	24,5613
23	1,67571	COMB6	Combination	277,677	8,982	0	9,978E-17	0	23,8248
23	1,67571	COMB6	Combination	277,677	6,458	0	9,978E-17	0	23,8248

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

Codice documento
SS0558_F0.doc

Rev
F0

Data
20/06/2011

23	1,77429	COMB6	Combination	277,677	9,477	0	9,978E-17	0	23,0395
23	1,77429	COMB6	Combination	277,677	6,972	0	9,978E-17	0	23,0395
23	1,87286	COMB6	Combination	277,677	9,992	0	9,978E-17	0	22,2034
23	1,87286	COMB6	Combination	277,677	7,507	0	9,978E-17	0	22,2034
23	1,97143	COMB6	Combination	277,677	10,527	0	9,978E-17	0	21,3145
23	1,97143	COMB6	Combination	277,677	8,064	0	9,978E-17	0	21,3145
23	2,07	COMB6	Combination	277,677	11,083	0	9,978E-17	0	20,3709
23	2,07	COMB6	Combination	277,677	8,643	0	9,978E-17	0	20,3709
23	2,16857	COMB6	Combination	277,677	11,662	0	9,978E-17	0	19,3701
23	2,16857	COMB6	Combination	277,677	9,245	0	9,978E-17	0	19,3701
23	2,26714	COMB6	Combination	277,677	12,265	0	9,978E-17	0	18,31
23	2,26714	COMB6	Combination	277,677	9,872	0	9,978E-17	0	18,31
23	2,36571	COMB6	Combination	277,677	12,891	0	9,978E-17	0	17,1881
23	2,36571	COMB6	Combination	277,677	10,524	0	9,978E-17	0	17,1881
23	2,46429	COMB6	Combination	277,677	13,544	0	9,978E-17	0	16,0019
23	2,46429	COMB6	Combination	277,677	11,203	0	9,978E-17	0	16,0019
23	2,56286	COMB6	Combination	277,677	14,222	0	9,978E-17	0	14,7488
23	2,56286	COMB6	Combination	277,677	11,908	0	9,978E-17	0	14,7488
23	2,66143	COMB6	Combination	277,677	14,927	0	9,978E-17	0	13,4262
23	2,66143	COMB6	Combination	277,677	12,641	0	9,978E-17	0	13,4262
23	2,76	COMB6	Combination	277,677	15,661	0	9,978E-17	0	12,0314
23	2,76	COMB6	Combination	277,677	13,403	0	9,978E-17	0	12,0314
23	2,85857	COMB6	Combination	277,677	16,423	0	9,978E-17	0	10,5614
23	2,85857	COMB6	Combination	277,677	14,194	0	9,978E-17	0	10,5614
23	2,95714	COMB6	Combination	277,677	17,213	0	9,978E-17	0	9,0134
23	2,95714	COMB6	Combination	277,677	15,015	0	9,978E-17	0	9,0134
23	3,05571	COMB6	Combination	277,677	18,034	0	9,978E-17	0	7,3846
23	3,05571	COMB6	Combination	277,677	15,866	0	9,978E-17	0	7,3846
23	3,15429	COMB6	Combination	277,677	18,885	0	9,978E-17	0	5,6719
23	3,15429	COMB6	Combination	277,677	16,747	0	9,978E-17	0	5,6719
23	3,25286	COMB6	Combination	277,677	19,767	0	9,978E-17	0	3,8722
23	3,25286	COMB6	Combination	277,677	17,66	0	9,978E-17	0	3,8722
23	3,35143	COMB6	Combination	277,677	20,68	0	9,978E-17	0	1,9827
23	3,35143	COMB6	Combination	277,677	18,604	0	9,978E-17	0	1,9827
23	3,45	COMB6	Combination	277,677	21,624	0	9,978E-17	0	8,947E-14
23	0	COMB7	Combination	8,629	-0,23	0	8,499E-17	0	21,3279
23	0,09857	COMB7	Combination	8,629	2,093	0	8,499E-17	0	21,236
23	0,09857	COMB7	Combination	8,629	0,021	0	8,499E-17	0	21,236
23	0,19714	COMB7	Combination	8,629	2,344	0	8,499E-17	0	21,1194
23	0,19714	COMB7	Combination	8,629	0,27	0	8,499E-17	0	21,1194
23	0,29571	COMB7	Combination	8,629	2,593	0	8,499E-17	0	20,9783
23	0,29571	COMB7	Combination	8,629	0,518	0	8,499E-17	0	20,9783
23	0,39429	COMB7	Combination	8,629	2,841	0	8,499E-17	0	20,8128
23	0,39429	COMB7	Combination	8,629	0,765	0	8,499E-17	0	20,8128
23	0,49286	COMB7	Combination	8,629	3,088	0	8,499E-17	0	20,6229
23	0,49286	COMB7	Combination	8,629	1,014	0	8,499E-17	0	20,6229
23	0,59143	COMB7	Combination	8,629	3,336	0	8,499E-17	0	20,4085
23	0,59143	COMB7	Combination	8,629	1,264	0	8,499E-17	0	20,4085
23	0,69	COMB7	Combination	8,629	3,586	0	8,499E-17	0	20,1694

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

Codice documento
SS0558_F0.doc

Rev
F0

Data
20/06/2011

23	0,69	COMB7	Combination	8,629	1,517	0	8,499E-17	0	20,1694
23	0,78857	COMB7	Combination	8,629	3,839	0	8,499E-17	0	19,9054
23	0,78857	COMB7	Combination	8,629	1,773	0	8,499E-17	0	19,9054
23	0,88714	COMB7	Combination	8,629	4,096	0	8,499E-17	0	19,6162
23	0,88714	COMB7	Combination	8,629	2,034	0	8,499E-17	0	19,6162
23	0,98571	COMB7	Combination	8,629	4,357	0	8,499E-17	0	19,3012
23	0,98571	COMB7	Combination	8,629	2,301	0	8,499E-17	0	19,3012
23	1,08429	COMB7	Combination	8,629	4,624	0	8,499E-17	0	18,9599
23	1,08429	COMB7	Combination	8,629	2,575	0	8,499E-17	0	18,9599
23	1,18286	COMB7	Combination	8,629	4,897	0	8,499E-17	0	18,5916
23	1,18286	COMB7	Combination	8,629	2,855	0	8,499E-17	0	18,5916
23	1,28143	COMB7	Combination	8,629	5,178	0	8,499E-17	0	18,1957
23	1,28143	COMB7	Combination	8,629	3,144	0	8,499E-17	0	18,1957
23	1,38	COMB7	Combination	8,629	5,467	0	8,499E-17	0	17,7713
23	1,38	COMB7	Combination	8,629	3,443	0	8,499E-17	0	17,7713
23	1,47857	COMB7	Combination	8,629	5,765	0	8,499E-17	0	17,3174
23	1,47857	COMB7	Combination	8,629	3,751	0	8,499E-17	0	17,3174
23	1,57714	COMB7	Combination	8,629	6,074	0	8,499E-17	0	16,8332
23	1,57714	COMB7	Combination	8,629	4,07	0	8,499E-17	0	16,8332
23	1,67571	COMB7	Combination	8,629	6,393	0	8,499E-17	0	16,3175
23	1,67571	COMB7	Combination	8,629	4,401	0	8,499E-17	0	16,3175
23	1,77429	COMB7	Combination	8,629	6,724	0	8,499E-17	0	15,7692
23	1,77429	COMB7	Combination	8,629	4,745	0	8,499E-17	0	15,7692
23	1,87286	COMB7	Combination	8,629	7,068	0	8,499E-17	0	15,187
23	1,87286	COMB7	Combination	8,629	5,102	0	8,499E-17	0	15,187
23	1,97143	COMB7	Combination	8,629	7,424	0	8,499E-17	0	14,5696
23	1,97143	COMB7	Combination	8,629	5,473	0	8,499E-17	0	14,5696
23	2,07	COMB7	Combination	8,629	7,795	0	8,499E-17	0	13,9157
23	2,07	COMB7	Combination	8,629	5,858	0	8,499E-17	0	13,9157
23	2,16857	COMB7	Combination	8,629	8,181	0	8,499E-17	0	13,2238
23	2,16857	COMB7	Combination	8,629	6,259	0	8,499E-17	0	13,2238
23	2,26714	COMB7	Combination	8,629	8,582	0	8,499E-17	0	12,4923
23	2,26714	COMB7	Combination	8,629	6,676	0	8,499E-17	0	12,4923
23	2,36571	COMB7	Combination	8,629	8,999	0	8,499E-17	0	11,7198
23	2,36571	COMB7	Combination	8,629	7,11	0	8,499E-17	0	11,7198
23	2,46429	COMB7	Combination	8,629	9,433	0	8,499E-17	0	10,9045
23	2,46429	COMB7	Combination	8,629	7,561	0	8,499E-17	0	10,9045
23	2,56286	COMB7	Combination	8,629	9,884	0	8,499E-17	0	10,0447
23	2,56286	COMB7	Combination	8,629	8,03	0	8,499E-17	0	10,0447
23	2,66143	COMB7	Combination	8,629	10,353	0	8,499E-17	0	9,1386
23	2,66143	COMB7	Combination	8,629	8,518	0	8,499E-17	0	9,1386
23	2,76	COMB7	Combination	8,629	10,84	0	8,499E-17	0	8,1846
23	2,76	COMB7	Combination	8,629	9,024	0	8,499E-17	0	8,1846
23	2,85857	COMB7	Combination	8,629	11,346	0	8,499E-17	0	7,1806
23	2,85857	COMB7	Combination	8,629	9,549	0	8,499E-17	0	7,1806
23	2,95714	COMB7	Combination	8,629	11,872	0	8,499E-17	0	6,1249
23	2,95714	COMB7	Combination	8,629	10,095	0	8,499E-17	0	6,1249
23	3,05571	COMB7	Combination	8,629	12,417	0	8,499E-17	0	5,0154
23	3,05571	COMB7	Combination	8,629	10,66	0	8,499E-17	0	5,0154

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

Codice documento
SS0558_F0.doc

Rev
F0

Data
20/06/2011

23	3,15429	COMB7	Combination	8,629	12,982	0	8,499E-17	0	3,8501
23	3,15429	COMB7	Combination	8,629	11,245	0	8,499E-17	0	3,8501
23	3,25286	COMB7	Combination	8,629	13,568	0	8,499E-17	0	2,6272
23	3,25286	COMB7	Combination	8,629	11,852	0	8,499E-17	0	2,6272
23	3,35143	COMB7	Combination	8,629	14,174	0	8,499E-17	0	1,3445
23	3,35143	COMB7	Combination	8,629	12,478	0	8,499E-17	0	1,3445
23	3,45	COMB7	Combination	8,629	14,801	0	8,499E-17	0	6,034E-14
23	0	COMB8	Combination	175,482	0,07	0	1,174E-16	0	21,3279
23	0,09857	COMB8	Combination	175,482	2,393	0	1,174E-16	0	21,2065
23	0,09857	COMB8	Combination	175,482	0,32	0	1,174E-16	0	21,2065
23	0,19714	COMB8	Combination	175,482	2,643	0	1,174E-16	0	21,0604
23	0,19714	COMB8	Combination	175,482	0,566	0	1,174E-16	0	21,0604
23	0,29571	COMB8	Combination	175,482	2,889	0	1,174E-16	0	20,8902
23	0,29571	COMB8	Combination	175,482	0,81	0	1,174E-16	0	20,8902
23	0,39429	COMB8	Combination	175,482	3,132	0	1,174E-16	0	20,6959
23	0,39429	COMB8	Combination	175,482	1,052	0	1,174E-16	0	20,6959
23	0,49286	COMB8	Combination	175,482	3,374	0	1,174E-16	0	20,4778
23	0,49286	COMB8	Combination	175,482	1,293	0	1,174E-16	0	20,4778
23	0,59143	COMB8	Combination	175,482	3,615	0	1,174E-16	0	20,2359
23	0,59143	COMB8	Combination	175,482	1,535	0	1,174E-16	0	20,2359
23	0,69	COMB8	Combination	175,482	3,857	0	1,174E-16	0	19,9701
23	0,69	COMB8	Combination	175,482	1,778	0	1,174E-16	0	19,9701
23	0,78857	COMB8	Combination	175,482	4,1	0	1,174E-16	0	19,6804
23	0,78857	COMB8	Combination	175,482	2,023	0	1,174E-16	0	19,6804
23	0,88714	COMB8	Combination	175,482	4,345	0	1,174E-16	0	19,3666
23	0,88714	COMB8	Combination	175,482	2,271	0	1,174E-16	0	19,3666
23	0,98571	COMB8	Combination	175,482	4,594	0	1,174E-16	0	19,0282
23	0,98571	COMB8	Combination	175,482	2,524	0	1,174E-16	0	19,0282
23	1,08429	COMB8	Combination	175,482	4,847	0	1,174E-16	0	18,6649
23	1,08429	COMB8	Combination	175,482	2,782	0	1,174E-16	0	18,6649
23	1,18286	COMB8	Combination	175,482	5,104	0	1,174E-16	0	18,2762
23	1,18286	COMB8	Combination	175,482	3,045	0	1,174E-16	0	18,2762
23	1,28143	COMB8	Combination	175,482	5,368	0	1,174E-16	0	17,8616
23	1,28143	COMB8	Combination	175,482	3,316	0	1,174E-16	0	17,8616
23	1,38	COMB8	Combination	175,482	5,639	0	1,174E-16	0	17,4202
23	1,38	COMB8	Combination	175,482	3,594	0	1,174E-16	0	17,4202
23	1,47857	COMB8	Combination	175,482	5,917	0	1,174E-16	0	16,9515
23	1,47857	COMB8	Combination	175,482	3,881	0	1,174E-16	0	16,9515
23	1,57714	COMB8	Combination	175,482	6,204	0	1,174E-16	0	16,4545
23	1,57714	COMB8	Combination	175,482	4,177	0	1,174E-16	0	16,4545
23	1,67571	COMB8	Combination	175,482	6,5	0	1,174E-16	0	15,9282
23	1,67571	COMB8	Combination	175,482	4,483	0	1,174E-16	0	15,9282
23	1,77429	COMB8	Combination	175,482	6,806	0	1,174E-16	0	15,3718
23	1,77429	COMB8	Combination	175,482	4,8	0	1,174E-16	0	15,3718
23	1,87286	COMB8	Combination	175,482	7,123	0	1,174E-16	0	14,7842
23	1,87286	COMB8	Combination	175,482	5,129	0	1,174E-16	0	14,7842
23	1,97143	COMB8	Combination	175,482	7,452	0	1,174E-16	0	14,1641
23	1,97143	COMB8	Combination	175,482	5,47	0	1,174E-16	0	14,1641
23	2,07	COMB8	Combination	175,482	7,793	0	1,174E-16	0	13,5104

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

Codice documento
SS0558_F0.doc

Rev
F0

Data
20/06/2011

23	2,07	COMB8	Combination	175,482	5,825	0	1,174E-16	0	13,5104
23	2,16857	COMB8	Combination	175,482	8,147	0	1,174E-16	0	12,8218
23	2,16857	COMB8	Combination	175,482	6,193	0	1,174E-16	0	12,8218
23	2,26714	COMB8	Combination	175,482	8,515	0	1,174E-16	0	12,0969
23	2,26714	COMB8	Combination	175,482	6,575	0	1,174E-16	0	12,0969
23	2,36571	COMB8	Combination	175,482	8,898	0	1,174E-16	0	11,3343
23	2,36571	COMB8	Combination	175,482	6,973	0	1,174E-16	0	11,3343
23	2,46429	COMB8	Combination	175,482	9,295	0	1,174E-16	0	10,5325
23	2,46429	COMB8	Combination	175,482	7,386	0	1,174E-16	0	10,5325
23	2,56286	COMB8	Combination	175,482	9,708	0	1,174E-16	0	9,69
23	2,56286	COMB8	Combination	175,482	7,815	0	1,174E-16	0	9,69
23	2,66143	COMB8	Combination	175,482	10,137	0	1,174E-16	0	8,8053
23	2,66143	COMB8	Combination	175,482	8,26	0	1,174E-16	0	8,8053
23	2,76	COMB8	Combination	175,482	10,583	0	1,174E-16	0	7,8766
23	2,76	COMB8	Combination	175,482	8,723	0	1,174E-16	0	7,8766
23	2,85857	COMB8	Combination	175,482	11,046	0	1,174E-16	0	6,9023
23	2,85857	COMB8	Combination	175,482	9,203	0	1,174E-16	0	6,9023
23	2,95714	COMB8	Combination	175,482	11,526	0	1,174E-16	0	5,8807
23	2,95714	COMB8	Combination	175,482	9,701	0	1,174E-16	0	5,8807
23	3,05571	COMB8	Combination	175,482	12,024	0	1,174E-16	0	4,8099
23	3,05571	COMB8	Combination	175,482	10,217	0	1,174E-16	0	4,8099
23	3,15429	COMB8	Combination	175,482	12,54	0	1,174E-16	0	3,6883
23	3,15429	COMB8	Combination	175,482	10,752	0	1,174E-16	0	3,6883
23	3,25286	COMB8	Combination	175,482	13,074	0	1,174E-16	0	2,5141
23	3,25286	COMB8	Combination	175,482	11,305	0	1,174E-16	0	2,5141
23	3,35143	COMB8	Combination	175,482	13,628	0	1,174E-16	0	1,2852
23	3,35143	COMB8	Combination	175,482	11,877	0	1,174E-16	0	1,2852
23	3,45	COMB8	Combination	175,482	14,2	0	1,174E-16	0	5,699E-14
23	0	COMB9	Combination	-108,43	-0,23	0	8,499E-17	0	21,3279
23	0,09857	COMB9	Combination	-108,43	2,093	0	8,499E-17	0	21,236
23	0,09857	COMB9	Combination	-108,43	0,021	0	8,499E-17	0	21,236
23	0,19714	COMB9	Combination	-108,43	2,344	0	8,499E-17	0	21,1194
23	0,19714	COMB9	Combination	-108,43	0,27	0	8,499E-17	0	21,1194
23	0,29571	COMB9	Combination	-108,43	2,593	0	8,499E-17	0	20,9783
23	0,29571	COMB9	Combination	-108,43	0,518	0	8,499E-17	0	20,9783
23	0,39429	COMB9	Combination	-108,43	2,841	0	8,499E-17	0	20,8128
23	0,39429	COMB9	Combination	-108,43	0,765	0	8,499E-17	0	20,8128
23	0,49286	COMB9	Combination	-108,43	3,088	0	8,499E-17	0	20,6229
23	0,49286	COMB9	Combination	-108,43	1,014	0	8,499E-17	0	20,6229
23	0,59143	COMB9	Combination	-108,43	3,336	0	8,499E-17	0	20,4085
23	0,59143	COMB9	Combination	-108,43	1,264	0	8,499E-17	0	20,4085
23	0,69	COMB9	Combination	-108,43	3,586	0	8,499E-17	0	20,1694
23	0,69	COMB9	Combination	-108,43	1,517	0	8,499E-17	0	20,1694
23	0,78857	COMB9	Combination	-108,43	3,839	0	8,499E-17	0	19,9054
23	0,78857	COMB9	Combination	-108,43	1,773	0	8,499E-17	0	19,9054
23	0,88714	COMB9	Combination	-108,43	4,096	0	8,499E-17	0	19,6162
23	0,88714	COMB9	Combination	-108,43	2,034	0	8,499E-17	0	19,6162
23	0,98571	COMB9	Combination	-108,43	4,357	0	8,499E-17	0	19,3012
23	0,98571	COMB9	Combination	-108,43	2,301	0	8,499E-17	0	19,3012

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

Codice documento
SS0558_F0.doc

Rev
F0

Data
20/06/2011

23	1,08429	COMB9	Combination	-108,43	4,624	0	8,499E-17	0	18,9599
23	1,08429	COMB9	Combination	-108,43	2,575	0	8,499E-17	0	18,9599
23	1,18286	COMB9	Combination	-108,43	4,897	0	8,499E-17	0	18,5916
23	1,18286	COMB9	Combination	-108,43	2,855	0	8,499E-17	0	18,5916
23	1,28143	COMB9	Combination	-108,43	5,178	0	8,499E-17	0	18,1957
23	1,28143	COMB9	Combination	-108,43	3,144	0	8,499E-17	0	18,1957
23	1,38	COMB9	Combination	-108,43	5,467	0	8,499E-17	0	17,7713
23	1,38	COMB9	Combination	-108,43	3,443	0	8,499E-17	0	17,7713
23	1,47857	COMB9	Combination	-108,43	5,765	0	8,499E-17	0	17,3174
23	1,47857	COMB9	Combination	-108,43	3,751	0	8,499E-17	0	17,3174
23	1,57714	COMB9	Combination	-108,43	6,074	0	8,499E-17	0	16,8332
23	1,57714	COMB9	Combination	-108,43	4,07	0	8,499E-17	0	16,8332
23	1,67571	COMB9	Combination	-108,43	6,393	0	8,499E-17	0	16,3175
23	1,67571	COMB9	Combination	-108,43	4,401	0	8,499E-17	0	16,3175
23	1,77429	COMB9	Combination	-108,43	6,724	0	8,499E-17	0	15,7692
23	1,77429	COMB9	Combination	-108,43	4,745	0	8,499E-17	0	15,7692
23	1,87286	COMB9	Combination	-108,43	7,068	0	8,499E-17	0	15,187
23	1,87286	COMB9	Combination	-108,43	5,102	0	8,499E-17	0	15,187
23	1,97143	COMB9	Combination	-108,43	7,424	0	8,499E-17	0	14,5696
23	1,97143	COMB9	Combination	-108,43	5,473	0	8,499E-17	0	14,5696
23	2,07	COMB9	Combination	-108,43	7,795	0	8,499E-17	0	13,9157
23	2,07	COMB9	Combination	-108,43	5,858	0	8,499E-17	0	13,9157
23	2,16857	COMB9	Combination	-108,43	8,181	0	8,499E-17	0	13,2238
23	2,16857	COMB9	Combination	-108,43	6,259	0	8,499E-17	0	13,2238
23	2,26714	COMB9	Combination	-108,43	8,582	0	8,499E-17	0	12,4923
23	2,26714	COMB9	Combination	-108,43	6,676	0	8,499E-17	0	12,4923
23	2,36571	COMB9	Combination	-108,43	8,999	0	8,499E-17	0	11,7198
23	2,36571	COMB9	Combination	-108,43	7,11	0	8,499E-17	0	11,7198
23	2,46429	COMB9	Combination	-108,43	9,433	0	8,499E-17	0	10,9045
23	2,46429	COMB9	Combination	-108,43	7,561	0	8,499E-17	0	10,9045
23	2,56286	COMB9	Combination	-108,43	9,884	0	8,499E-17	0	10,0447
23	2,56286	COMB9	Combination	-108,43	8,03	0	8,499E-17	0	10,0447
23	2,66143	COMB9	Combination	-108,43	10,353	0	8,499E-17	0	9,1386
23	2,66143	COMB9	Combination	-108,43	8,518	0	8,499E-17	0	9,1386
23	2,76	COMB9	Combination	-108,43	10,84	0	8,499E-17	0	8,1846
23	2,76	COMB9	Combination	-108,43	9,024	0	8,499E-17	0	8,1846
23	2,85857	COMB9	Combination	-108,43	11,346	0	8,499E-17	0	7,1806
23	2,85857	COMB9	Combination	-108,43	9,549	0	8,499E-17	0	7,1806
23	2,95714	COMB9	Combination	-108,43	11,872	0	8,499E-17	0	6,1249
23	2,95714	COMB9	Combination	-108,43	10,095	0	8,499E-17	0	6,1249
23	3,05571	COMB9	Combination	-108,43	12,417	0	8,499E-17	0	5,0154
23	3,05571	COMB9	Combination	-108,43	10,66	0	8,499E-17	0	5,0154
23	3,15429	COMB9	Combination	-108,43	12,982	0	8,499E-17	0	3,8501
23	3,15429	COMB9	Combination	-108,43	11,245	0	8,499E-17	0	3,8501
23	3,25286	COMB9	Combination	-108,43	13,568	0	8,499E-17	0	2,6272
23	3,25286	COMB9	Combination	-108,43	11,852	0	8,499E-17	0	2,6272
23	3,35143	COMB9	Combination	-108,43	14,174	0	8,499E-17	0	1,3445
23	3,35143	COMB9	Combination	-108,43	12,478	0	8,499E-17	0	1,3445
23	3,45	COMB9	Combination	-108,43	14,801	0	8,499E-17	0	6,425E-14

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

Codice documento
SS0558_F0.doc

Rev
F0

Data
20/06/2011

23	0	COMB10	Combination	144,403	0,225	0	1,341E-16	0	21,3279
23	0,09857	COMB10	Combination	144,403	2,548	0	1,341E-16	0	21,1912
23	0,09857	COMB10	Combination	144,403	0,474	0	1,341E-16	0	21,1912
23	0,19714	COMB10	Combination	144,403	2,797	0	1,341E-16	0	21,03
23	0,19714	COMB10	Combination	144,403	0,719	0	1,341E-16	0	21,03
23	0,29571	COMB10	Combination	144,403	3,041	0	1,341E-16	0	20,8447
23	0,29571	COMB10	Combination	144,403	0,96	0	1,341E-16	0	20,8447
23	0,39429	COMB10	Combination	144,403	3,283	0	1,341E-16	0	20,6356
23	0,39429	COMB10	Combination	144,403	1,199	0	1,341E-16	0	20,6356
23	0,49286	COMB10	Combination	144,403	3,522	0	1,341E-16	0	20,403
23	0,49286	COMB10	Combination	144,403	1,437	0	1,341E-16	0	20,403
23	0,59143	COMB10	Combination	144,403	3,759	0	1,341E-16	0	20,1469
23	0,59143	COMB10	Combination	144,403	1,674	0	1,341E-16	0	20,1469
23	0,69	COMB10	Combination	144,403	3,997	0	1,341E-16	0	19,8674
23	0,69	COMB10	Combination	144,403	1,912	0	1,341E-16	0	19,8674
23	0,78857	COMB10	Combination	144,403	4,235	0	1,341E-16	0	19,5645
23	0,78857	COMB10	Combination	144,403	2,151	0	1,341E-16	0	19,5645
23	0,88714	COMB10	Combination	144,403	4,474	0	1,341E-16	0	19,2379
23	0,88714	COMB10	Combination	144,403	2,393	0	1,341E-16	0	19,2379
23	0,98571	COMB10	Combination	144,403	4,716	0	1,341E-16	0	18,8875
23	0,98571	COMB10	Combination	144,403	2,639	0	1,341E-16	0	18,8875
23	1,08429	COMB10	Combination	144,403	4,962	0	1,341E-16	0	18,5129
23	1,08429	COMB10	Combination	144,403	2,889	0	1,341E-16	0	18,5129
23	1,18286	COMB10	Combination	144,403	5,211	0	1,341E-16	0	18,1137
23	1,18286	COMB10	Combination	144,403	3,143	0	1,341E-16	0	18,1137
23	1,28143	COMB10	Combination	144,403	5,466	0	1,341E-16	0	17,6894
23	1,28143	COMB10	Combination	144,403	3,404	0	1,341E-16	0	17,6894
23	1,38	COMB10	Combination	144,403	5,727	0	1,341E-16	0	17,2393
23	1,38	COMB10	Combination	144,403	3,672	0	1,341E-16	0	17,2393
23	1,47857	COMB10	Combination	144,403	5,995	0	1,341E-16	0	16,7629
23	1,47857	COMB10	Combination	144,403	3,948	0	1,341E-16	0	16,7629
23	1,57714	COMB10	Combination	144,403	6,271	0	1,341E-16	0	16,2593
23	1,57714	COMB10	Combination	144,403	4,232	0	1,341E-16	0	16,2593
23	1,67571	COMB10	Combination	144,403	6,555	0	1,341E-16	0	15,7276
23	1,67571	COMB10	Combination	144,403	4,525	0	1,341E-16	0	15,7276
23	1,77429	COMB10	Combination	144,403	6,848	0	1,341E-16	0	15,1671
23	1,77429	COMB10	Combination	144,403	4,829	0	1,341E-16	0	15,1671
23	1,87286	COMB10	Combination	144,403	7,152	0	1,341E-16	0	14,5766
23	1,87286	COMB10	Combination	144,403	5,143	0	1,341E-16	0	14,5766
23	1,97143	COMB10	Combination	144,403	7,466	0	1,341E-16	0	13,9551
23	1,97143	COMB10	Combination	144,403	5,469	0	1,341E-16	0	13,9551
23	2,07	COMB10	Combination	144,403	7,792	0	1,341E-16	0	13,3015
23	2,07	COMB10	Combination	144,403	5,808	0	1,341E-16	0	13,3015
23	2,16857	COMB10	Combination	144,403	8,13	0	1,341E-16	0	12,6146
23	2,16857	COMB10	Combination	144,403	6,159	0	1,341E-16	0	12,6146
23	2,26714	COMB10	Combination	144,403	8,481	0	1,341E-16	0	11,8931
23	2,26714	COMB10	Combination	144,403	6,523	0	1,341E-16	0	11,8931
23	2,36571	COMB10	Combination	144,403	8,846	0	1,341E-16	0	11,1356
23	2,36571	COMB10	Combination	144,403	6,902	0	1,341E-16	0	11,1356

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

Codice documento
SS0558_F0.doc

Rev
F0

Data
20/06/2011

23	2,46429	COMB10	Combination	144,403	9,224	0	1,341E-16	0	10,3408
23	2,46429	COMB10	Combination	144,403	7,295	0	1,341E-16	0	10,3408
23	2,56286	COMB10	Combination	144,403	9,618	0	1,341E-16	0	9,5073
23	2,56286	COMB10	Combination	144,403	7,703	0	1,341E-16	0	9,5073
23	2,66143	COMB10	Combination	144,403	10,026	0	1,341E-16	0	8,6335
23	2,66143	COMB10	Combination	144,403	8,128	0	1,341E-16	0	8,6335
23	2,76	COMB10	Combination	144,403	10,45	0	1,341E-16	0	7,7179
23	2,76	COMB10	Combination	144,403	8,568	0	1,341E-16	0	7,7179
23	2,85857	COMB10	Combination	144,403	10,89	0	1,341E-16	0	6,7588
23	2,85857	COMB10	Combination	144,403	9,025	0	1,341E-16	0	6,7588
23	2,95714	COMB10	Combination	144,403	11,347	0	1,341E-16	0	5,7548
23	2,95714	COMB10	Combination	144,403	9,498	0	1,341E-16	0	5,7548
23	3,05571	COMB10	Combination	144,403	11,821	0	1,341E-16	0	4,7041
23	3,05571	COMB10	Combination	144,403	9,989	0	1,341E-16	0	4,7041
23	3,15429	COMB10	Combination	144,403	12,312	0	1,341E-16	0	3,605
23	3,15429	COMB10	Combination	144,403	10,497	0	1,341E-16	0	3,605
23	3,25286	COMB10	Combination	144,403	12,82	0	1,341E-16	0	2,4558
23	3,25286	COMB10	Combination	144,403	11,023	0	1,341E-16	0	2,4558
23	3,35143	COMB10	Combination	144,403	13,346	0	1,341E-16	0	1,2547
23	3,35143	COMB10	Combination	144,403	11,567	0	1,341E-16	0	1,2547
23	3,45	COMB10	Combination	144,403	13,89	0	1,341E-16	0	6,872E-14
23	0	COMB11	Combination	235,796	-0,23	0	8,499E-17	0	21,3279
23	0,09857	COMB11	Combination	235,796	2,093	0	8,499E-17	0	21,236
23	0,09857	COMB11	Combination	235,796	0,021	0	8,499E-17	0	21,236
23	0,19714	COMB11	Combination	235,796	2,344	0	8,499E-17	0	21,1194
23	0,19714	COMB11	Combination	235,796	0,27	0	8,499E-17	0	21,1194
23	0,29571	COMB11	Combination	235,796	2,593	0	8,499E-17	0	20,9783
23	0,29571	COMB11	Combination	235,796	0,518	0	8,499E-17	0	20,9783
23	0,39429	COMB11	Combination	235,796	2,841	0	8,499E-17	0	20,8128
23	0,39429	COMB11	Combination	235,796	0,765	0	8,499E-17	0	20,8128
23	0,49286	COMB11	Combination	235,796	3,088	0	8,499E-17	0	20,6229
23	0,49286	COMB11	Combination	235,796	1,014	0	8,499E-17	0	20,6229
23	0,59143	COMB11	Combination	235,796	3,336	0	8,499E-17	0	20,4085
23	0,59143	COMB11	Combination	235,796	1,264	0	8,499E-17	0	20,4085
23	0,69	COMB11	Combination	235,796	3,586	0	8,499E-17	0	20,1694
23	0,69	COMB11	Combination	235,796	1,517	0	8,499E-17	0	20,1694
23	0,78857	COMB11	Combination	235,796	3,839	0	8,499E-17	0	19,9054
23	0,78857	COMB11	Combination	235,796	1,773	0	8,499E-17	0	19,9054
23	0,88714	COMB11	Combination	235,796	4,096	0	8,499E-17	0	19,6162
23	0,88714	COMB11	Combination	235,796	2,034	0	8,499E-17	0	19,6162
23	0,98571	COMB11	Combination	235,796	4,357	0	8,499E-17	0	19,3012
23	0,98571	COMB11	Combination	235,796	2,301	0	8,499E-17	0	19,3012
23	1,08429	COMB11	Combination	235,796	4,624	0	8,499E-17	0	18,9599
23	1,08429	COMB11	Combination	235,796	2,575	0	8,499E-17	0	18,9599
23	1,18286	COMB11	Combination	235,796	4,897	0	8,499E-17	0	18,5916
23	1,18286	COMB11	Combination	235,796	2,855	0	8,499E-17	0	18,5916
23	1,28143	COMB11	Combination	235,796	5,178	0	8,499E-17	0	18,1957
23	1,28143	COMB11	Combination	235,796	3,144	0	8,499E-17	0	18,1957
23	1,38	COMB11	Combination	235,796	5,467	0	8,499E-17	0	17,7713

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011

23	1,38	COMB11	Combination	235,796	3,443	0	8,499E-17	0	17,7713
23	1,47857	COMB11	Combination	235,796	5,765	0	8,499E-17	0	17,3174
23	1,47857	COMB11	Combination	235,796	3,751	0	8,499E-17	0	17,3174
23	1,57714	COMB11	Combination	235,796	6,074	0	8,499E-17	0	16,8332
23	1,57714	COMB11	Combination	235,796	4,07	0	8,499E-17	0	16,8332
23	1,67571	COMB11	Combination	235,796	6,393	0	8,499E-17	0	16,3175
23	1,67571	COMB11	Combination	235,796	4,401	0	8,499E-17	0	16,3175
23	1,77429	COMB11	Combination	235,796	6,724	0	8,499E-17	0	15,7692
23	1,77429	COMB11	Combination	235,796	4,745	0	8,499E-17	0	15,7692
23	1,87286	COMB11	Combination	235,796	7,068	0	8,499E-17	0	15,187
23	1,87286	COMB11	Combination	235,796	5,102	0	8,499E-17	0	15,187
23	1,97143	COMB11	Combination	235,796	7,424	0	8,499E-17	0	14,5696
23	1,97143	COMB11	Combination	235,796	5,473	0	8,499E-17	0	14,5696
23	2,07	COMB11	Combination	235,796	7,795	0	8,499E-17	0	13,9157
23	2,07	COMB11	Combination	235,796	5,858	0	8,499E-17	0	13,9157
23	2,16857	COMB11	Combination	235,796	8,181	0	8,499E-17	0	13,2238
23	2,16857	COMB11	Combination	235,796	6,259	0	8,499E-17	0	13,2238
23	2,26714	COMB11	Combination	235,796	8,582	0	8,499E-17	0	12,4923
23	2,26714	COMB11	Combination	235,796	6,676	0	8,499E-17	0	12,4923
23	2,36571	COMB11	Combination	235,796	8,999	0	8,499E-17	0	11,7198
23	2,36571	COMB11	Combination	235,796	7,11	0	8,499E-17	0	11,7198
23	2,46429	COMB11	Combination	235,796	9,433	0	8,499E-17	0	10,9045
23	2,46429	COMB11	Combination	235,796	7,561	0	8,499E-17	0	10,9045
23	2,56286	COMB11	Combination	235,796	9,884	0	8,499E-17	0	10,0447
23	2,56286	COMB11	Combination	235,796	8,03	0	8,499E-17	0	10,0447
23	2,66143	COMB11	Combination	235,796	10,353	0	8,499E-17	0	9,1386
23	2,66143	COMB11	Combination	235,796	8,518	0	8,499E-17	0	9,1386
23	2,76	COMB11	Combination	235,796	10,84	0	8,499E-17	0	8,1846
23	2,76	COMB11	Combination	235,796	9,024	0	8,499E-17	0	8,1846
23	2,85857	COMB11	Combination	235,796	11,346	0	8,499E-17	0	7,1806
23	2,85857	COMB11	Combination	235,796	9,549	0	8,499E-17	0	7,1806
23	2,95714	COMB11	Combination	235,796	11,872	0	8,499E-17	0	6,1249
23	2,95714	COMB11	Combination	235,796	10,095	0	8,499E-17	0	6,1249
23	3,05571	COMB11	Combination	235,796	12,417	0	8,499E-17	0	5,0154
23	3,05571	COMB11	Combination	235,796	10,66	0	8,499E-17	0	5,0154
23	3,15429	COMB11	Combination	235,796	12,982	0	8,499E-17	0	3,8501
23	3,15429	COMB11	Combination	235,796	11,245	0	8,499E-17	0	3,8501
23	3,25286	COMB11	Combination	235,796	13,568	0	8,499E-17	0	2,6272
23	3,25286	COMB11	Combination	235,796	11,852	0	8,499E-17	0	2,6272
23	3,35143	COMB11	Combination	235,796	14,174	0	8,499E-17	0	1,3445
23	3,35143	COMB11	Combination	235,796	12,478	0	8,499E-17	0	1,3445
23	3,45	COMB11	Combination	235,796	14,801	0	8,499E-17	0	6,425E-14

MIN P	277,677
MAX P	-119,508
MAX V2 positivo	21,624
MAX V2 negativo	-0,382

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011

MAX M3 positivo	30,7735
MAX M3 negativo	0

TABLE: Element Forces - Frames

Frame	Station	OutputCase	CaseType	P	V2	V3	T	M2	M3
Text	m	Text	Text	KN	KN	KN	KN-m	KN-m	KN-m
23	0	COMB12	Combination	-8,302	-0,475	0	0	0	27,1186
23	0,09857	COMB12	Combination	-8,302	1,848	0	0	0	27,0509
23	0,09857	COMB12	Combination	-8,302	-0,153	0	0	0	27,0509
23	0,19714	COMB12	Combination	-8,302	2,169	0	0	0	26,9516
23	0,19714	COMB12	Combination	-8,302	0,168	0	0	0	26,9516
23	0,29571	COMB12	Combination	-8,302	2,49	0	0	0	26,8206
23	0,29571	COMB12	Combination	-8,302	0,49	0	0	0	26,8206
23	0,39429	COMB12	Combination	-8,302	2,812	0	0	0	26,6578
23	0,39429	COMB12	Combination	-8,302	0,814	0	0	0	26,6578
23	0,49286	COMB12	Combination	-8,302	3,136	0	0	0	26,4632
23	0,49286	COMB12	Combination	-8,302	1,141	0	0	0	26,4632
23	0,59143	COMB12	Combination	-8,302	3,464	0	0	0	26,2362
23	0,59143	COMB12	Combination	-8,302	1,473	0	0	0	26,2362
23	0,69	COMB12	Combination	-8,302	3,795	0	0	0	25,9766
23	0,69	COMB12	Combination	-8,302	1,811	0	0	0	25,9766
23	0,78857	COMB12	Combination	-8,302	4,133	0	0	0	25,6836
23	0,78857	COMB12	Combination	-8,302	2,155	0	0	0	25,6836
23	0,88714	COMB12	Combination	-8,302	4,478	0	0	0	25,3567
23	0,88714	COMB12	Combination	-8,302	2,509	0	0	0	25,3567
23	0,98571	COMB12	Combination	-8,302	4,831	0	0	0	24,9949
23	0,98571	COMB12	Combination	-8,302	2,871	0	0	0	24,9949
23	1,08429	COMB12	Combination	-8,302	5,194	0	0	0	24,5974
23	1,08429	COMB12	Combination	-8,302	3,245	0	0	0	24,5974
23	1,18286	COMB12	Combination	-8,302	5,567	0	0	0	24,1631
23	1,18286	COMB12	Combination	-8,302	3,63	0	0	0	24,1631
23	1,28143	COMB12	Combination	-8,302	5,953	0	0	0	23,6908
23	1,28143	COMB12	Combination	-8,302	4,029	0	0	0	23,6908
23	1,38	COMB12	Combination	-8,302	6,351	0	0	0	23,1792
23	1,38	COMB12	Combination	-8,302	4,441	0	0	0	23,1792
23	1,47857	COMB12	Combination	-8,302	6,764	0	0	0	22,627
23	1,47857	COMB12	Combination	-8,302	4,869	0	0	0	22,627
23	1,57714	COMB12	Combination	-8,302	7,192	0	0	0	22,0325
23	1,57714	COMB12	Combination	-8,302	5,314	0	0	0	22,0325
23	1,67571	COMB12	Combination	-8,302	7,637	0	0	0	21,3942
23	1,67571	COMB12	Combination	-8,302	5,776	0	0	0	21,3942
23	1,77429	COMB12	Combination	-8,302	8,099	0	0	0	20,7104
23	1,77429	COMB12	Combination	-8,302	6,257	0	0	0	20,7104
23	1,87286	COMB12	Combination	-8,302	8,579	0	0	0	19,9792
23	1,87286	COMB12	Combination	-8,302	6,757	0	0	0	19,9792

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011

23	1,97143	COMB12	Combination	-8,302	9,079	0	0	0	19,1987
23	1,97143	COMB12	Combination	-8,302	7,277	0	0	0	19,1987
23	2,07	COMB12	Combination	-8,302	9,6	0	0	0	18,3669
23	2,07	COMB12	Combination	-8,302	7,82	0	0	0	18,3669
23	2,16857	COMB12	Combination	-8,302	10,142	0	0	0	17,4816
23	2,16857	COMB12	Combination	-8,302	8,384	0	0	0	17,4816
23	2,26714	COMB12	Combination	-8,302	10,707	0	0	0	16,5407
23	2,26714	COMB12	Combination	-8,302	8,972	0	0	0	16,5407
23	2,36571	COMB12	Combination	-8,302	11,295	0	0	0	15,5418
23	2,36571	COMB12	Combination	-8,302	9,584	0	0	0	15,5418
23	2,46429	COMB12	Combination	-8,302	11,907	0	0	0	14,4826
23	2,46429	COMB12	Combination	-8,302	10,221	0	0	0	14,4826
23	2,56286	COMB12	Combination	-8,302	12,544	0	0	0	13,3606
23	2,56286	COMB12	Combination	-8,302	10,884	0	0	0	13,3606
23	2,66143	COMB12	Combination	-8,302	13,206	0	0	0	12,1733
23	2,66143	COMB12	Combination	-8,302	11,573	0	0	0	12,1733
23	2,76	COMB12	Combination	-8,302	13,895	0	0	0	10,9181
23	2,76	COMB12	Combination	-8,302	12,289	0	0	0	10,9181
23	2,85857	COMB12	Combination	-8,302	14,611	0	0	0	9,5923
23	2,85857	COMB12	Combination	-8,302	13,032	0	0	0	9,5923
23	2,95714	COMB12	Combination	-8,302	15,355	0	0	0	8,1932
23	2,95714	COMB12	Combination	-8,302	13,804	0	0	0	8,1932
23	3,05571	COMB12	Combination	-8,302	16,127	0	0	0	6,718
23	3,05571	COMB12	Combination	-8,302	14,604	0	0	0	6,718
23	3,15429	COMB12	Combination	-8,302	16,927	0	0	0	5,164
23	3,15429	COMB12	Combination	-8,302	15,433	0	0	0	5,164
23	3,25286	COMB12	Combination	-8,302	17,756	0	0	0	3,5283
23	3,25286	COMB12	Combination	-8,302	16,292	0	0	0	3,5283
23	3,35143	COMB12	Combination	-8,302	18,614	0	0	0	1,8079
23	3,35143	COMB12	Combination	-8,302	17,18	0	0	0	1,8079
23	3,45	COMB12	Combination	-8,302	19,502	0	0	0	7,627E-14
23	0	COMB13	Combination	-112,607	-0,974	0	0	0	31,4122
23	0,09857	COMB13	Combination	-112,607	1,349	0	0	0	31,3938
23	0,09857	COMB13	Combination	-112,607	-0,599	0	0	0	31,3938
23	0,19714	COMB13	Combination	-112,607	1,724	0	0	0	31,3383
23	0,19714	COMB13	Combination	-112,607	-0,221	0	0	0	31,3383
23	0,29571	COMB13	Combination	-112,607	2,102	0	0	0	31,2456
23	0,29571	COMB13	Combination	-112,607	0,16	0	0	0	31,2456
23	0,39429	COMB13	Combination	-112,607	2,483	0	0	0	31,1154
23	0,39429	COMB13	Combination	-112,607	0,547	0	0	0	31,1154
23	0,49286	COMB13	Combination	-112,607	2,869	0	0	0	30,947
23	0,49286	COMB13	Combination	-112,607	0,94	0	0	0	30,947
23	0,59143	COMB13	Combination	-112,607	3,263	0	0	0	30,7399
23	0,59143	COMB13	Combination	-112,607	1,341	0	0	0	30,7399
23	0,69	COMB13	Combination	-112,607	3,664	0	0	0	30,4932
23	0,69	COMB13	Combination	-112,607	1,753	0	0	0	30,4932
23	0,78857	COMB13	Combination	-112,607	4,075	0	0	0	30,2059
23	0,78857	COMB13	Combination	-112,607	2,175	0	0	0	30,2059
23	0,88714	COMB13	Combination	-112,607	4,497	0	0	0	29,8771

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011

23	0,88714	COMB13	Combination	-112,607	2,61	0	0	0	29,8771
23	0,98571	COMB13	Combination	-112,607	4,932	0	0	0	29,5054
23	0,98571	COMB13	Combination	-112,607	3,058	0	0	0	29,5054
23	1,08429	COMB13	Combination	-112,607	5,381	0	0	0	29,0894
23	1,08429	COMB13	Combination	-112,607	3,523	0	0	0	29,0894
23	1,18286	COMB13	Combination	-112,607	5,845	0	0	0	28,6277
23	1,18286	COMB13	Combination	-112,607	4,004	0	0	0	28,6277
23	1,28143	COMB13	Combination	-112,607	6,326	0	0	0	28,1186
23	1,28143	COMB13	Combination	-112,607	4,503	0	0	0	28,1186
23	1,38	COMB13	Combination	-112,607	6,826	0	0	0	27,5603
23	1,38	COMB13	Combination	-112,607	5,022	0	0	0	27,5603
23	1,47857	COMB13	Combination	-112,607	7,344	0	0	0	26,9508
23	1,47857	COMB13	Combination	-112,607	5,561	0	0	0	26,9508
23	1,57714	COMB13	Combination	-112,607	7,884	0	0	0	26,2881
23	1,57714	COMB13	Combination	-112,607	6,123	0	0	0	26,2881
23	1,67571	COMB13	Combination	-112,607	8,446	0	0	0	25,5701
23	1,67571	COMB13	Combination	-112,607	6,709	0	0	0	25,5701
23	1,77429	COMB13	Combination	-112,607	9,031	0	0	0	24,7943
23	1,77429	COMB13	Combination	-112,607	7,319	0	0	0	24,7943
23	1,87286	COMB13	Combination	-112,607	9,641	0	0	0	23,9584
23	1,87286	COMB13	Combination	-112,607	7,955	0	0	0	23,9584
23	1,97143	COMB13	Combination	-112,607	10,277	0	0	0	23,0599
23	1,97143	COMB13	Combination	-112,607	8,618	0	0	0	23,0599
23	2,07	COMB13	Combination	-112,607	10,941	0	0	0	22,0959
23	2,07	COMB13	Combination	-112,607	9,309	0	0	0	22,0959
23	2,16857	COMB13	Combination	-112,607	11,632	0	0	0	21,0638
23	2,16857	COMB13	Combination	-112,607	10,03	0	0	0	21,0638
23	2,26714	COMB13	Combination	-112,607	12,353	0	0	0	19,9606
23	2,26714	COMB13	Combination	-112,607	10,782	0	0	0	19,9606
23	2,36571	COMB13	Combination	-112,607	13,104	0	0	0	18,7834
23	2,36571	COMB13	Combination	-112,607	11,564	0	0	0	18,7834
23	2,46429	COMB13	Combination	-112,607	13,887	0	0	0	17,529
23	2,46429	COMB13	Combination	-112,607	12,379	0	0	0	17,529
23	2,56286	COMB13	Combination	-112,607	14,702	0	0	0	16,1943
23	2,56286	COMB13	Combination	-112,607	13,228	0	0	0	16,1943
23	2,66143	COMB13	Combination	-112,607	15,55	0	0	0	14,7759
23	2,66143	COMB13	Combination	-112,607	14,11	0	0	0	14,7759
23	2,76	COMB13	Combination	-112,607	16,433	0	0	0	13,2706
23	2,76	COMB13	Combination	-112,607	15,028	0	0	0	13,2706
23	2,85857	COMB13	Combination	-112,607	17,35	0	0	0	11,6748
23	2,85857	COMB13	Combination	-112,607	15,981	0	0	0	11,6748
23	2,95714	COMB13	Combination	-112,607	18,304	0	0	0	9,985
23	2,95714	COMB13	Combination	-112,607	16,97	0	0	0	9,985
23	3,05571	COMB13	Combination	-112,607	19,293	0	0	0	8,1978
23	3,05571	COMB13	Combination	-112,607	17,997	0	0	0	8,1978
23	3,15429	COMB13	Combination	-112,607	20,319	0	0	0	6,3093
23	3,15429	COMB13	Combination	-112,607	19,06	0	0	0	6,3093
23	3,25286	COMB13	Combination	-112,607	21,383	0	0	0	4,316
23	3,25286	COMB13	Combination	-112,607	20,162	0	0	0	4,316

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD	<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011	

23	3,35143	COMB13	Combination	-112,607	22,485	0	0	0	2,2142
23	3,35143	COMB13	Combination	-112,607	21,301	0	0	0	2,2142
23	3,45	COMB13	Combination	-112,607	23,624	0	0	0	1,01E-13
23	0	COMB14	Combination	120,046	-0,244	0	0	0	27,1186
23	0,09857	COMB14	Combination	120,046	2,078	0	0	0	27,0282
23	0,09857	COMB14	Combination	120,046	0,076	0	0	0	27,0282
23	0,19714	COMB14	Combination	120,046	2,399	0	0	0	26,9062
23	0,19714	COMB14	Combination	120,046	0,395	0	0	0	26,9062
23	0,29571	COMB14	Combination	120,046	2,718	0	0	0	26,7528
23	0,29571	COMB14	Combination	120,046	0,714	0	0	0	26,7528
23	0,39429	COMB14	Combination	120,046	3,037	0	0	0	26,5679
23	0,39429	COMB14	Combination	120,046	1,034	0	0	0	26,5679
23	0,49286	COMB14	Combination	120,046	3,356	0	0	0	26,3515
23	0,49286	COMB14	Combination	120,046	1,356	0	0	0	26,3515
23	0,59143	COMB14	Combination	120,046	3,678	0	0	0	26,1035
23	0,59143	COMB14	Combination	120,046	1,681	0	0	0	26,1035
23	0,69	COMB14	Combination	120,046	4,004	0	0	0	25,8233
23	0,69	COMB14	Combination	120,046	2,011	0	0	0	25,8233
23	0,78857	COMB14	Combination	120,046	4,334	0	0	0	25,5106
23	0,78857	COMB14	Combination	120,046	2,347	0	0	0	25,5106
23	0,88714	COMB14	Combination	120,046	4,67	0	0	0	25,1647
23	0,88714	COMB14	Combination	120,046	2,691	0	0	0	25,1647
23	0,98571	COMB14	Combination	120,046	5,014	0	0	0	24,785
23	0,98571	COMB14	Combination	120,046	3,043	0	0	0	24,785
23	1,08429	COMB14	Combination	120,046	5,365	0	0	0	24,3706
23	1,08429	COMB14	Combination	120,046	3,404	0	0	0	24,3706
23	1,18286	COMB14	Combination	120,046	5,727	0	0	0	23,9205
23	1,18286	COMB14	Combination	120,046	3,776	0	0	0	23,9205
23	1,28143	COMB14	Combination	120,046	6,099	0	0	0	23,4338
23	1,28143	COMB14	Combination	120,046	4,161	0	0	0	23,4338
23	1,38	COMB14	Combination	120,046	6,483	0	0	0	22,9092
23	1,38	COMB14	Combination	120,046	4,558	0	0	0	22,9092
23	1,47857	COMB14	Combination	120,046	6,881	0	0	0	22,3455
23	1,47857	COMB14	Combination	120,046	4,969	0	0	0	22,3455
23	1,57714	COMB14	Combination	120,046	7,292	0	0	0	21,7411
23	1,57714	COMB14	Combination	120,046	5,396	0	0	0	21,7411
23	1,67571	COMB14	Combination	120,046	7,719	0	0	0	21,0948
23	1,67571	COMB14	Combination	120,046	5,839	0	0	0	21,0948
23	1,77429	COMB14	Combination	120,046	8,162	0	0	0	20,4048
23	1,77429	COMB14	Combination	120,046	6,299	0	0	0	20,4048
23	1,87286	COMB14	Combination	120,046	8,622	0	0	0	19,6694
23	1,87286	COMB14	Combination	120,046	6,778	0	0	0	19,6694
23	1,97143	COMB14	Combination	120,046	9,101	0	0	0	18,8868
23	1,97143	COMB14	Combination	120,046	7,276	0	0	0	18,8868
23	2,07	COMB14	Combination	120,046	9,598	0	0	0	18,0551
23	2,07	COMB14	Combination	120,046	7,794	0	0	0	18,0551
23	2,16857	COMB14	Combination	120,046	10,117	0	0	0	17,1724
23	2,16857	COMB14	Combination	120,046	8,333	0	0	0	17,1724
23	2,26714	COMB14	Combination	120,046	10,656	0	0	0	16,2365

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011

23	2,26714	COMB14	Combination	120,046	8,894	0	0	0	16,2365
23	2,36571	COMB14	Combination	120,046	11,217	0	0	0	15,2453
23	2,36571	COMB14	Combination	120,046	9,479	0	0	0	15,2453
23	2,46429	COMB14	Combination	120,046	11,801	0	0	0	14,1965
23	2,46429	COMB14	Combination	120,046	10,086	0	0	0	14,1965
23	2,56286	COMB14	Combination	120,046	12,409	0	0	0	13,0878
23	2,56286	COMB14	Combination	120,046	10,718	0	0	0	13,0878
23	2,66143	COMB14	Combination	120,046	13,041	0	0	0	11,9168
23	2,66143	COMB14	Combination	120,046	11,375	0	0	0	11,9168
23	2,76	COMB14	Combination	120,046	13,697	0	0	0	10,6811
23	2,76	COMB14	Combination	120,046	12,057	0	0	0	10,6811
23	2,85857	COMB14	Combination	120,046	14,38	0	0	0	9,3782
23	2,85857	COMB14	Combination	120,046	12,766	0	0	0	9,3782
23	2,95714	COMB14	Combination	120,046	15,089	0	0	0	8,0053
23	2,95714	COMB14	Combination	120,046	13,501	0	0	0	8,0053
23	3,05571	COMB14	Combination	120,046	15,824	0	0	0	6,56
23	3,05571	COMB14	Combination	120,046	14,264	0	0	0	6,56
23	3,15429	COMB14	Combination	120,046	16,586	0	0	0	5,0396
23	3,15429	COMB14	Combination	120,046	15,054	0	0	0	5,0396
23	3,25286	COMB14	Combination	120,046	17,376	0	0	0	3,4413
23	3,25286	COMB14	Combination	120,046	15,871	0	0	0	3,4413
23	3,35143	COMB14	Combination	120,046	18,194	0	0	0	1,7623
23	3,35143	COMB14	Combination	120,046	16,717	0	0	0	1,7623
23	3,45	COMB14	Combination	120,046	19,04	0	0	0	7,369E-14
23	0	COMB15	Combination	15,741	-0,743	0	0	0	31,4122
23	0,09857	COMB15	Combination	15,741	1,579	0	0	0	31,371
23	0,09857	COMB15	Combination	15,741	-0,369	0	0	0	31,371
23	0,19714	COMB15	Combination	15,741	1,954	0	0	0	31,2929
23	0,19714	COMB15	Combination	15,741	0,006403	0	0	0	31,2929
23	0,29571	COMB15	Combination	15,741	2,329	0	0	0	31,1778
23	0,29571	COMB15	Combination	15,741	0,385	0	0	0	31,1778
23	0,39429	COMB15	Combination	15,741	2,707	0	0	0	31,0254
23	0,39429	COMB15	Combination	15,741	0,767	0	0	0	31,0254
23	0,49286	COMB15	Combination	15,741	3,089	0	0	0	30,8354
23	0,49286	COMB15	Combination	15,741	1,155	0	0	0	30,8354
23	0,59143	COMB15	Combination	15,741	3,477	0	0	0	30,6071
23	0,59143	COMB15	Combination	15,741	1,55	0	0	0	30,6071
23	0,69	COMB15	Combination	15,741	3,872	0	0	0	30,3399
23	0,69	COMB15	Combination	15,741	1,953	0	0	0	30,3399
23	0,78857	COMB15	Combination	15,741	4,276	0	0	0	30,0329
23	0,78857	COMB15	Combination	15,741	2,367	0	0	0	30,0329
23	0,88714	COMB15	Combination	15,741	4,689	0	0	0	29,6851
23	0,88714	COMB15	Combination	15,741	2,792	0	0	0	29,6851
23	0,98571	COMB15	Combination	15,741	5,115	0	0	0	29,2954
23	0,98571	COMB15	Combination	15,741	3,23	0	0	0	29,2954
23	1,08429	COMB15	Combination	15,741	5,552	0	0	0	28,8626
23	1,08429	COMB15	Combination	15,741	3,682	0	0	0	28,8626
23	1,18286	COMB15	Combination	15,741	6,005	0	0	0	28,3852
23	1,18286	COMB15	Combination	15,741	4,15	0	0	0	28,3852

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO				
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD				<i>Codice documento</i>	<i>Rev</i>	<i>Data</i>
				<i>SS0558_F0.doc</i>	<i>F0</i>	<i>20/06/2011</i>

23	1,28143	COMB15	Combination	15,741	6,473	0	0	0	27,8616
23	1,28143	COMB15	Combination	15,741	4,635	0	0	0	27,8616
23	1,38	COMB15	Combination	15,741	6,958	0	0	0	27,2903
23	1,38	COMB15	Combination	15,741	5,138	0	0	0	27,2903
23	1,47857	COMB15	Combination	15,741	7,461	0	0	0	26,6693
23	1,47857	COMB15	Combination	15,741	5,661	0	0	0	26,6693
23	1,57714	COMB15	Combination	15,741	7,984	0	0	0	25,9968
23	1,57714	COMB15	Combination	15,741	6,205	0	0	0	25,9968
23	1,67571	COMB15	Combination	15,741	8,528	0	0	0	25,2707
23	1,67571	COMB15	Combination	15,741	6,772	0	0	0	25,2707
23	1,77429	COMB15	Combination	15,741	9,094	0	0	0	24,4887
23	1,77429	COMB15	Combination	15,741	7,361	0	0	0	24,4887
23	1,87286	COMB15	Combination	15,741	9,684	0	0	0	23,6486
23	1,87286	COMB15	Combination	15,741	7,976	0	0	0	23,6486
23	1,97143	COMB15	Combination	15,741	10,299	0	0	0	22,7479
23	1,97143	COMB15	Combination	15,741	8,616	0	0	0	22,7479
23	2,07	COMB15	Combination	15,741	10,939	0	0	0	21,7841
23	2,07	COMB15	Combination	15,741	9,284	0	0	0	21,7841
23	2,16857	COMB15	Combination	15,741	11,606	0	0	0	20,7545
23	2,16857	COMB15	Combination	15,741	9,979	0	0	0	20,7545
23	2,26714	COMB15	Combination	15,741	12,302	0	0	0	19,6564
23	2,26714	COMB15	Combination	15,741	10,704	0	0	0	19,6564
23	2,36571	COMB15	Combination	15,741	13,026	0	0	0	18,4868
23	2,36571	COMB15	Combination	15,741	11,458	0	0	0	18,4868
23	2,46429	COMB15	Combination	15,741	13,781	0	0	0	17,2429
23	2,46429	COMB15	Combination	15,741	12,244	0	0	0	17,2429
23	2,56286	COMB15	Combination	15,741	14,567	0	0	0	15,9215
23	2,56286	COMB15	Combination	15,741	13,062	0	0	0	15,9215
23	2,66143	COMB15	Combination	15,741	15,385	0	0	0	14,5195
23	2,66143	COMB15	Combination	15,741	13,912	0	0	0	14,5195
23	2,76	COMB15	Combination	15,741	16,235	0	0	0	13,0336
23	2,76	COMB15	Combination	15,741	14,796	0	0	0	13,0336
23	2,85857	COMB15	Combination	15,741	17,119	0	0	0	11,4607
23	2,85857	COMB15	Combination	15,741	15,715	0	0	0	11,4607
23	2,95714	COMB15	Combination	15,741	18,037	0	0	0	9,7972
23	2,95714	COMB15	Combination	15,741	16,668	0	0	0	9,7972
23	3,05571	COMB15	Combination	15,741	18,99	0	0	0	8,0398
23	3,05571	COMB15	Combination	15,741	17,656	0	0	0	8,0398
23	3,15429	COMB15	Combination	15,741	19,979	0	0	0	6,1849
23	3,15429	COMB15	Combination	15,741	18,681	0	0	0	6,1849
23	3,25286	COMB15	Combination	15,741	21,003	0	0	0	4,229
23	3,25286	COMB15	Combination	15,741	19,742	0	0	0	4,229
23	3,35143	COMB15	Combination	15,741	22,064	0	0	0	2,1686
23	3,35143	COMB15	Combination	15,741	20,839	0	0	0	2,1686
23	3,45	COMB15	Combination	15,741	23,162	0	0	0	9,842E-14
23	0	COMB16	Combination	-98,348	-0,475	0	0	0	27,1186
23	0,09857	COMB16	Combination	-98,348	1,848	0	0	0	27,0509
23	0,09857	COMB16	Combination	-98,348	-0,153	0	0	0	27,0509
23	0,19714	COMB16	Combination	-98,348	2,169	0	0	0	26,9516

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO				
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD				<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011

23	0,19714	COMB16	Combination	-98,348	0,168	0	0	0	26,9516
23	0,29571	COMB16	Combination	-98,348	2,49	0	0	0	26,8206
23	0,29571	COMB16	Combination	-98,348	0,49	0	0	0	26,8206
23	0,39429	COMB16	Combination	-98,348	2,812	0	0	0	26,6578
23	0,39429	COMB16	Combination	-98,348	0,814	0	0	0	26,6578
23	0,49286	COMB16	Combination	-98,348	3,136	0	0	0	26,4632
23	0,49286	COMB16	Combination	-98,348	1,141	0	0	0	26,4632
23	0,59143	COMB16	Combination	-98,348	3,464	0	0	0	26,2362
23	0,59143	COMB16	Combination	-98,348	1,473	0	0	0	26,2362
23	0,69	COMB16	Combination	-98,348	3,795	0	0	0	25,9766
23	0,69	COMB16	Combination	-98,348	1,811	0	0	0	25,9766
23	0,78857	COMB16	Combination	-98,348	4,133	0	0	0	25,6836
23	0,78857	COMB16	Combination	-98,348	2,155	0	0	0	25,6836
23	0,88714	COMB16	Combination	-98,348	4,478	0	0	0	25,3567
23	0,88714	COMB16	Combination	-98,348	2,509	0	0	0	25,3567
23	0,98571	COMB16	Combination	-98,348	4,831	0	0	0	24,9949
23	0,98571	COMB16	Combination	-98,348	2,871	0	0	0	24,9949
23	1,08429	COMB16	Combination	-98,348	5,194	0	0	0	24,5974
23	1,08429	COMB16	Combination	-98,348	3,245	0	0	0	24,5974
23	1,18286	COMB16	Combination	-98,348	5,567	0	0	0	24,1631
23	1,18286	COMB16	Combination	-98,348	3,63	0	0	0	24,1631
23	1,28143	COMB16	Combination	-98,348	5,953	0	0	0	23,6908
23	1,28143	COMB16	Combination	-98,348	4,029	0	0	0	23,6908
23	1,38	COMB16	Combination	-98,348	6,351	0	0	0	23,1792
23	1,38	COMB16	Combination	-98,348	4,441	0	0	0	23,1792
23	1,47857	COMB16	Combination	-98,348	6,764	0	0	0	22,627
23	1,47857	COMB16	Combination	-98,348	4,869	0	0	0	22,627
23	1,57714	COMB16	Combination	-98,348	7,192	0	0	0	22,0325
23	1,57714	COMB16	Combination	-98,348	5,314	0	0	0	22,0325
23	1,67571	COMB16	Combination	-98,348	7,637	0	0	0	21,3942
23	1,67571	COMB16	Combination	-98,348	5,776	0	0	0	21,3942
23	1,77429	COMB16	Combination	-98,348	8,099	0	0	0	20,7104
23	1,77429	COMB16	Combination	-98,348	6,257	0	0	0	20,7104
23	1,87286	COMB16	Combination	-98,348	8,579	0	0	0	19,9792
23	1,87286	COMB16	Combination	-98,348	6,757	0	0	0	19,9792
23	1,97143	COMB16	Combination	-98,348	9,079	0	0	0	19,1987
23	1,97143	COMB16	Combination	-98,348	7,277	0	0	0	19,1987
23	2,07	COMB16	Combination	-98,348	9,6	0	0	0	18,3669
23	2,07	COMB16	Combination	-98,348	7,82	0	0	0	18,3669
23	2,16857	COMB16	Combination	-98,348	10,142	0	0	0	17,4816
23	2,16857	COMB16	Combination	-98,348	8,384	0	0	0	17,4816
23	2,26714	COMB16	Combination	-98,348	10,707	0	0	0	16,5407
23	2,26714	COMB16	Combination	-98,348	8,972	0	0	0	16,5407
23	2,36571	COMB16	Combination	-98,348	11,295	0	0	0	15,5418
23	2,36571	COMB16	Combination	-98,348	9,584	0	0	0	15,5418
23	2,46429	COMB16	Combination	-98,348	11,907	0	0	0	14,4826
23	2,46429	COMB16	Combination	-98,348	10,221	0	0	0	14,4826
23	2,56286	COMB16	Combination	-98,348	12,544	0	0	0	13,3606
23	2,56286	COMB16	Combination	-98,348	10,884	0	0	0	13,3606

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011

23	2,66143	COMB16	Combination	-98,348	13,206	0	0	0	12,1733
23	2,66143	COMB16	Combination	-98,348	11,573	0	0	0	12,1733
23	2,76	COMB16	Combination	-98,348	13,895	0	0	0	10,9181
23	2,76	COMB16	Combination	-98,348	12,289	0	0	0	10,9181
23	2,85857	COMB16	Combination	-98,348	14,611	0	0	0	9,5923
23	2,85857	COMB16	Combination	-98,348	13,032	0	0	0	9,5923
23	2,95714	COMB16	Combination	-98,348	15,355	0	0	0	8,1932
23	2,95714	COMB16	Combination	-98,348	13,804	0	0	0	8,1932
23	3,05571	COMB16	Combination	-98,348	16,127	0	0	0	6,718
23	3,05571	COMB16	Combination	-98,348	14,604	0	0	0	6,718
23	3,15429	COMB16	Combination	-98,348	16,927	0	0	0	5,164
23	3,15429	COMB16	Combination	-98,348	15,433	0	0	0	5,164
23	3,25286	COMB16	Combination	-98,348	17,756	0	0	0	3,5283
23	3,25286	COMB16	Combination	-98,348	16,292	0	0	0	3,5283
23	3,35143	COMB16	Combination	-98,348	18,614	0	0	0	1,8079
23	3,35143	COMB16	Combination	-98,348	17,18	0	0	0	1,8079
23	3,45	COMB16	Combination	-98,348	19,502	0	0	0	7,927E-14
23	0	COMB17	Combination	-202,653	-0,974	0	0	0	31,4122
23	0,09857	COMB17	Combination	-202,653	1,349	0	0	0	31,3938
23	0,09857	COMB17	Combination	-202,653	-0,599	0	0	0	31,3938
23	0,19714	COMB17	Combination	-202,653	1,724	0	0	0	31,3383
23	0,19714	COMB17	Combination	-202,653	-0,221	0	0	0	31,3383
23	0,29571	COMB17	Combination	-202,653	2,102	0	0	0	31,2456
23	0,29571	COMB17	Combination	-202,653	0,16	0	0	0	31,2456
23	0,39429	COMB17	Combination	-202,653	2,483	0	0	0	31,1154
23	0,39429	COMB17	Combination	-202,653	0,547	0	0	0	31,1154
23	0,49286	COMB17	Combination	-202,653	2,869	0	0	0	30,947
23	0,49286	COMB17	Combination	-202,653	0,94	0	0	0	30,947
23	0,59143	COMB17	Combination	-202,653	3,263	0	0	0	30,7399
23	0,59143	COMB17	Combination	-202,653	1,341	0	0	0	30,7399
23	0,69	COMB17	Combination	-202,653	3,664	0	0	0	30,4932
23	0,69	COMB17	Combination	-202,653	1,753	0	0	0	30,4932
23	0,78857	COMB17	Combination	-202,653	4,075	0	0	0	30,2059
23	0,78857	COMB17	Combination	-202,653	2,175	0	0	0	30,2059
23	0,88714	COMB17	Combination	-202,653	4,497	0	0	0	29,8771
23	0,88714	COMB17	Combination	-202,653	2,61	0	0	0	29,8771
23	0,98571	COMB17	Combination	-202,653	4,932	0	0	0	29,5054
23	0,98571	COMB17	Combination	-202,653	3,058	0	0	0	29,5054
23	1,08429	COMB17	Combination	-202,653	5,381	0	0	0	29,0894
23	1,08429	COMB17	Combination	-202,653	3,523	0	0	0	29,0894
23	1,18286	COMB17	Combination	-202,653	5,845	0	0	0	28,6277
23	1,18286	COMB17	Combination	-202,653	4,004	0	0	0	28,6277
23	1,28143	COMB17	Combination	-202,653	6,326	0	0	0	28,1186
23	1,28143	COMB17	Combination	-202,653	4,503	0	0	0	28,1186
23	1,38	COMB17	Combination	-202,653	6,826	0	0	0	27,5603
23	1,38	COMB17	Combination	-202,653	5,022	0	0	0	27,5603
23	1,47857	COMB17	Combination	-202,653	7,344	0	0	0	26,9508
23	1,47857	COMB17	Combination	-202,653	5,561	0	0	0	26,9508
23	1,57714	COMB17	Combination	-202,653	7,884	0	0	0	26,2881

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD	<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011	

23	1,57714	COMB17	Combination	-202,653	6,123	0	0	0	26,2881
23	1,67571	COMB17	Combination	-202,653	8,446	0	0	0	25,5701
23	1,67571	COMB17	Combination	-202,653	6,709	0	0	0	25,5701
23	1,77429	COMB17	Combination	-202,653	9,031	0	0	0	24,7943
23	1,77429	COMB17	Combination	-202,653	7,319	0	0	0	24,7943
23	1,87286	COMB17	Combination	-202,653	9,641	0	0	0	23,9584
23	1,87286	COMB17	Combination	-202,653	7,955	0	0	0	23,9584
23	1,97143	COMB17	Combination	-202,653	10,277	0	0	0	23,0599
23	1,97143	COMB17	Combination	-202,653	8,618	0	0	0	23,0599
23	2,07	COMB17	Combination	-202,653	10,941	0	0	0	22,0959
23	2,07	COMB17	Combination	-202,653	9,309	0	0	0	22,0959
23	2,16857	COMB17	Combination	-202,653	11,632	0	0	0	21,0638
23	2,16857	COMB17	Combination	-202,653	10,03	0	0	0	21,0638
23	2,26714	COMB17	Combination	-202,653	12,353	0	0	0	19,9606
23	2,26714	COMB17	Combination	-202,653	10,782	0	0	0	19,9606
23	2,36571	COMB17	Combination	-202,653	13,104	0	0	0	18,7834
23	2,36571	COMB17	Combination	-202,653	11,564	0	0	0	18,7834
23	2,46429	COMB17	Combination	-202,653	13,887	0	0	0	17,529
23	2,46429	COMB17	Combination	-202,653	12,379	0	0	0	17,529
23	2,56286	COMB17	Combination	-202,653	14,702	0	0	0	16,1943
23	2,56286	COMB17	Combination	-202,653	13,228	0	0	0	16,1943
23	2,66143	COMB17	Combination	-202,653	15,55	0	0	0	14,7759
23	2,66143	COMB17	Combination	-202,653	14,11	0	0	0	14,7759
23	2,76	COMB17	Combination	-202,653	16,433	0	0	0	13,2706
23	2,76	COMB17	Combination	-202,653	15,028	0	0	0	13,2706
23	2,85857	COMB17	Combination	-202,653	17,35	0	0	0	11,6748
23	2,85857	COMB17	Combination	-202,653	15,981	0	0	0	11,6748
23	2,95714	COMB17	Combination	-202,653	18,304	0	0	0	9,985
23	2,95714	COMB17	Combination	-202,653	16,97	0	0	0	9,985
23	3,05571	COMB17	Combination	-202,653	19,293	0	0	0	8,1978
23	3,05571	COMB17	Combination	-202,653	17,997	0	0	0	8,1978
23	3,15429	COMB17	Combination	-202,653	20,319	0	0	0	6,3093
23	3,15429	COMB17	Combination	-202,653	19,06	0	0	0	6,3093
23	3,25286	COMB17	Combination	-202,653	21,383	0	0	0	4,316
23	3,25286	COMB17	Combination	-202,653	20,162	0	0	0	4,316
23	3,35143	COMB17	Combination	-202,653	22,485	0	0	0	2,2142
23	3,35143	COMB17	Combination	-202,653	21,301	0	0	0	2,2142
23	3,45	COMB17	Combination	-202,653	23,624	0	0	0	1,04E-13
23	0	COMB18	Combination	96,139	-0,125	0	0	0	27,1186
23	0,09857	COMB18	Combination	96,139	2,197	0	0	0	27,0165
23	0,09857	COMB18	Combination	96,139	0,195	0	0	0	27,0165
23	0,19714	COMB18	Combination	96,139	2,517	0	0	0	26,8828
23	0,19714	COMB18	Combination	96,139	0,513	0	0	0	26,8828
23	0,29571	COMB18	Combination	96,139	2,835	0	0	0	26,7178
23	0,29571	COMB18	Combination	96,139	0,83	0	0	0	26,7178
23	0,39429	COMB18	Combination	96,139	3,152	0	0	0	26,5216
23	0,39429	COMB18	Combination	96,139	1,147	0	0	0	26,5216
23	0,49286	COMB18	Combination	96,139	3,47	0	0	0	26,294
23	0,49286	COMB18	Combination	96,139	1,466	0	0	0	26,294

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO				
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD				<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011

23	0,59143	COMB18	Combination	96,139	3,789	0	0	0	26,035
23	0,59143	COMB18	Combination	96,139	1,788	0	0	0	26,035
23	0,69	COMB18	Combination	96,139	4,111	0	0	0	25,7443
23	0,69	COMB18	Combination	96,139	2,115	0	0	0	25,7443
23	0,78857	COMB18	Combination	96,139	4,437	0	0	0	25,4214
23	0,78857	COMB18	Combination	96,139	2,446	0	0	0	25,4214
23	0,88714	COMB18	Combination	96,139	4,769	0	0	0	25,0657
23	0,88714	COMB18	Combination	96,139	2,785	0	0	0	25,0657
23	0,98571	COMB18	Combination	96,139	5,107	0	0	0	24,6768
23	0,98571	COMB18	Combination	96,139	3,131	0	0	0	24,6768
23	1,08429	COMB18	Combination	96,139	5,454	0	0	0	24,2537
23	1,08429	COMB18	Combination	96,139	3,486	0	0	0	24,2537
23	1,18286	COMB18	Combination	96,139	5,809	0	0	0	23,7955
23	1,18286	COMB18	Combination	96,139	3,852	0	0	0	23,7955
23	1,28143	COMB18	Combination	96,139	6,175	0	0	0	23,3014
23	1,28143	COMB18	Combination	96,139	4,229	0	0	0	23,3014
23	1,38	COMB18	Combination	96,139	6,551	0	0	0	22,7701
23	1,38	COMB18	Combination	96,139	4,618	0	0	0	22,7701
23	1,47857	COMB18	Combination	96,139	6,941	0	0	0	22,2004
23	1,47857	COMB18	Combination	96,139	5,021	0	0	0	22,2004
23	1,57714	COMB18	Combination	96,139	7,343	0	0	0	21,591
23	1,57714	COMB18	Combination	96,139	5,438	0	0	0	21,591
23	1,67571	COMB18	Combination	96,139	7,761	0	0	0	20,9405
23	1,67571	COMB18	Combination	96,139	5,871	0	0	0	20,9405
23	1,77429	COMB18	Combination	96,139	8,194	0	0	0	20,2472
23	1,77429	COMB18	Combination	96,139	6,321	0	0	0	20,2472
23	1,87286	COMB18	Combination	96,139	8,644	0	0	0	19,5097
23	1,87286	COMB18	Combination	96,139	6,789	0	0	0	19,5097
23	1,97143	COMB18	Combination	96,139	9,111	0	0	0	18,726
23	1,97143	COMB18	Combination	96,139	7,275	0	0	0	18,726
23	2,07	COMB18	Combination	96,139	9,598	0	0	0	17,8944
23	2,07	COMB18	Combination	96,139	7,781	0	0	0	17,8944
23	2,16857	COMB18	Combination	96,139	10,103	0	0	0	17,013
23	2,16857	COMB18	Combination	96,139	8,307	0	0	0	17,013
23	2,26714	COMB18	Combination	96,139	10,63	0	0	0	16,0797
23	2,26714	COMB18	Combination	96,139	8,854	0	0	0	16,0797
23	2,36571	COMB18	Combination	96,139	11,177	0	0	0	15,0925
23	2,36571	COMB18	Combination	96,139	9,424	0	0	0	15,0925
23	2,46429	COMB18	Combination	96,139	11,747	0	0	0	14,049
23	2,46429	COMB18	Combination	96,139	10,016	0	0	0	14,049
23	2,56286	COMB18	Combination	96,139	12,339	0	0	0	12,9472
23	2,56286	COMB18	Combination	96,139	10,633	0	0	0	12,9472
23	2,66143	COMB18	Combination	96,139	12,955	0	0	0	11,7847
23	2,66143	COMB18	Combination	96,139	11,273	0	0	0	11,7847
23	2,76	COMB18	Combination	96,139	13,595	0	0	0	10,559
23	2,76	COMB18	Combination	96,139	11,938	0	0	0	10,559
23	2,85857	COMB18	Combination	96,139	14,261	0	0	0	9,2678
23	2,85857	COMB18	Combination	96,139	12,629	0	0	0	9,2678
23	2,95714	COMB18	Combination	96,139	14,951	0	0	0	7,9085

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011

23	2,95714	COMB18	Combination	96,139	13,345	0	0	0	7,9085
23	3,05571	COMB18	Combination	96,139	15,668	0	0	0	6,4786
23	3,05571	COMB18	Combination	96,139	14,088	0	0	0	6,4786
23	3,15429	COMB18	Combination	96,139	16,411	0	0	0	4,9754
23	3,15429	COMB18	Combination	96,139	14,858	0	0	0	4,9754
23	3,25286	COMB18	Combination	96,139	17,181	0	0	0	3,3964
23	3,25286	COMB18	Combination	96,139	15,655	0	0	0	3,3964
23	3,35143	COMB18	Combination	96,139	17,977	0	0	0	1,7388
23	3,35143	COMB18	Combination	96,139	16,479	0	0	0	1,7388
23	3,45	COMB18	Combination	96,139	18,802	0	0	0	8,272E-14
23	0	COMB19	Combination	-8,166	-0,624	0	0	0	31,4122
23	0,09857	COMB19	Combination	-8,166	1,698	0	0	0	31,3593
23	0,09857	COMB19	Combination	-8,166	-0,251	0	0	0	31,3593
23	0,19714	COMB19	Combination	-8,166	2,072	0	0	0	31,2695
23	0,19714	COMB19	Combination	-8,166	0,124	0	0	0	31,2695
23	0,29571	COMB19	Combination	-8,166	2,446	0	0	0	31,1429
23	0,29571	COMB19	Combination	-8,166	0,5	0	0	0	31,1429
23	0,39429	COMB19	Combination	-8,166	2,823	0	0	0	30,9791
23	0,39429	COMB19	Combination	-8,166	0,88	0	0	0	30,9791
23	0,49286	COMB19	Combination	-8,166	3,203	0	0	0	30,7779
23	0,49286	COMB19	Combination	-8,166	1,265	0	0	0	30,7779
23	0,59143	COMB19	Combination	-8,166	3,588	0	0	0	30,5387
23	0,59143	COMB19	Combination	-8,166	1,657	0	0	0	30,5387
23	0,69	COMB19	Combination	-8,166	3,98	0	0	0	30,2609
23	0,69	COMB19	Combination	-8,166	2,057	0	0	0	30,2609
23	0,78857	COMB19	Combination	-8,166	4,379	0	0	0	29,9437
23	0,78857	COMB19	Combination	-8,166	2,466	0	0	0	29,9437
23	0,88714	COMB19	Combination	-8,166	4,788	0	0	0	29,5861
23	0,88714	COMB19	Combination	-8,166	2,886	0	0	0	29,5861
23	0,98571	COMB19	Combination	-8,166	5,208	0	0	0	29,1872
23	0,98571	COMB19	Combination	-8,166	3,318	0	0	0	29,1872
23	1,08429	COMB19	Combination	-8,166	5,641	0	0	0	28,7457
23	1,08429	COMB19	Combination	-8,166	3,764	0	0	0	28,7457
23	1,18286	COMB19	Combination	-8,166	6,087	0	0	0	28,2601
23	1,18286	COMB19	Combination	-8,166	4,225	0	0	0	28,2601
23	1,28143	COMB19	Combination	-8,166	6,548	0	0	0	27,7292
23	1,28143	COMB19	Combination	-8,166	4,703	0	0	0	27,7292
23	1,38	COMB19	Combination	-8,166	7,026	0	0	0	27,1511
23	1,38	COMB19	Combination	-8,166	5,198	0	0	0	27,1511
23	1,47857	COMB19	Combination	-8,166	7,521	0	0	0	26,5242
23	1,47857	COMB19	Combination	-8,166	5,713	0	0	0	26,5242
23	1,57714	COMB19	Combination	-8,166	8,035	0	0	0	25,8467
23	1,57714	COMB19	Combination	-8,166	6,248	0	0	0	25,8467
23	1,67571	COMB19	Combination	-8,166	8,57	0	0	0	25,1164
23	1,67571	COMB19	Combination	-8,166	6,804	0	0	0	25,1164
23	1,77429	COMB19	Combination	-8,166	9,127	0	0	0	24,3312
23	1,77429	COMB19	Combination	-8,166	7,383	0	0	0	24,3312
23	1,87286	COMB19	Combination	-8,166	9,706	0	0	0	23,4889
23	1,87286	COMB19	Combination	-8,166	7,987	0	0	0	23,4889

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011

23	1,97143	COMB19	Combination	-8,166	10,31	0	0	0	22,5872
23	1,97143	COMB19	Combination	-8,166	8,616	0	0	0	22,5872
23	2,07	COMB19	Combination	-8,166	10,938	0	0	0	21,6235
23	2,07	COMB19	Combination	-8,166	9,27	0	0	0	21,6235
23	2,16857	COMB19	Combination	-8,166	11,593	0	0	0	20,5952
23	2,16857	COMB19	Combination	-8,166	9,953	0	0	0	20,5952
23	2,26714	COMB19	Combination	-8,166	12,276	0	0	0	19,4996
23	2,26714	COMB19	Combination	-8,166	10,664	0	0	0	19,4996
23	2,36571	COMB19	Combination	-8,166	12,986	0	0	0	18,334
23	2,36571	COMB19	Combination	-8,166	11,404	0	0	0	18,334
23	2,46429	COMB19	Combination	-8,166	13,727	0	0	0	17,0954
23	2,46429	COMB19	Combination	-8,166	12,175	0	0	0	17,0954
23	2,56286	COMB19	Combination	-8,166	14,497	0	0	0	15,7809
23	2,56286	COMB19	Combination	-8,166	12,976	0	0	0	15,7809
23	2,66143	COMB19	Combination	-8,166	15,299	0	0	0	14,3873
23	2,66143	COMB19	Combination	-8,166	13,81	0	0	0	14,3873
23	2,76	COMB19	Combination	-8,166	16,133	0	0	0	12,9116
23	2,76	COMB19	Combination	-8,166	14,677	0	0	0	12,9116
23	2,85857	COMB19	Combination	-8,166	17	0	0	0	11,3503
23	2,85857	COMB19	Combination	-8,166	15,577	0	0	0	11,3503
23	2,95714	COMB19	Combination	-8,166	17,9	0	0	0	9,7004
23	2,95714	COMB19	Combination	-8,166	16,512	0	0	0	9,7004
23	3,05571	COMB19	Combination	-8,166	18,834	0	0	0	7,9583
23	3,05571	COMB19	Combination	-8,166	17,481	0	0	0	7,9583
23	3,15429	COMB19	Combination	-8,166	19,803	0	0	0	6,1207
23	3,15429	COMB19	Combination	-8,166	18,485	0	0	0	6,1207
23	3,25286	COMB19	Combination	-8,166	20,808	0	0	0	4,1842
23	3,25286	COMB19	Combination	-8,166	19,525	0	0	0	4,1842
23	3,35143	COMB19	Combination	-8,166	21,848	0	0	0	2,1451
23	3,35143	COMB19	Combination	-8,166	20,601	0	0	0	2,1451
23	3,45	COMB19	Combination	-8,166	22,923	0	0	0	1,074E-13
23	0	COMB20	Combination	166,442	-0,475	0	0	0	27,1186
23	0,09857	COMB20	Combination	166,442	1,848	0	0	0	27,0509
23	0,09857	COMB20	Combination	166,442	-0,153	0	0	0	27,0509
23	0,19714	COMB20	Combination	166,442	2,169	0	0	0	26,9516
23	0,19714	COMB20	Combination	166,442	0,168	0	0	0	26,9516
23	0,29571	COMB20	Combination	166,442	2,49	0	0	0	26,8206
23	0,29571	COMB20	Combination	166,442	0,49	0	0	0	26,8206
23	0,39429	COMB20	Combination	166,442	2,812	0	0	0	26,6578
23	0,39429	COMB20	Combination	166,442	0,814	0	0	0	26,6578
23	0,49286	COMB20	Combination	166,442	3,136	0	0	0	26,4632
23	0,49286	COMB20	Combination	166,442	1,141	0	0	0	26,4632
23	0,59143	COMB20	Combination	166,442	3,464	0	0	0	26,2362
23	0,59143	COMB20	Combination	166,442	1,473	0	0	0	26,2362
23	0,69	COMB20	Combination	166,442	3,795	0	0	0	25,9766
23	0,69	COMB20	Combination	166,442	1,811	0	0	0	25,9766
23	0,78857	COMB20	Combination	166,442	4,133	0	0	0	25,6836
23	0,78857	COMB20	Combination	166,442	2,155	0	0	0	25,6836
23	0,88714	COMB20	Combination	166,442	4,478	0	0	0	25,3567

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011

23	0,88714	COMB20	Combination	166,442	2,509	0	0	0	25,3567
23	0,98571	COMB20	Combination	166,442	4,831	0	0	0	24,9949
23	0,98571	COMB20	Combination	166,442	2,871	0	0	0	24,9949
23	1,08429	COMB20	Combination	166,442	5,194	0	0	0	24,5974
23	1,08429	COMB20	Combination	166,442	3,245	0	0	0	24,5974
23	1,18286	COMB20	Combination	166,442	5,567	0	0	0	24,1631
23	1,18286	COMB20	Combination	166,442	3,63	0	0	0	24,1631
23	1,28143	COMB20	Combination	166,442	5,953	0	0	0	23,6908
23	1,28143	COMB20	Combination	166,442	4,029	0	0	0	23,6908
23	1,38	COMB20	Combination	166,442	6,351	0	0	0	23,1792
23	1,38	COMB20	Combination	166,442	4,441	0	0	0	23,1792
23	1,47857	COMB20	Combination	166,442	6,764	0	0	0	22,627
23	1,47857	COMB20	Combination	166,442	4,869	0	0	0	22,627
23	1,57714	COMB20	Combination	166,442	7,192	0	0	0	22,0325
23	1,57714	COMB20	Combination	166,442	5,314	0	0	0	22,0325
23	1,67571	COMB20	Combination	166,442	7,637	0	0	0	21,3942
23	1,67571	COMB20	Combination	166,442	5,776	0	0	0	21,3942
23	1,77429	COMB20	Combination	166,442	8,099	0	0	0	20,7104
23	1,77429	COMB20	Combination	166,442	6,257	0	0	0	20,7104
23	1,87286	COMB20	Combination	166,442	8,579	0	0	0	19,9792
23	1,87286	COMB20	Combination	166,442	6,757	0	0	0	19,9792
23	1,97143	COMB20	Combination	166,442	9,079	0	0	0	19,1987
23	1,97143	COMB20	Combination	166,442	7,277	0	0	0	19,1987
23	2,07	COMB20	Combination	166,442	9,6	0	0	0	18,3669
23	2,07	COMB20	Combination	166,442	7,82	0	0	0	18,3669
23	2,16857	COMB20	Combination	166,442	10,142	0	0	0	17,4816
23	2,16857	COMB20	Combination	166,442	8,384	0	0	0	17,4816
23	2,26714	COMB20	Combination	166,442	10,707	0	0	0	16,5407
23	2,26714	COMB20	Combination	166,442	8,972	0	0	0	16,5407
23	2,36571	COMB20	Combination	166,442	11,295	0	0	0	15,5418
23	2,36571	COMB20	Combination	166,442	9,584	0	0	0	15,5418
23	2,46429	COMB20	Combination	166,442	11,907	0	0	0	14,4826
23	2,46429	COMB20	Combination	166,442	10,221	0	0	0	14,4826
23	2,56286	COMB20	Combination	166,442	12,544	0	0	0	13,3606
23	2,56286	COMB20	Combination	166,442	10,884	0	0	0	13,3606
23	2,66143	COMB20	Combination	166,442	13,206	0	0	0	12,1733
23	2,66143	COMB20	Combination	166,442	11,573	0	0	0	12,1733
23	2,76	COMB20	Combination	166,442	13,895	0	0	0	10,9181
23	2,76	COMB20	Combination	166,442	12,289	0	0	0	10,9181
23	2,85857	COMB20	Combination	166,442	14,611	0	0	0	9,5923
23	2,85857	COMB20	Combination	166,442	13,032	0	0	0	9,5923
23	2,95714	COMB20	Combination	166,442	15,355	0	0	0	8,1932
23	2,95714	COMB20	Combination	166,442	13,804	0	0	0	8,1932
23	3,05571	COMB20	Combination	166,442	16,127	0	0	0	6,718
23	3,05571	COMB20	Combination	166,442	14,604	0	0	0	6,718
23	3,15429	COMB20	Combination	166,442	16,927	0	0	0	5,164
23	3,15429	COMB20	Combination	166,442	15,433	0	0	0	5,164
23	3,25286	COMB20	Combination	166,442	17,756	0	0	0	3,5283
23	3,25286	COMB20	Combination	166,442	16,292	0	0	0	3,5283

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011

23	3,35143	COMB20	Combination	166,442	18,614	0	0	0	1,8079
23	3,35143	COMB20	Combination	166,442	17,18	0	0	0	1,8079
23	3,45	COMB20	Combination	166,442	19,502	0	0	0	7,927E-14
23	0	COMB21	Combination	62,137	-0,974	0	0	0	31,4122
23	0,09857	COMB21	Combination	62,137	1,349	0	0	0	31,3938
23	0,09857	COMB21	Combination	62,137	-0,599	0	0	0	31,3938
23	0,19714	COMB21	Combination	62,137	1,724	0	0	0	31,3383
23	0,19714	COMB21	Combination	62,137	-0,221	0	0	0	31,3383
23	0,29571	COMB21	Combination	62,137	2,102	0	0	0	31,2456
23	0,29571	COMB21	Combination	62,137	0,16	0	0	0	31,2456
23	0,39429	COMB21	Combination	62,137	2,483	0	0	0	31,1154
23	0,39429	COMB21	Combination	62,137	0,547	0	0	0	31,1154
23	0,49286	COMB21	Combination	62,137	2,869	0	0	0	30,947
23	0,49286	COMB21	Combination	62,137	0,94	0	0	0	30,947
23	0,59143	COMB21	Combination	62,137	3,263	0	0	0	30,7399
23	0,59143	COMB21	Combination	62,137	1,341	0	0	0	30,7399
23	0,69	COMB21	Combination	62,137	3,664	0	0	0	30,4932
23	0,69	COMB21	Combination	62,137	1,753	0	0	0	30,4932
23	0,78857	COMB21	Combination	62,137	4,075	0	0	0	30,2059
23	0,78857	COMB21	Combination	62,137	2,175	0	0	0	30,2059
23	0,88714	COMB21	Combination	62,137	4,497	0	0	0	29,8771
23	0,88714	COMB21	Combination	62,137	2,61	0	0	0	29,8771
23	0,98571	COMB21	Combination	62,137	4,932	0	0	0	29,5054
23	0,98571	COMB21	Combination	62,137	3,058	0	0	0	29,5054
23	1,08429	COMB21	Combination	62,137	5,381	0	0	0	29,0894
23	1,08429	COMB21	Combination	62,137	3,523	0	0	0	29,0894
23	1,18286	COMB21	Combination	62,137	5,845	0	0	0	28,6277
23	1,18286	COMB21	Combination	62,137	4,004	0	0	0	28,6277
23	1,28143	COMB21	Combination	62,137	6,326	0	0	0	28,1186
23	1,28143	COMB21	Combination	62,137	4,503	0	0	0	28,1186
23	1,38	COMB21	Combination	62,137	6,826	0	0	0	27,5603
23	1,38	COMB21	Combination	62,137	5,022	0	0	0	27,5603
23	1,47857	COMB21	Combination	62,137	7,344	0	0	0	26,9508
23	1,47857	COMB21	Combination	62,137	5,561	0	0	0	26,9508
23	1,57714	COMB21	Combination	62,137	7,884	0	0	0	26,2881
23	1,57714	COMB21	Combination	62,137	6,123	0	0	0	26,2881
23	1,67571	COMB21	Combination	62,137	8,446	0	0	0	25,5701
23	1,67571	COMB21	Combination	62,137	6,709	0	0	0	25,5701
23	1,77429	COMB21	Combination	62,137	9,031	0	0	0	24,7943
23	1,77429	COMB21	Combination	62,137	7,319	0	0	0	24,7943
23	1,87286	COMB21	Combination	62,137	9,641	0	0	0	23,9584
23	1,87286	COMB21	Combination	62,137	7,955	0	0	0	23,9584
23	1,97143	COMB21	Combination	62,137	10,277	0	0	0	23,0599
23	1,97143	COMB21	Combination	62,137	8,618	0	0	0	23,0599
23	2,07	COMB21	Combination	62,137	10,941	0	0	0	22,0959
23	2,07	COMB21	Combination	62,137	9,309	0	0	0	22,0959
23	2,16857	COMB21	Combination	62,137	11,632	0	0	0	21,0638
23	2,16857	COMB21	Combination	62,137	10,03	0	0	0	21,0638
23	2,26714	COMB21	Combination	62,137	12,353	0	0	0	19,9606

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011

23	2,26714	COMB21	Combination	62,137	10,782	0	0	0	19,9606
23	2,36571	COMB21	Combination	62,137	13,104	0	0	0	18,7834
23	2,36571	COMB21	Combination	62,137	11,564	0	0	0	18,7834
23	2,46429	COMB21	Combination	62,137	13,887	0	0	0	17,529
23	2,46429	COMB21	Combination	62,137	12,379	0	0	0	17,529
23	2,56286	COMB21	Combination	62,137	14,702	0	0	0	16,1943
23	2,56286	COMB21	Combination	62,137	13,228	0	0	0	16,1943
23	2,66143	COMB21	Combination	62,137	15,55	0	0	0	14,7759
23	2,66143	COMB21	Combination	62,137	14,11	0	0	0	14,7759
23	2,76	COMB21	Combination	62,137	16,433	0	0	0	13,2706
23	2,76	COMB21	Combination	62,137	15,028	0	0	0	13,2706
23	2,85857	COMB21	Combination	62,137	17,35	0	0	0	11,6748
23	2,85857	COMB21	Combination	62,137	15,981	0	0	0	11,6748
23	2,95714	COMB21	Combination	62,137	18,304	0	0	0	9,985
23	2,95714	COMB21	Combination	62,137	16,97	0	0	0	9,985
23	3,05571	COMB21	Combination	62,137	19,293	0	0	0	8,1978
23	3,05571	COMB21	Combination	62,137	17,997	0	0	0	8,1978
23	3,15429	COMB21	Combination	62,137	20,319	0	0	0	6,3093
23	3,15429	COMB21	Combination	62,137	19,06	0	0	0	6,3093
23	3,25286	COMB21	Combination	62,137	21,383	0	0	0	4,316
23	3,25286	COMB21	Combination	62,137	20,162	0	0	0	4,316
23	3,35143	COMB21	Combination	62,137	22,485	0	0	0	2,2142
23	3,35143	COMB21	Combination	62,137	21,301	0	0	0	2,2142
23	3,45	COMB21	Combination	62,137	23,624	0	0	0	1,04E-13

MIN P	166,442
MAX P	-202,653
MAX V2 positivo	23,624
MAX V2 negativo	-0,974
MAX M3 positivo	31,4122
MAX M3 negativo	7,369E-14

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011

Verifiche asta 19 (soletta superiore)

Con riferimento alle sezioni più sollecitate si procede all'esecuzione delle seguenti verifiche.

VERIFICA A PRESSOFLESSIONE (MASSIMO NEGATIVO IN ESTREMITA')

Combinazione COMB 4

$$N_{sd} = 145 \text{ KN/m}$$

$$M_{sd} = -931 \text{ KNm/m}$$

Flessione:

SEZIONE	base (cm)	100
	altezza (cm)	80
ARMATURA	compressa (inferiore)	$\phi 28/10$
	tesa (superiore)	$\phi 24/10$
INDICI DI RESISTENZA	Mrd =	1.349 kNm
	Nrd =	210 kN
	IR =	1,44

VERIFICA A PRESSOFLESSIONE (MASSIMO POSITIVO IN MEZZERIA)

Combinazione COMB 6

$$N_{sd} = 145 \text{ KN/m}$$

$$M_{sd} = 374 \text{ KNm/m}$$

Flessione:

SEZIONE	base (cm)	100
	altezza (cm)	80
ARMATURA	compressa (superiore)	$\phi 24/10$
	tesa (inferiore)	$\phi 28/10$
INDICI DI RESISTENZA	Mrd =	1011 kNm
	Nrd =	392 kN
	IR =	2,7

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011

VERIFICA A TAGLIO (ESTREMITA')

Combinazione COMB 4

ARMATURA LONGITUDINALE (inferiore) $\phi 28/10$
(superiore) $\phi 24/10$

$V_{sd} = 590 \text{ kN/m}$

RISULTATI VERIFICA A TAGLIO	
Verifica senza armatura trasversale	
Taglio res. ultimo (VRd):	28515.666
Indice di resistenza:	2.07
Verifica delle bielle compresse	
Taglio resistente ultimo (VRcd):	317469.406
ctg(Theta):	1.00
Indice di resistenza:	0.19
Verifica con armatura trasversale	
Taglio attribuito all'armatura (VRsd):	59000.000
Armatura trasversale per unita' di lunghezza (Asw, cm ² /m):	21.95
Staffe a 4 braccia	
:	$\phi 14/28.1 \text{ cm}$

FESSURAZIONE (SLE):

Si considerano condizioni ambientali aggressive e la presenza di armature poco sensibili:

COMBINAZIONE FREQUENTE

- combinazione (frequente):

$$F_d = g_1 + g_2 + \psi_1(q_1 + q_2)$$

$$W_D \leq \cdot W_2 = 0,3 \text{ mm}$$

M = -585 kNm

VERIFICA A FESSIONE:

SEZIONE	base (cm)	100
	altezza (cm)	80
ARMATURA	tesa (superiore)	$\phi 24/10$
	compressa (inferiore)	$\phi 28/10$
SOLLECITAZIONI	Msd =	-585 kNm

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO					
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<table border="1" style="width: 100%;"> <tr> <td style="width: 50%;"><i>Rev</i></td> <td style="width: 50%;"><i>Data</i></td> </tr> <tr> <td>F0</td> <td>20/06/2011</td> </tr> </table>	<i>Rev</i>	<i>Data</i>	F0	20/06/2011
<i>Rev</i>	<i>Data</i>						
F0	20/06/2011						

TENSIONI	cls	$\sigma_c = (N/mm^2)$	4,4
	ferro teso	$\sigma_f = (N/mm^2)$	187

ampiezza fess. $w_D = (mm) 0,12 < W_D$

VERIFICA SODDISFATTA

COMBINAZIONE QUASI PERMANENTE

- combinazione (quasi permanente):

$$F_d = g_1 + g_2 + \psi_2(q_1 + q_2)$$

$$W_D \leq \cdot W_{12} = 0,2 \text{ mm}$$

$$M = -367 \text{ kNm}$$

VERIFICA A FESSURAZIONE:

SEZIONE	base (cm)	100
	altezza (cm)	80
ARMATURA	compressa (superiore)	$\phi 24/10$
	tesa (inferiore)	$\phi 28/20$
SOLLECITAZIONI	Msd =	-367 kNm
TENSIONI	cls	$\sigma_c = (N/mm^2)$ 0,5
	ferro teso	$\sigma_f = (N/mm^2)$ 2,9

ampiezza fess. $w_D = (mm) 0,06 < W_D$

VERIFICA SODDISFATTA

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011

Verifiche aste 7 e 8 (cordoli)

Con riferimento alle sezioni più sollecitate si procede all'esecuzione delle seguenti verifiche.

VERIFICA A PRESSOFLESSIONE (MASSIMO POSITIVO IN ESTREMITA')

Combinazione COMB 4

$$N_{sd} = 207 \text{ KN/m}$$

$$M_{sd} = 931 \text{ KNm / m}$$

Flessione:

SEZIONE	base (cm)	100
	altezza (cm)	140
ARMATURA	compressa (interne) $\phi 24/20$	
	tesa (esterna) $\phi 24/20$	
INDICI DI RESISTENZA	Mrd =	1.377 kNm
	Nrd =	306 kNm
	IR =	1,47

VERIFICA A TENSOFFLESSIONE (MASSIMO NEGATIVO IN MEZZERIA)

Combinazione COMB 5

$$N_{sd} = 207 \text{ KN/m}$$

$$M_{sd} = -185 \text{ KNm / m}$$

Flessione:

SEZIONE	base (cm)	100
	altezza (cm)	140
ARMATURA	compressa (esterna) $\phi 24/20$	
	tesa (interna) $\phi 24/20$	
INDICI DI RESISTENZA	Mrd =	3.457 kNm
	Nrd =	3869 kNm
	IR =	20

VERIFICA A TAGLIO (IN SEZIONE DI BASE)

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011

Combinazione COMB 3

ARMATURA (interne) $\phi 24/20$
(esterna) $\phi 24/20$

$V_{sd} = 370 \text{ kN/m}$

Verifica senza armatura trasversale	
Taglio res. ultimo (VRd):	44798.563
Indice di resistenza:	0.83
Verifica delle bielle compresse	
Taglio resistente ultimo (VRcd):	571444.875
ctg(Theta):	1.00
Indice di resistenza:	0.06
Verifica con armatura trasversale	
Taglio attribuito all'armatura (VRsd):	37000.003
Armatura trasversale per unita' di lunghezza (Asw, cm ² /m):	7.65
Applicare solo i minimi di norma perchè la sezione non richiede armatura trasversale a taglio (V<=Vrdul)	
Staffe a 4 braccia:	$\phi 14/99.0 \text{ cm}$

VERIFICA TENSIONALE (SLE):

Si procede alla verifica tensionale della sezione di base che risulta essere maggiormente sollecitata.

Comb. Quasi Permanente

N (kN)	M (kNm)
246	367

SEZIONE	base (cm)	100
	altezza (cm)	140
ARMATURA	(interne)	$\phi 24/20$
	(esterna)	$\phi 24/20$
TENSIONI	cls	$\sigma_c = (N/\text{mm}^2) 1,9 < 0,45 f_{ck} = 0,45 \times 33,20 = 14,94$
	ferro	$\sigma_f = (N/\text{mm}^2) 79 < 0,80 f_{yk} = 0,80 \times 450 = 360$

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011

Verifiche aste 6 e 9 (pali laterali)

Con riferimento alle sezioni più sollecitate si procede all'esecuzione delle seguenti verifiche.

In conseguenza alla particolare modellazione utilizzata, nella quale si considera una porzione di struttura profonda 1,00, risulta necessario, essendo i pali disposti con interasse di 1,20 m amplificare con un fattore pari ad 1,2 le sollecitazioni agenti su di essi, al fine di tener conto indirettamente della ripartizione delle proprietà inerziali del singolo palo su di una lunghezza non unitaria ma pari a 1,20 m.

VERIFICA A TENSOFFLESSIONE (MASSIMO POSITIVO IN ESTREMITA')

Combinazione COMB 4

$$N_{sd} = 253 \text{ KN/m}$$

$$M_{sd} = 637 \cdot 1,2 = 764 \text{ KNm / m}$$

Flessione:

SEZIONE	diametro (cm)	100
ARMATURA	ripartita	24 ϕ 24
INDICI DI RESISTENZA	Mrd =	1.681 kNm
	IR =	2,20

VERIFICA A TAGLIO (IN ESTREMITA')

Combinazione COMB 5

ARMATURA ripartita 24 ϕ 24

$$V_{sd} = 535 \cdot 1,2 = 642 \text{ kN/m}$$

RISULTATI VERIFICA A TAGLIO	
Verifica delle bielle compresse	
Taglio resistente ultimo (VRcd):	421107.375
ctg(Theta):	1.00
Indice di resistenza:	0.15
Verifica con armatura trasversale	
Taglio attribuito all'armatura (VRsd):	32100.002
Armatura trasversale per unita' di lunghezza (Asw, cm ² /m):	9.43
Staffe a 4 braccia	
:	ϕ 14/65.3cm

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO					
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<table border="1" style="width: 100%; border-collapse: collapse;"> <tr> <td style="text-align: center;"><i>Rev</i></td> <td style="text-align: center;"><i>Data</i></td> </tr> <tr> <td style="text-align: center;">F0</td> <td style="text-align: center;">20/06/2011</td> </tr> </table>	<i>Rev</i>	<i>Data</i>	F0	20/06/2011
<i>Rev</i>	<i>Data</i>						
F0	20/06/2011						

VERIFICA TENSIONALE (SLE):

Si procede alla verifica tensionale della sezione di base che risulta essere maggiormente sollecitata.

Comb. Quasi Permanente

N (kN)	M (kNm)
265	190

SEZIONE	diametro (cm)	100
ARMATURA	ripartita	28φ24
TENSIONI	cls	$\sigma_c = (N/mm^2) 0,4 < 0,45 f_{ck} = 0,45 \times 33,20 = 14,94$
	ferro	$\sigma_f = (N/mm^2) 5,6 < 0,80 f_{yk} = 0,80 \times 450 = 360$

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011

9 BERLINESI PALI

9.1 BERLINESI UN ORDINE

Progetto: PALI RFI

Risultati per la Design Section 1: 0: DM08_ITA: Comb. 1: A1+M1+R1

APPROCCI DI PROGETTO E FATTORI DI COMBINAZIONE

Scenari di progetto utilizzati (da Normativa o personalizzati) e relativi fattori di combinazione

Stage	Design Code	Design Case	F(tan fr)	F (c')	F (Su)	F (EQ)	F(per load)	F(temp load)	F(per sup)	F(temp sup)	F Earth (Dstab)	F Earth (stab)	F GWT (Dstab)	F GWT (stab)	F HYD (Dstab)	F HYD (stab)	F UPL (Dstab)	F UPL (stab)
0	DM08_ITA	1: A1+M1+R1	1	1	1	0	1.3	1.5	1.2	1.1	1.3	1	1.3	1	1.35	0.9	1	1
1	DM08_ITA	1: A1+M1+R1	1	1	1	0	1.3	1.5	1.2	1.1	1.3	1	1.3	1	1.35	0.9	1	1
2	DM08_ITA	1: A1+M1+R1	1	1	1	0	1.3	1.5	1.2	1.1	1.3	1	1.3	1	1.35	0.9	1	1
3	DM08_ITA	1: A1+M1+R1	1	1	1	0	1.3	1.5	1.2	1.1	1.3	1	1.3	1	1.35	0.9	1	1
4	DM08_ITA	1: A1+M1+R1	1	1	1	0	1.3	1.5	1.2	1.1	1.3	1	1.3	1	1.35	0.9	1	1
5	DM08_ITA	1: A1+M1+R1	1	1	1	0	1.3	1.5	1.2	1.1	1.3	1	1.3	1	1.35	0.9	1	1

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011

Stage=Fase di scavo
Design Code=Codice di verifica
Ftan fr=fattore moltiplicatore tangente angolo di attrito
F C'=fattore moltiplicatore coesione efficace
F Su'=fattore moltiplicatore coesione non drenata
F EQ=fattore moltiplicatore reazione sismica
F perm load=fattore moltiplicatore carichi permanenti
F temp load=fattore moltiplicatore carichi accidentali/variabili
F perm supp=fattore di riduzione resistenza per verifica pull out tirante
F temp supp=fattore di riduzione resistenza per verifica pull out tirante
F earth Dstab=fattore moltiplicatore per spinta attiva nel caso sfavorevole
F earth stab=fattore moltiplicatore per spinta attiva nel caso favorevole
F GWT Dstab (ground water)=fattore moltiplicatore per spinta idrostatica sfavorevole
F GWT stab (ground water)=fattore moltiplicatore per spinta idrostatica favorevole
F HYD Dstab=fattore moltiplicatore per spinta idrodinamica sfavorevole
F HYD stab=fattore moltiplicatore per spinta idrodinamica favorevole
F UPL Dstab=fattore moltiplicatore per sifonamento sfavorevole
F UPL stab=fattore moltiplicatore per sifonamento favorevole

DATI TERRENO

Name	g tot	g dry	Frict	C'	Su	FRp	FRcv	Eload	Eur	kAp	kPp	kAcv	kPcv	Vary	Spring	Color
	(daN/m3)	(daN/m3)	(deg)	(daN/	(daN/	(deg)	(deg)	(daN/m2	(daN/m2	Springs	Springs	Springs	Springs		Model	
Strato1	1900	1900	35	0	N/A	N/A	N/A	200000	600000	0.27	3.69	N/A	N/A	True	Linear	
Strato2	1900	1631.55	38	0	N/A	N/A	N/A	4000000	1200000	0.24	4.2	N/A	N/A	True	Linear	

gtot=peso specifico /totale terreno
gdry=peso secco del terreno
Frict=angolo di attrito di calcolo
C'=coesione efficace
Su = Coesione non drenata, parametro attivo per terreni tipo CLAY in condizioni NON drenate
Dilat=Dilatanza terreno (parametro valido solo in analisi non lineare)
Evc=modulo a compressione vergine molla equivalente terreno
Eur=modulo di scarico/ricarico (fase elastica) molla equivalente terreno
Kap= coefficiente di spinta attiva di picco
Kpp= coefficiente di spinta passiva di picco
Kacv= coefficiente di spinta attiva di picco
Kpcv= coefficiente di spinta passiva di picco
Spring models= modalità di definizione dei moduli di rigidità molle terreno (LIN, EXP, SIMC)
LIN= Lineare-Elastico-Perfettamente plastico
EXP= esponenziale, SUB: Modulo di reazione del sottosuolo
SIMC= Modo semplificato per argille

STRATIGRAFIA TERRENI

Top Elev= quota superiore strato
Soil type=nome del terreno
OCR=rappporto di sovraconsolidazione
K0=coefficiente di spinta a riposo

Name: Boring 1, pos: (-8, 0)

Top elev.	Soil type	OCR	Ko

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		Codice documento SS0558_F0.doc	Rev F0	Data 20/06/2011

0	Strato1	1	0.43
-13	Strato2	1	0.38

DATI GENERALI RELATIVI A MATERIALI E PROPRIETA MECCANICHE

Acciaio

Name	Strength Fy	Fu	Elastic E	Density g
	(daN/cm ²)	(daN/cm ²)	(daN/cm ²)	(daN/m ³)
S355	3620	5200.6	2100615.4	7851.8148

Calcestruzzo

Name	Strength Fc'	Elastic E	Density g	Tension Strength Ft
	(daN/cm ²)	(daN/cm ²)	(daN/m ³)	(daN/cm ²)
C25/30	254.9	320965.9	2549.291	10

Barre in acciaio

Name	Strength Fy	Elastic E
	(daN/cm ²)	(daN/cm ²)
S1862 (Strands)	18987.1	2141404
B450C	4588.7	2141404

Legno

Name	Ultimate Bending Strength Fbu	Ultimate Tensile Strength Ft _u	Ultimate Shear Strength Fvu	Density g	Elastic E
	(daN/cm ²)	(daN/cm ²)	(daN/cm ²)	(daN/m ³)	(daN/cm ²)
Regular grade	70.4	70.4	41.8	801.2522	56288.3

STEEL=acciaio

Name=nome materiale

strength fy=fyk=res caratteristica acciaio

Fu=fuk=resistenza ultima

Elastic E=modulo elastico

Density g=peso specifico

CONCRETE=calcestruzzo

Name=nome materiale

f'c=fck=resistenza cilindrica a compressione caratteristica cls

Elastic E=modulo elastico

Density g=peso specifico

Tension strength=ft=fctk=resistenza a trazione caratteristica

STEEL REBAR

Name=nome materiale

strength fy=fyk=resistenza caratteristica acciaio

Elastic E=modulo elastico

WOOD=legno

Name=nome materiale

Ultimate bending strength Fb=fbk=resistenza caratteristica a flessione

Ultimate tensile strength Ft_u=ftuk=res caratt. parallela alle fibre

Ultimate shear strength Fvu=fvuk=res. caratt. a taglio

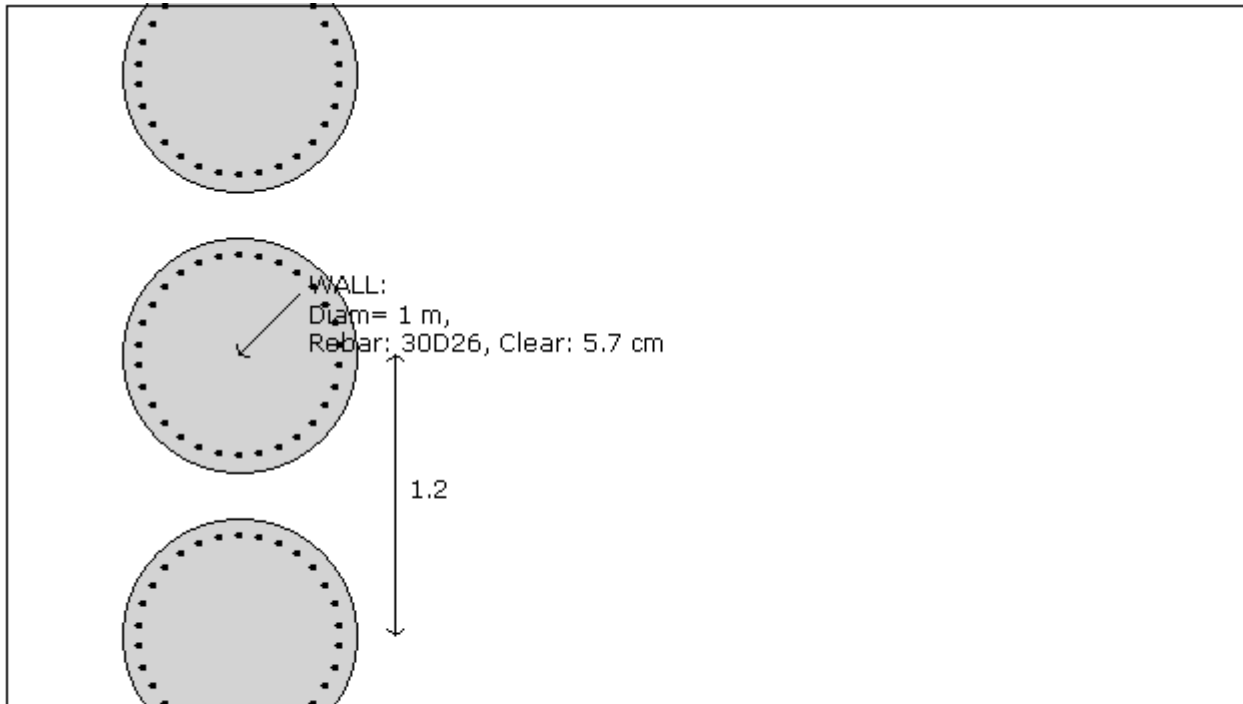
Density g=peso specifico

Elastic E=modulo elastico

DATI PARATIE

Sezione paratia0: Berlinese Sx

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011



Company: My Company	Wall sketch	CeAS srl and Deep Excavation LCC
Engineer: Engineer		Paratie Plus 2010 - DeepXcar 2010
C:\Do...ngs\user\Desktop\Paratie\488 Messina\RFI\PALI Un ordine.DEEP		10/26/2010

Wall uses wall section0: PALI 1000

Tipo paratia: Pali tangenti: pali in calcestruzzo armato

Quota sommita' paratia: 0 m Quota piede paratia: -10 m

Dimensione fuori piano paratia: 1.2 Spessore paratia = 1

Ampiezza zona spinta passiva al di sotto del piano di scavo: 0.43 Ampiezza zona spinta attiva al di sotto del piano di

fc' cls = 254.9 Fy barre = 4588.7 Ecls = 320965.9 FcT calcestruzzo a trazione = 10% di Fc'

fy profilati in acciaio = 3620 Eacciaio = 2100615.4

Attrito paratia: % attrito terreno = 50%

Le capacita' paratie in acciaio sono calcolate con NTC 2008

Le capacita' paratie in calcestruzzo sono calcolate con ACI 318-2002.

Nota: con la capacita' ultima si dovrebbe adottare un fattore di sicurezza strutturale.

Proprieta' paratie di pali tangenti

Concrete section type: Rectangular

Section dimensions

D = 100 m B = 100 m A = 7853.98163397448 cm² Ixx = 4908738.52123405 cm⁴

Longitudinal reinforcement

Top rebars: N = 30 bars #D26 = AsTop 159.27 cm², Ctop = 7 m

Bottom rebars: N = 30 bars #D25 = AsBot NaN cm², Cbot = 7 m

Shear reinforcements

Bar #D10 = As 0.785 cm², sV = 12 m, sH = 25 m

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO	
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD	<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011

DATI GENERALI PARATIA

Hor wall spacing=interasse tra pannelli

passive width below exc=larghezza di riferimento per calcolo zona passiva per analisi classica

concrete $f'c=fck$ =res cilindrica caratteristica cls

Rebar $f_y=f_yk$ =res caratteristica acciaio armature

Econc=modulo elastico cls

Concrete tension $f_{ct}=f_{ctk}$ =resistenza caratteristica a trazione cls

Steel members $f_y=f_yk$ =res caratteristica acciaio

Esteel=modulo elastico acciaio

DATI TABELLATI (si omette la spiegazione dei parametri già descritti in precedenza)

1) Diaphragm wall=sezione rettangolare in CA

N/A= il valore non è disponibile in quanto non correlato al tipo di sezione in uso

$F_y=f_yk$

$F'c=fck$

D=altezza paratia

B=base paratia

tf=spessore

2) Steel sheet pile=palancolata

DES=tipo di palancolata

Shape=forma

W=peso per unità di lunghezza

A=area

h=altezza

t=spessore lamiera orizzontale

b=base singolo elemento a Z o U

s=spessore lati obliqui

I_{xx} =inerzia asse principale palancolata (per unità di lunghezza)

S_{xx} =modulo di resistenza asse principale palancolata (per unità di lunghezza)

3) Secant pile wall (pali allineati e sovrapposti), Tangent pile wall=pali allineati (Berlinesi, micropali), soldier pile (pali in acciaio con collegamento in cls), soldier pile and timber lagging (pali in acciaio con collegamento con elementi in legno)

W=peso per unità di lunghezza

A=area

D=diametro

tw o tp=spessore dell'anima (sezione a I) o del tubo (sezione circolare)

bf=larghezza della sezione

tf=spessore dell'ala

k=altezza flangia + altezza raccordo

I_{xx} =inerzia rispetto asse orizzontale (per unità di lunghezza)

S_{xx} =modulo di resistenza rispetto asse orizzontale (per unità di lunghezza)

r_x =raggio giratore d'inerzia lungo x

I_{yy} =inerzia rispetto asse verticale (per unità di lunghezza)

S_{yy} =modulo di resistenza rispetto asse verticale (per unità di lunghezza)

r_y =raggio giratore d'inerzia lungo y

C_w =costante di ingobbamento

$f_y=f_yk$

DATI VINCOLI, TIRANTI, PUNTONI, ECC

Support 0: type = tieback

X = 1 m, Z = -2.5 m, S = 1.2 m

Lfree = 5 m, Lfix = 15 m, Rfix = 80 %

Walls: Berlinese Sx

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011

Stage No	Active	Prestress	Slab live load	User add. strain
	Si'/No	(daN)	(daN/m2)	+expansion
0	No	-	-	-
1	No	-	-	-
2	No	-	-	-
3	Si'	45000	-	-
4	Si'	45000	-	-
5	Si'	45000	-	-

Support type= tipo di vincolo

Tieback=tirante

Strut=puntone

Raker=Sbadacchio

LEGENDA PER TIRANTI

Dati generali

Z=quota vincolo

S=interasse in direzione orizzontale

Lfree=lunghezza tratto elastico

Lfix=lunghezza tratto rigido

Rfix=% sfruttamento tratto rigido

Stage No=numero step di scavo

Active=stato tirante (YES=attivo)

Post stress= precarico tirante (carico moltiplicato per interasse)

Walls= indica il nome della paratia alla quale il vincolo è applicato

Nel caso di solette indica il punto di partenza e cioè la paratia di sinistra

PARAMETRI DI CALCOLO PER SINGOLA FASE

Summary of stage assumptions

Name	Analysis	Drive	ka-Mult	Htr T/B	Resist	Res	Contle	Suppor	Axial	Used	Min	Toe	Toe
	Method	Press		(%)	Press	Mult	Metho	Model	Incl	FSwall	FDtoe	FSrot	FSpas
Stage 0	Springs-Up	Ka	N/A	N/A	Kp+ d	N/A		Fixed	N/A	1	0	0	0
Stage 1	Springs-Up	Ka	N/A	N/A	Kp+ d	N/A		Fixed	N/A	1	0	0	0
Stage 2	Springs-Up	Ka	N/A	N/A	Kp+ d	N/A		Fixed	N/A	1	0	0	0
Stage 3	Springs-Up	Ka	N/A	N/A	Kp+ d	N/A		Fixed	N/A	1	0	0	0
Stage 4	Springs-Up	Ka	N/A	N/A	Kp+ d	N/A		Fixed	N/A	1	0	0	0
Stage 5	Springs-Up	Ka	N/A	N/A	Kp+ d	N/A		Fixed	N/A	1	0	0	0

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO					
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<table border="1" style="width: 100%;"> <tr> <th style="text-align: left;">Rev</th> <th style="text-align: left;">Data</th> </tr> <tr> <td>F0</td> <td>20/06/2011</td> </tr> </table>	Rev	Data	F0	20/06/2011
Rev	Data						
F0	20/06/2011						

Name=nome fase

Analysis method=metodo di calcolo

CONventional=analisi all'equilibriolimitate

springs UP=analisi non lineare (schema a molle elasto plastiche)

DR=analisi per terreni tipo argilla in condizione drenata

U=analisi per terreni tipo argilla in condizione NON drenata

Up=analisi non drenata solo per i terreni selezionati

Drive press=Ka=spinta terreno attiva

ka mult=eventuale moltiplicatore Ka

Htr T/B (%)=schema pressione attiva di tipo trapezoidale

Resit press=Kp=spinta terreno passiva

Res Mult=eventuale moltiplicatore Kp

COntle Method=

Support Model=tipologia vincoli fissi (fixed=fissi)

Axial Incl=se azione assiale inclusa

Used FS wall=coeff di riduzione dominio MN

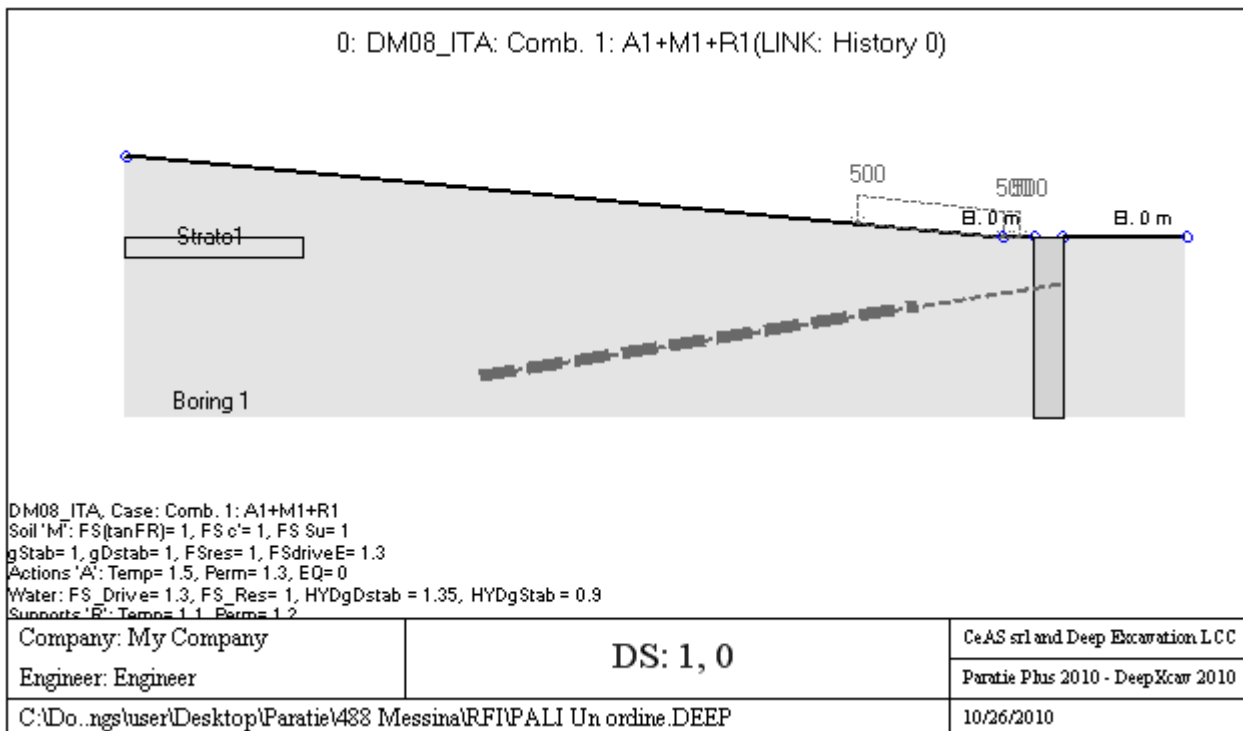
Min FD TOe=sicurezza minima per infissione (analisi classica)

Toe FS rot=sicurezza a rotazione (analisi classica)

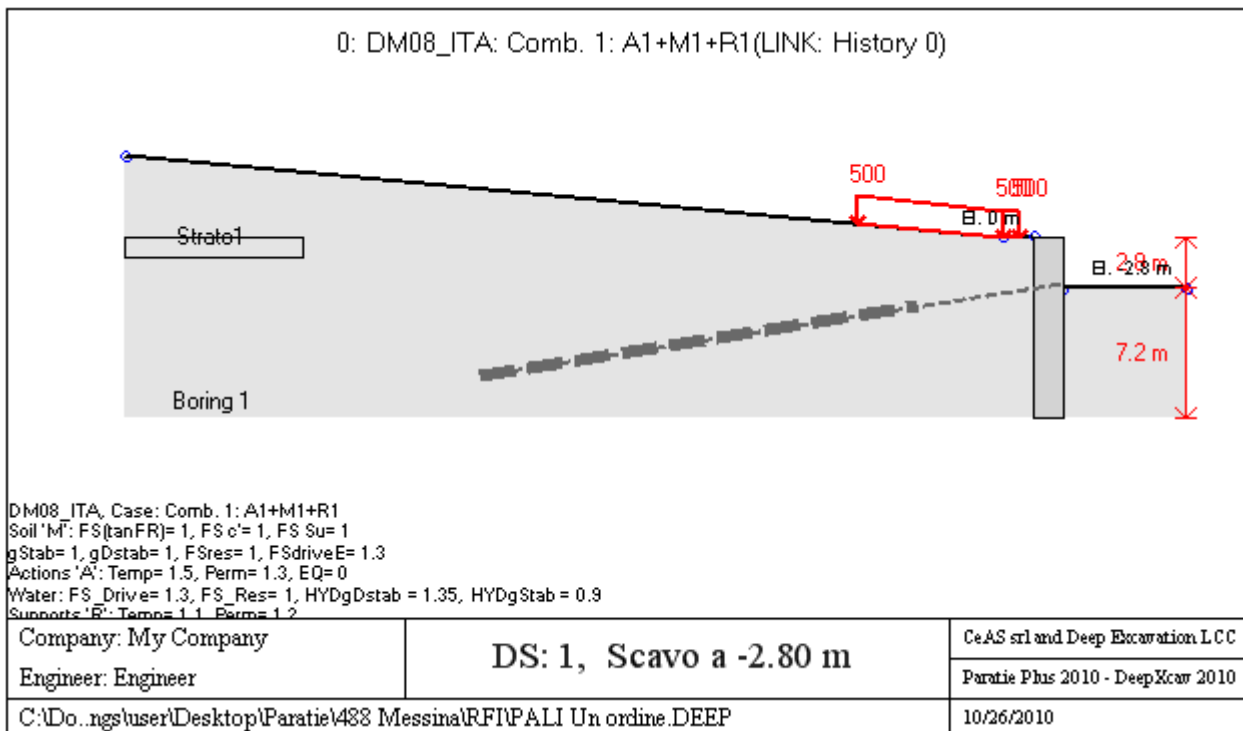
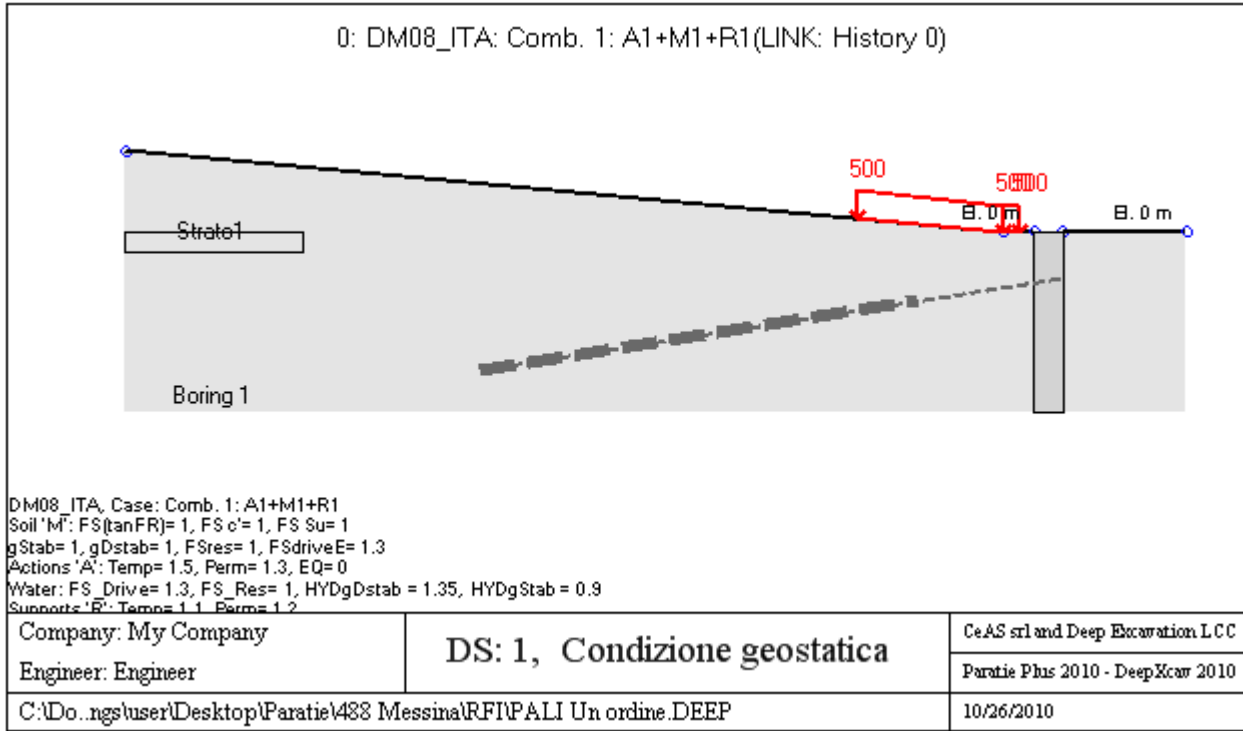
Toe FSpas=sicurezza sulle pressioni agenti/resistenti (analisi classica)

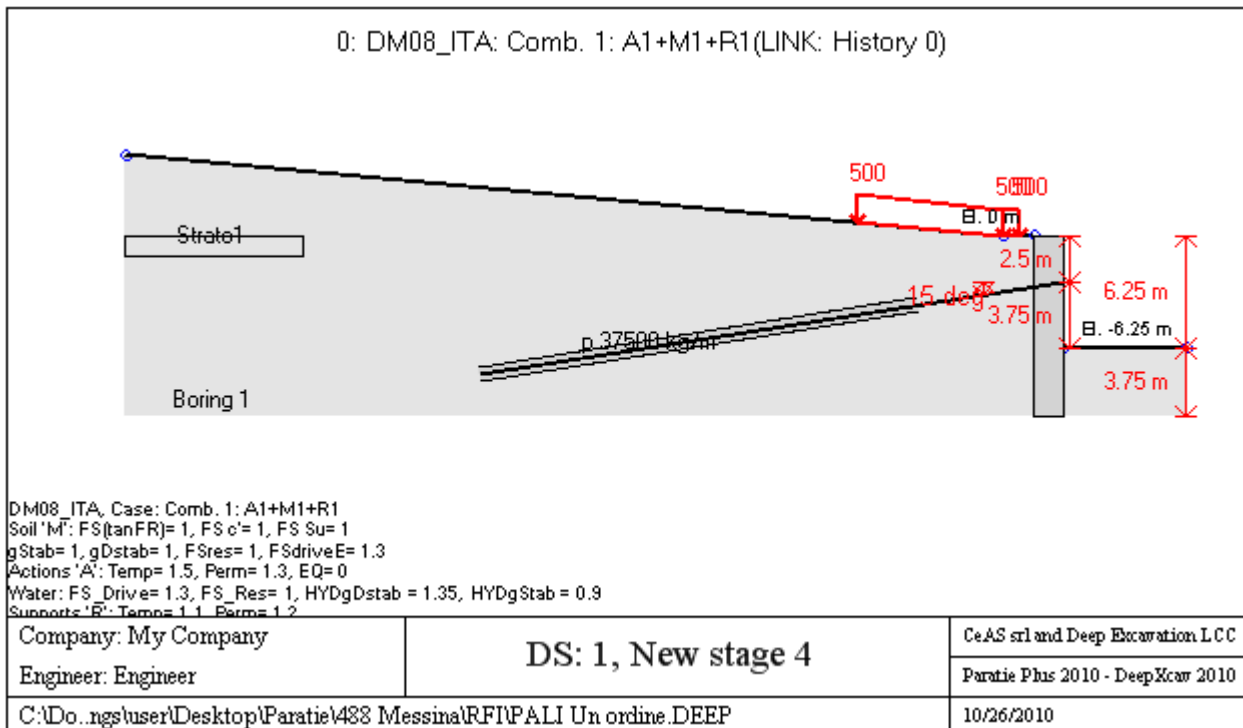
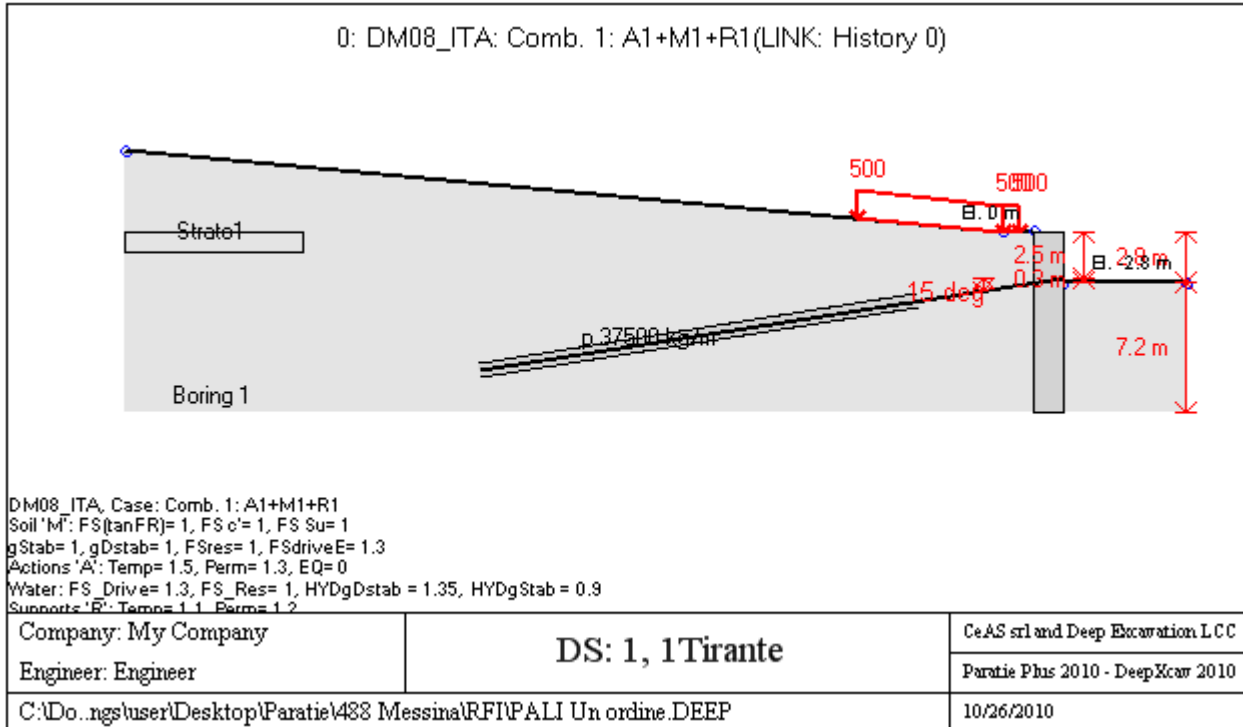
GRAFICI FASI DI SCAVO

Di seguito si riportano gli schemi grafici delle fasi di scavo principali.



RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD	Codice documento	Rev	Data
	SS0558_F0.doc	F0	20/06/2011





Stabilita' del piede

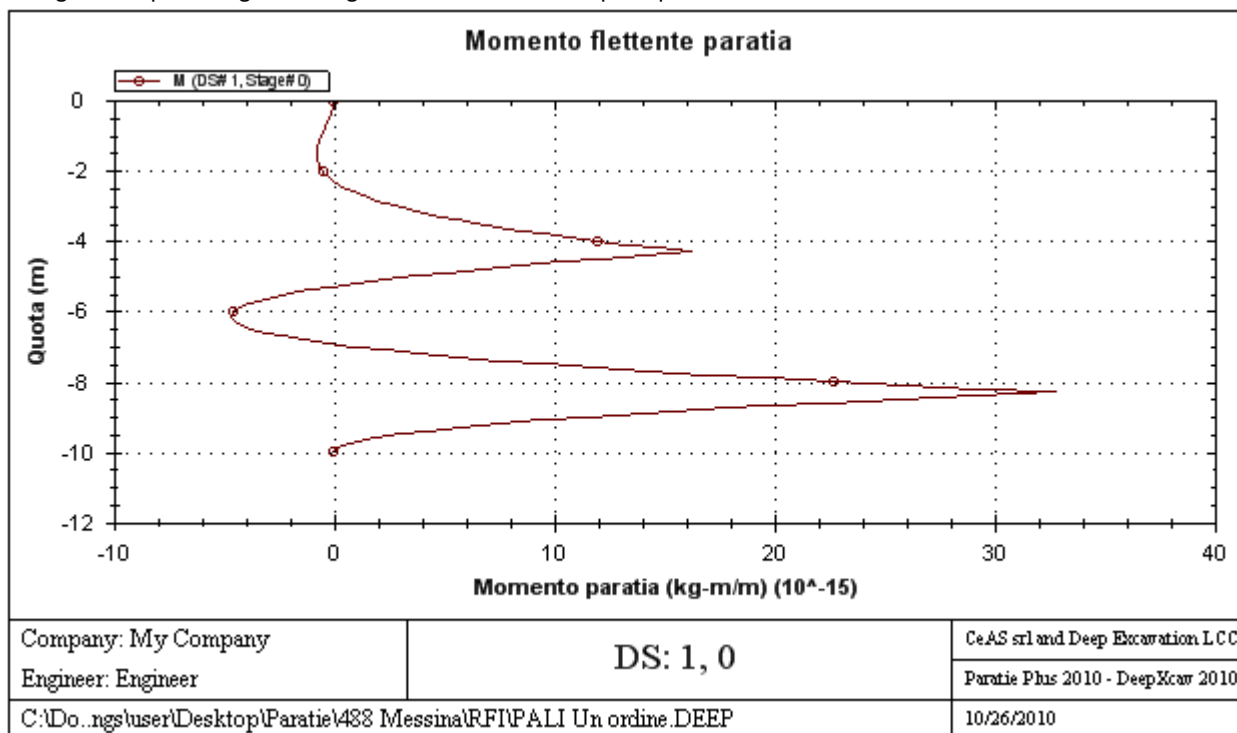
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RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011

Embedment FS vs Stage

	Min Toe FS	FS1 Passive	FS2 Rotation	FS3 Length (from FS1, FS2)	FS4 Mobilized Passive	FS5 Actual Drive Thrust / Theory
Stage #0	N/A	N/A	N/A	N/A	11.604	1.872
Stage #1	N/A	N/A	N/A	N/A	11.561	1.878
Stage #2	N/A	N/A	N/A	N/A	6.969	1.457
Stage #3	N/A	N/A	N/A	N/A	11.374	3.125
Stage #4	N/A	N/A </td <td>N/A</td> <td>N/A</td> <td>3.034</td> <td>2.366</td>	N/A	N/A	3.034	2.366
Stage #5	N/A	N/A	N/A	N/A	3.034	2.366

GRAFICI FASI DI SCAVO

Di seguito si riportano gli schemi grafici delle fasi di scavo principali.

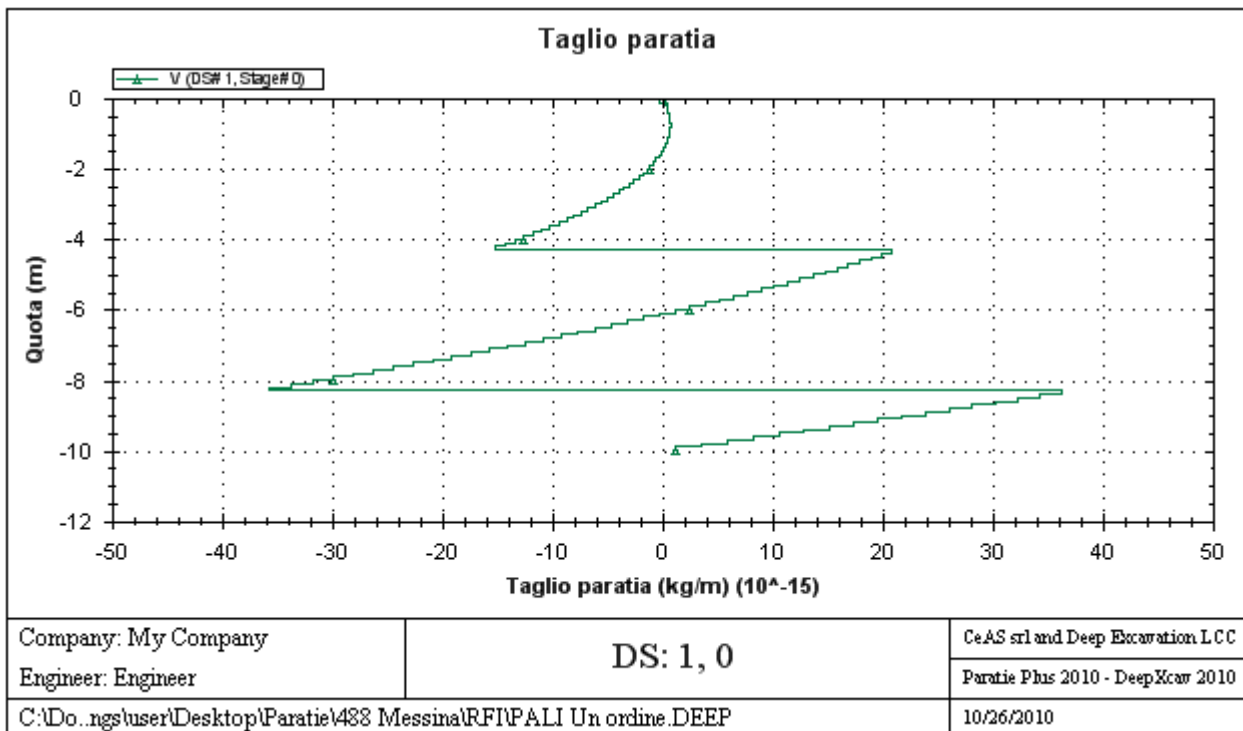
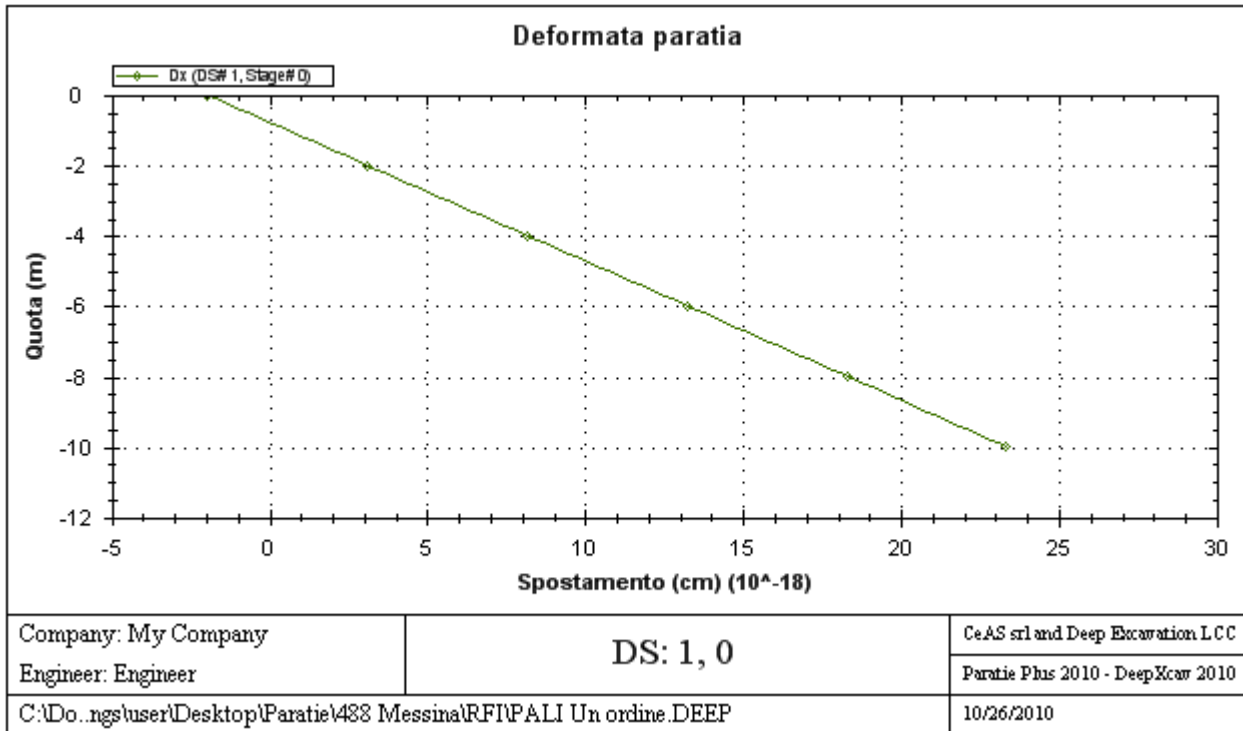


RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

Codice documento
SS0558_F0.doc

Rev
F0

Data
20/06/2011

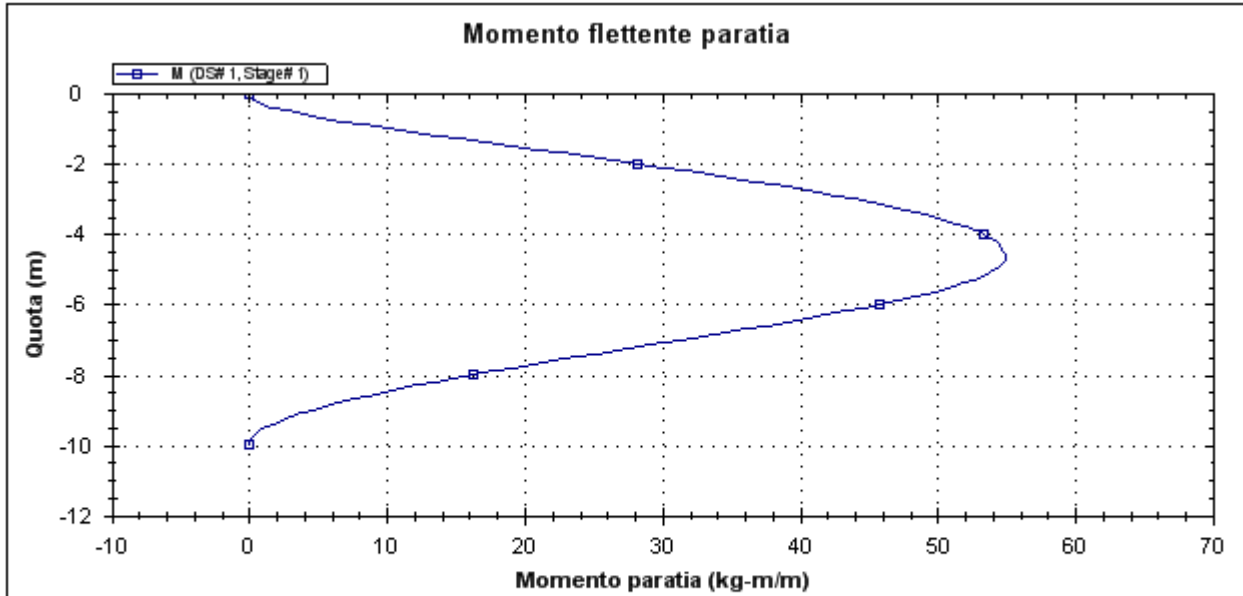


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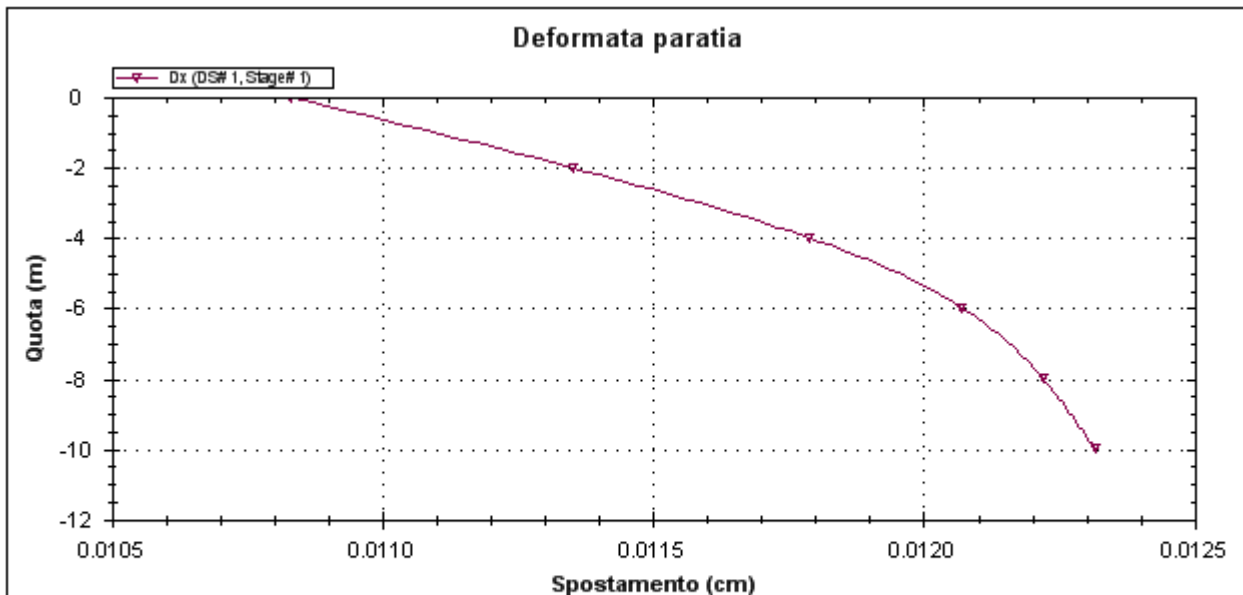
Codice documento
SS0558_F0.doc

Rev
F0

Data
20/06/2011



Company: My Company Engineer: Engineer	DS: 1, Condizione geostatica	CeAS srl and Deep Excavation LCC Paratie Plus 2010 - DeepXcar 2010
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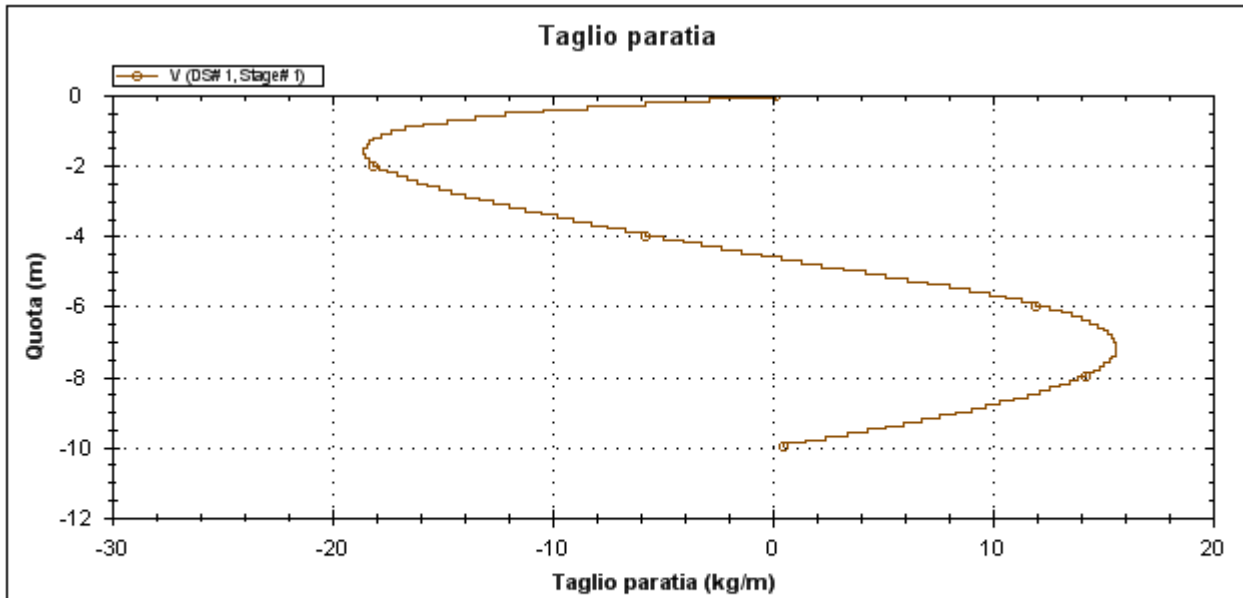
Company: My Company Engineer: Engineer	DS: 1, Condizione geostatica	CeAS srl and Deep Excavation LCC Paratie Plus 2010 - DeepXcar 2010
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RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

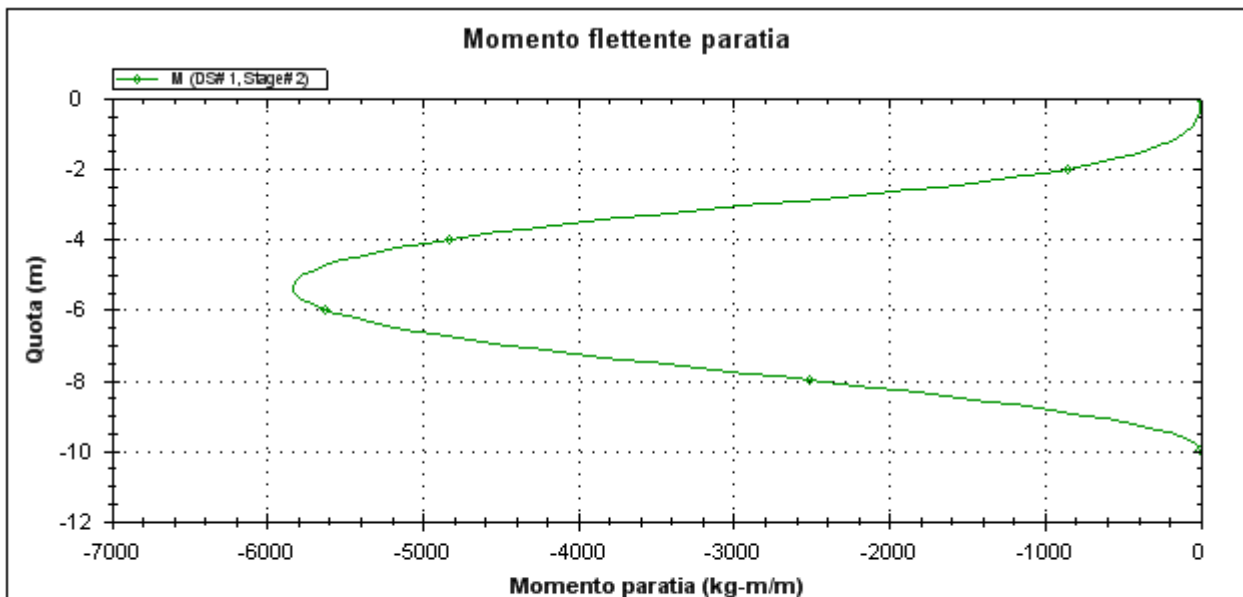
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Rev
F0

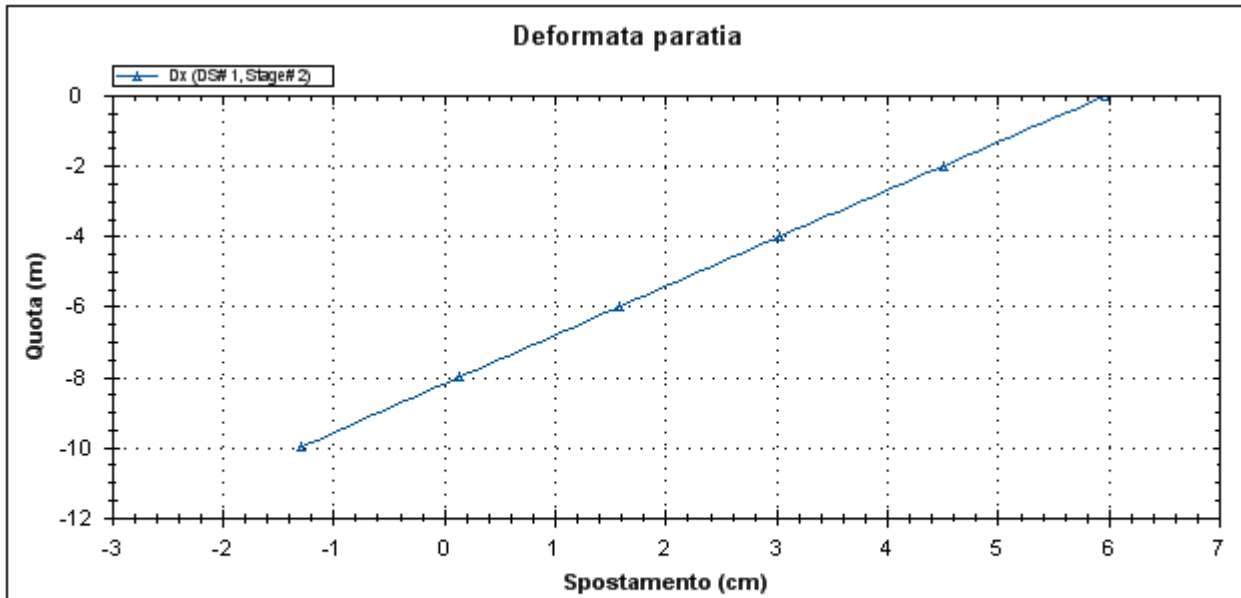
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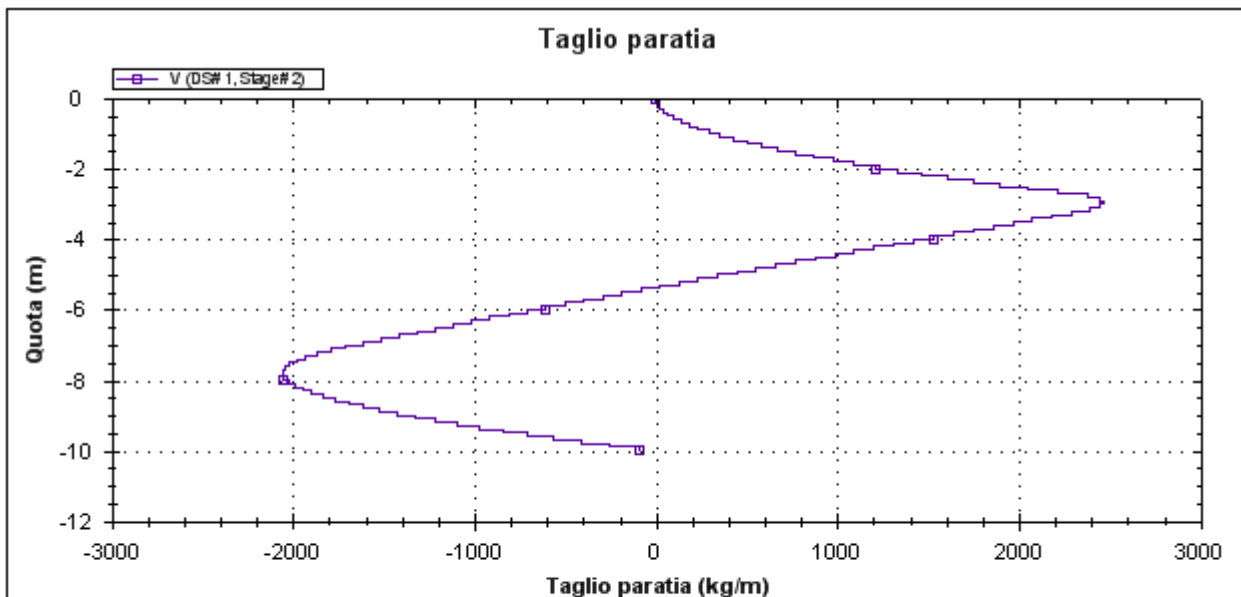
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Engineer: Engineer		Paratie Plus 2010 - DeepXcar 2010
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Company: My Company	DS: 1, Scavo a -2.80 m	CeAS srl and Deep Excavation LCC
Engineer: Engineer		Paratie Plus 2010 - DeepXcar 2010
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Company: My Company	DS: 1, Scavo a -2.80 m	CeAS srl and Deep Excavation LCC
Engineer: Engineer		Paratie Plus 2010 - DeepXcar 2010
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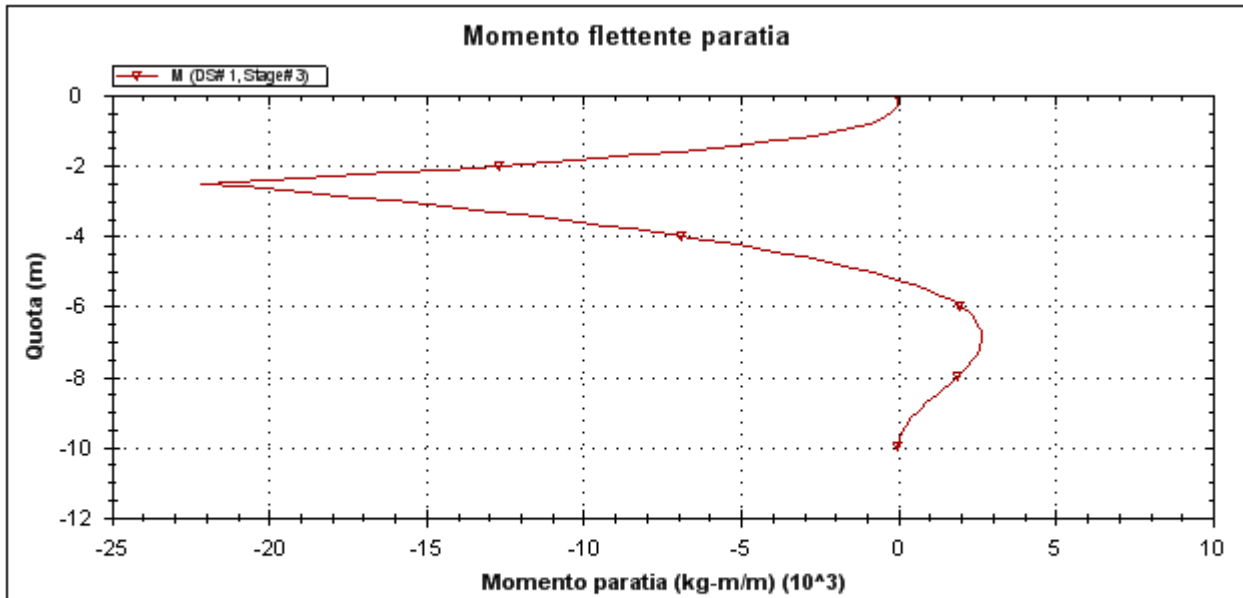
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Engineer: Engineer		Paratie Plus 2010 - DeepXcar 2010
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RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

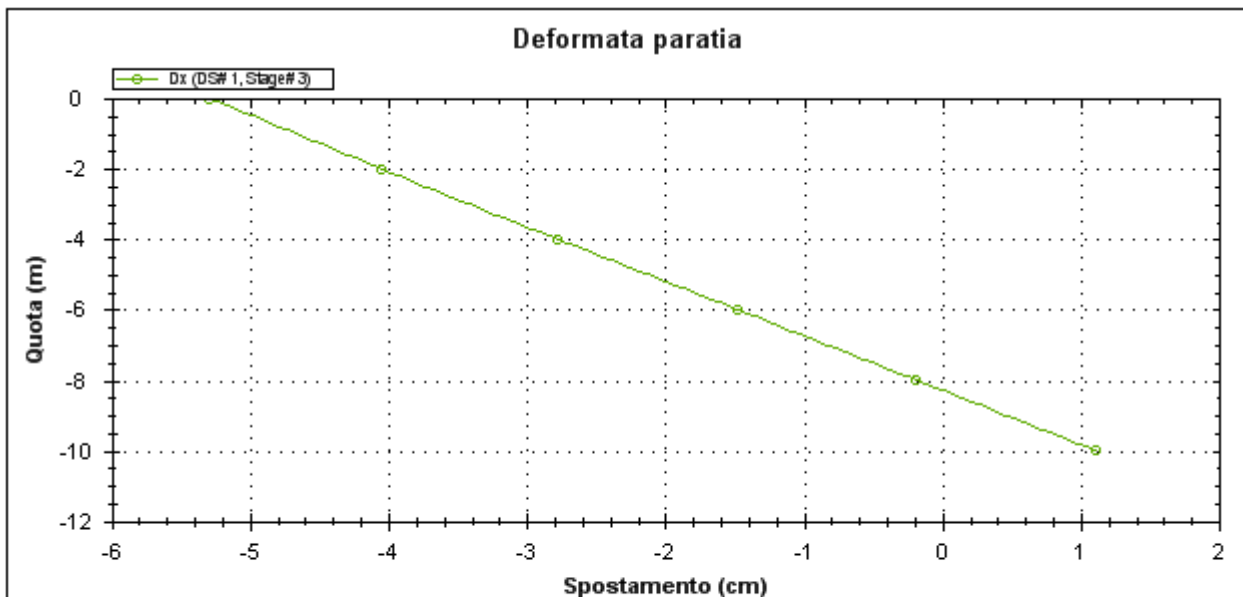
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SS0558_F0.doc

Rev
F0

Data
20/06/2011



Company: My Company	DS: 1, 1 Tirante	CeAS srl and Deep Excavation LCC
Engineer: Engineer		Paratie Plus 2010 - DeepXcar 2010
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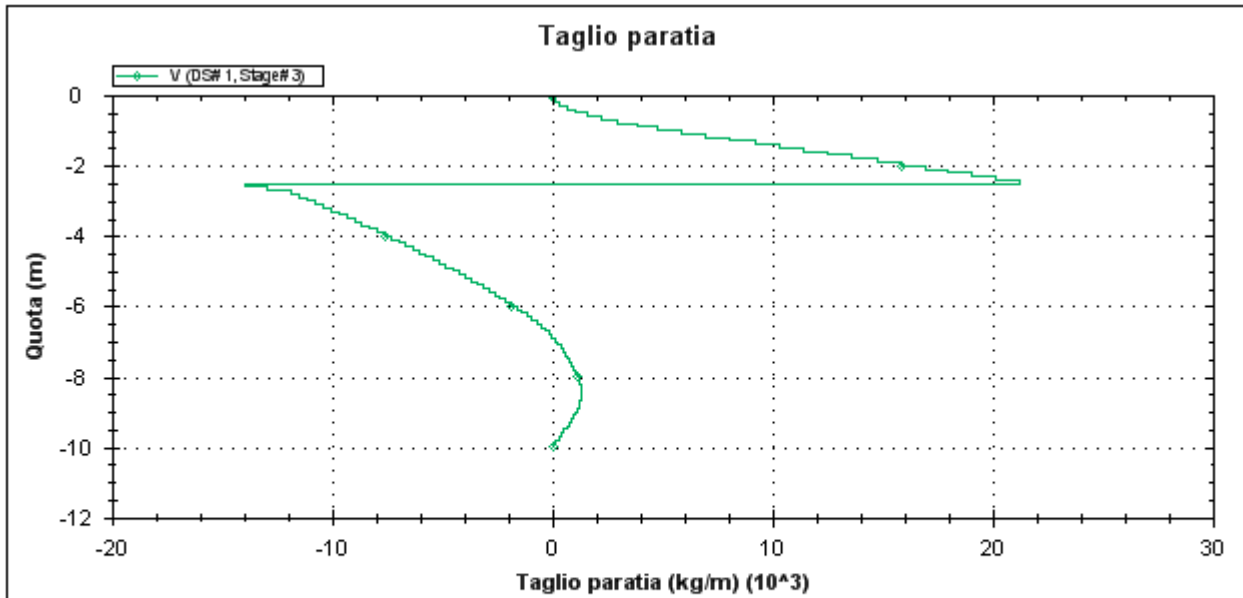
Company: My Company	DS: 1, 1 Tirante	CeAS srl and Deep Excavation LCC
Engineer: Engineer		Paratie Plus 2010 - DeepXcar 2010
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RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

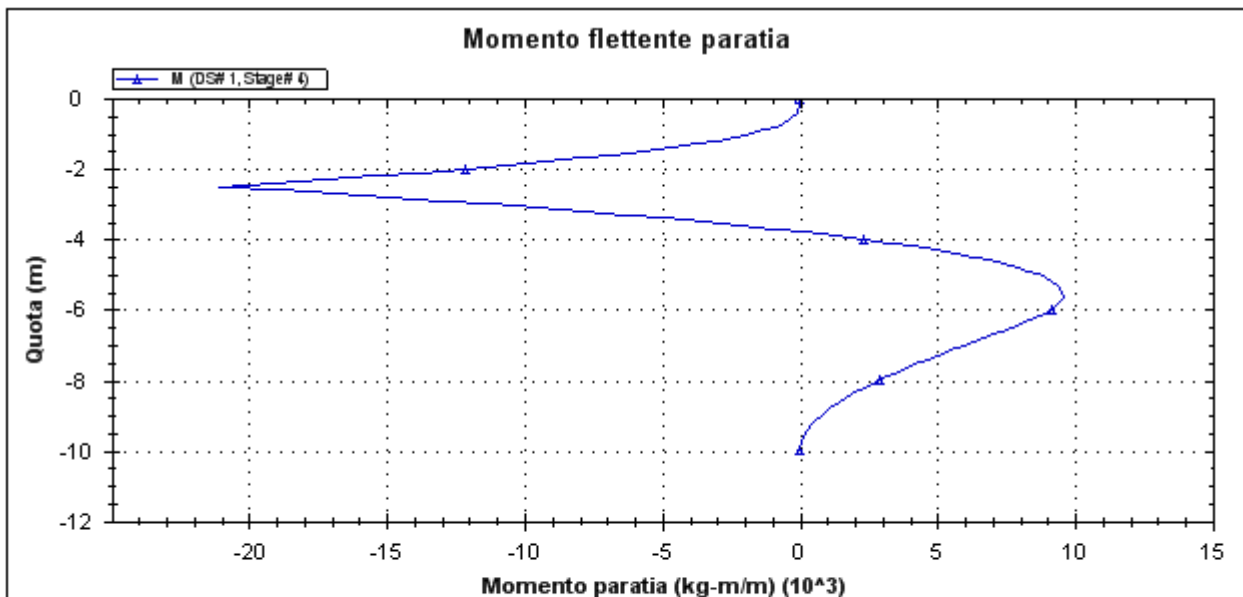
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Rev
F0

Data
20/06/2011



Company: My Company	DS: 1, 1 Tirante	CeAS srl and Deep Excavation LCC
Engineer: Engineer		Paratie Plus 2010 - DeepXcar 2010
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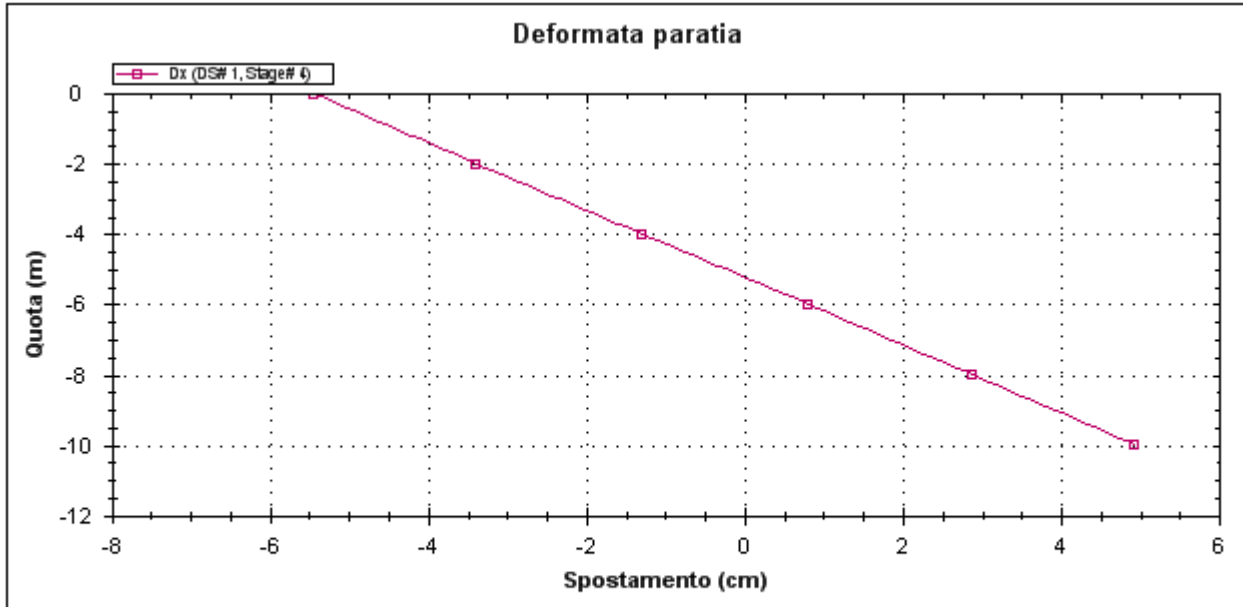
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Engineer: Engineer		Paratie Plus 2010 - DeepXcar 2010
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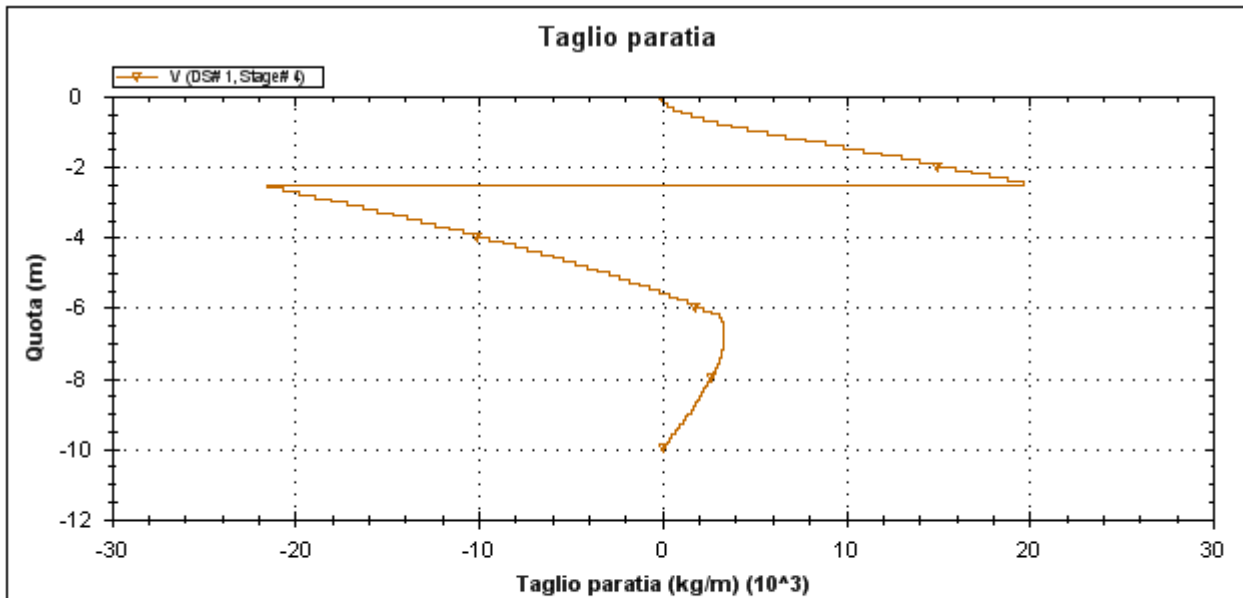
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SS0558_F0.doc

Rev
F0

Data
20/06/2011



Company: My Company	DS: 1, New stage 4	CeAS srl and Deep Excavation LCC
Engineer: Engineer		Paratie Plus 2010 - DeepXcar 2010
C:\Do...ngs\user\Desktop\Paratie\488 Messina\RFI\PALI Un ordine.DEEP		10/26/2010



Company: My Company	DS: 1, New stage 4	CeAS srl and Deep Excavation LCC
Engineer: Engineer		Paratie Plus 2010 - DeepXcar 2010
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		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011

Progetto: PALI RFI
Risultati per la Design Section 2: 0: DM08_ITA:
Comb. 2: A2+M2+R1

APPROCCI DI PROGETTO E FATTORI DI COMBINAZIONE

Scenari di progetto utilizzati (da Normativa o personalizzati) e relativi fattori di combinazione

Stage	Design Code	Design Case	F(tan)	F	F	F	F(pern)	F(temp)	F(pern)	F(temp)	F Earth	F Earth	F GWT	F GWT	F HYD	F HYD	F UPL	F UPL
	Name		fr)	(c')	(Su)	(EQ)	load)	load)	sup)	sup)	(Dstab)	(stab)	(Dstab)	(stab)	(Dstab)	(stab)	(Dstab)	(stab)
0	DM08_ITA	2: A2+M2+R1	1.25	1.25	1.4	0	1	1.3	1.2	1.1	1	1	1	1	1.35	0.9	1	1
1	DM08_ITA	2: A2+M2+R1	1.25	1.25	1.4	0	1	1.3	1.2	1.1	1	1	1	1	1.35	0.9	1	1
2	DM08_ITA	2: A2+M2+R1	1.25	1.25	1.4	0	1	1.3	1.2	1.1	1	1	1	1	1.35	0.9	1	1
3	DM08_ITA	2: A2+M2+R1	1.25	1.25	1.4	0	1	1.3	1.2	1.1	1	1	1	1	1.35	0.9	1	1
4	DM08_ITA	2: A2+M2+R1	1.25	1.25	1.4	0	1	1.3	1.2	1.1	1	1	1	1	1.35	0.9	1	1
5	DM08_ITA	2: A2+M2+R1	1.25	1.25	1.4	0	1	1.3	1.2	1.1	1	1	1	1	1.35	0.9	1	1

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011

Stage=Fase di scavo
Design Code=Codice di verifica
Ftan fr=fattore moltiplicatore tangente angolo di attrito
F C'=fattore moltiplicatore coesione efficace
F Su'=fattore moltiplicatore coesione non drenata
F EQ=fattore moltiplicatore reazione sismica
F perm load=fattore moltiplicatore carichi permanenti
F temp load=fattore moltiplicatore carichi accidentali/variabili
F perm supp=fattore di riduzione resistenza per verifica pull out tirante
F temp supp=fattore di riduzione resistenza per verifica pull out tirante
F earth Dstab=fattore moltiplicatore per spinta attiva nel caso sfavorevole
F earth stab=fattore moltiplicatore per spinta attiva nel caso favorevole
F GWT Dstab (ground water)=fattore moltiplicatore per spinta idrostatica sfavorevole
F GWT stab (ground water)=fattore moltiplicatore per spinta idrostatica favorevole
F HYD Dstab=fattore moltiplicatore per spinta idrodinamica sfavorevole
F HYD stab=fattore moltiplicatore per spinta idrodinamica favorevole
F UPL Dstab=fattore moltiplicatore per sifonamento sfavorevole
F UPL stab=fattore moltiplicatore per sifonamento favorevole

DATI TERRENO

Name	g tot	g dry	Frict	C'	Su	FRp	FRcv	Eload	Eur	kAp	kPp	kAcv	kPcv	Vary	Spring	Color
	(daN/m3)	(daN/m3)	(deg)	(daN/	(daN/	(deg)	(deg)	(daN/m2	(daN/m2	Springs	Springs	Springs	Springs		Model	
Strato1	1900	1900	35	0	N/A	N/A	N/A	200000	600000	0.27	3.69	N/A	N/A	True	Linear	
Strato2	1900	1631.55	38	0	N/A	N/A	N/A	4000000	1200000	0.24	4.2	N/A	N/A	True	Linear	

gtot=peso specifico /totale terreno
gdry=peso secco del terreno
Frict=angolo di attrito di calcolo
C'=coesione efficace
Su = Coesione non drenata, parametro attivo per terreni tipo CLAY in condizioni NON drenate
Dilat=Dilatanza terreno (parametro valido solo in analisi non lineare)
Evc=modulo a compressione vergine molla equivalente terreno
Eur=modulo di scarico/ricarico (fase elastica) molla equivalente terreno
Kap= coefficiente di spinta attiva di picco
Kpp= coefficiente di spinta passiva di picco
Kacv= coefficiente di spinta attiva di picco
Kpcv= coefficiente di spinta passiva di picco
Spring models= modalità di definizione dei moduli di rigidità molle terreno (LIN, EXP, SIMC)
LIN= Lineare-Elastico-Perfettamente plastico
EXP= esponenziale, SUB: Modulo di reazione del sottosuolo
SIMC= Modo semplificato per argille

STRATIGRAFIA TERRENI

Top Elev= quota superiore strato
Soil type=nome del terreno
OCR=rappporto di sovraconsolidazione
K0=coefficiente di spinta a riposo

Name: Boring 1, pos: (-8, 0)

Top elev.	Soil type	OCR	Ko

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011

0	Strato1	1	0.43
-13	Strato2	1	0.38

DATI GENERALI RELATIVI A MATERIALI E PROPRIETA MECCANICHE

Acciaio

Name	Strength Fy	Fu	Elastic E	Density g
	(daN/cm ²)	(daN/cm ²)	(daN/cm ²)	(daN/m ³)
S355	3620	5200.6	2100615.4	7851.8148

Calcestruzzo

Name	Strength Fc'	Elastic E	Density g	Tension Strength Ft
	(daN/cm ²)	(daN/cm ²)	(daN/m ³)	(daN/cm ²)
C25/30	254.9	320965.9	2549.291	10

Barre in acciaio

Name	Strength Fy	Elastic E
	(daN/cm ²)	(daN/cm ²)
S1862 (Strands)	18987.1	2141404
B450C	4588.7	2141404

Legno

Name	Ultimate Bending Strength Fbu	Ultimate Tensile Strength Ft _u	Ultimate Shear Strength Fvu	Density g	Elastic E
	(daN/cm ²)	(daN/cm ²)	(daN/cm ²)	(daN/m ³)	(daN/cm ²)
Regular grade	70.4	70.4	41.8	801.2522	56288.3

STEEL=acciaio

Name=nome materiale

strength fy=fyk=res caratteristica acciaio

Fu=fuk=resistenza ultima

Elastic E=modulo elastico

Density g=peso specifico

CONCRETE=calcestruzzo

Name=nome materiale

f'c=fck=resistenza cilindrica a compressione caratteristica cls

Elastic E=modulo elastico

Density g=peso specifico

Tension strength=ft=fctk=resistenza a trazione caratteristica

STEEL REBAR

Name=nome materiale

strength fy=fyk=resistenza caratteristica acciaio

Elastic E=modulo elastico

WOOD=legno

Name=nome materiale

Ultimate bending strength Fb=fbk=resistenza caratteristica a flessione

Ultimate tensile strength Ft_u=ftuk=res caratt. parallela alle fibre

Ultimate shear strength Fvu=fvuk=res. caratt. a taglio

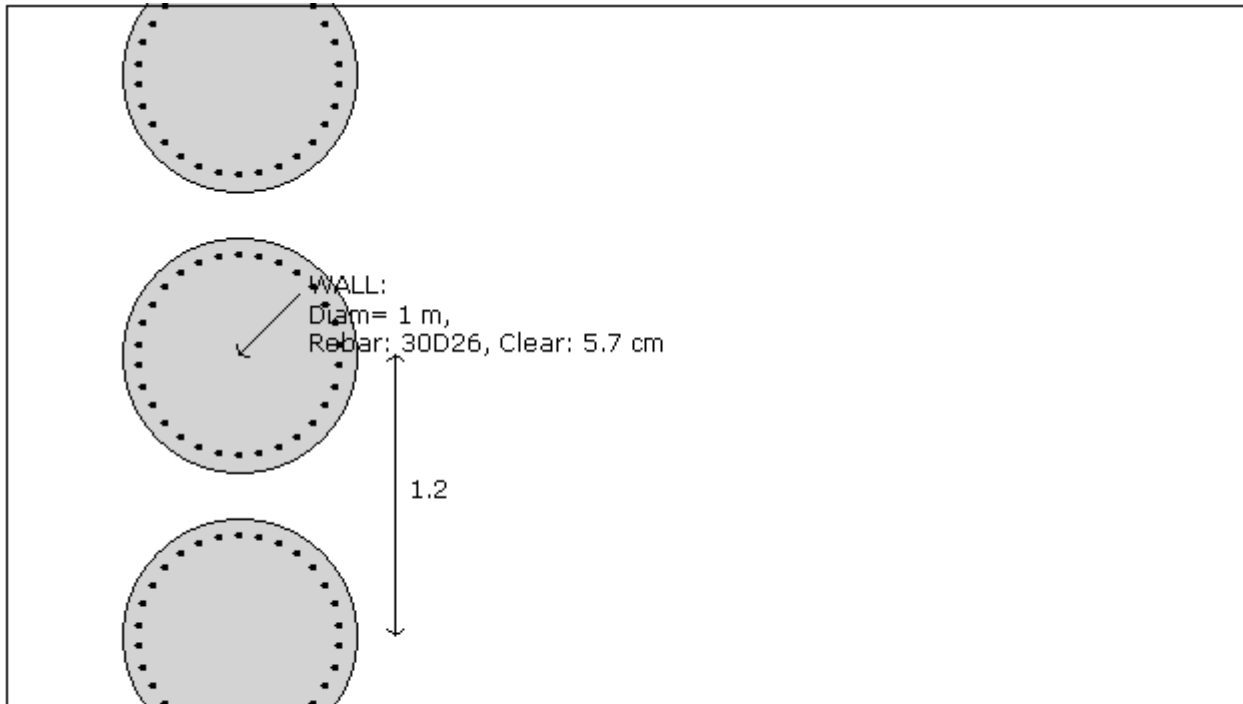
Density g=peso specifico

Elastic E=modulo elastico

DATI PARATIE

Sezione paratia0: Berlinese Sx

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011



Company: My Company	Wall sketch	CeAS srl and Deep Excavation LCC
Engineer: Engineer		Paratie Plus 2010 - DeepXcar 2010
C:\Do...ngs\user\Desktop\Paratie\488 Messina\RFI\PALI Un ordine.DEEP		10/26/2010

Wall uses wall section0: PALI 1000

Tipo paratia: Pali tangenti: pali in calcestruzzo armato

Quota sommita' paratia: 0 m Quota piede paratia: -10 m

Dimensione fuori piano paratia: 1.2 Spessore paratia = 1

Ampiezza zona spinta passiva al di sotto del piano di scavo: 0.43 Ampiezza zona spinta attiva al di sotto del piano di

fc' cls = 254.9 Fy barre = 4588.7 Ecls = 320965.9 FcT calcestruzzo a trazione = 10% di Fc'

fy profilati in acciaio = 3620 Eacciaio = 2100615.4

Attrito paratia: % attrito terreno = 50%

Le capacita' paratie in acciaio sono calcolate con NTC 2008

Le capacita' paratie in calcestruzzo sono calcolate con ACI 318-2002.

Nota: con la capacita' ultima si dovrebbe adottare un fattore di sicurezza strutturale.

Proprieta' paratie di pali tangenti

Concrete section type: Rectangular

Section dimensions

D = 100 m B = 100 m A = 7853.98163397448 cm² Ixx = 4908738.52123405 cm⁴

Longitudinal reinforcement

Top rebars: N = 30 bars #D26 = AsTop 159.27 cm², Ctop = 7 m

Bottom rebars: N = 30 bars #D25 = AsBot NaN cm², Cbot = 7 m

Shear reinforcements

Bar #D10 = As 0.785 cm², sV = 12 m, sH = 25 m

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO	
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD	<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011

DATI GENERALI PARATIA

Hor wall spacing=interasse tra pannelli

passive width below exc=larghezza di riferimento per calcolo zona passiva per analisi classica

concrete $f'c=fck$ =res cilindrica caratteristica cls

Rebar $f_y=fyk$ =res caratteristica acciaio armature

Econc=modulo elastico cls

Concrete tension $f_{ct}=f_{ctk}$ =resistenza caratteristica a trazione cls

Steel members $f_y=fyk$ =res caratteristica acciaio

Esteel=modulo elastico acciaio

DATI TABELLATI (si omette la spiegazione dei parametri già descritti in precedenza)

1) Diaphragm wall=sezione rettangolare in CA

N/A= il valore non è disponibile in quanto non correlato al tipo di sezione in uso

$F_y=fyk$

$F'c=fck$

D=altezza paratia

B=base paratia

tf=spessore

2) Steel sheet pile=palancolata

DES=tipo di palancolata

Shape=forma

W=peso per unità di lunghezza

A=area

h=altezza

t=spessore lamiera orizzontale

b=base singolo elemento a Z o U

s=spessore lati obliqui

I_{xx} =inerzia asse principale palancolata (per unità di lunghezza)

S_{xx} =modulo di resistenza asse principale palancolata (per unità di lunghezza)

3) Secant pile wall (pali allineati e sovrapposti), Tangent pile wall=pali allineati (Berlinesi, micropali), soldier pile (pali in acciaio con collegamento in cls), soldier pile and timber lagging (pali in acciaio con collegamento con elementi in legno)

W=peso per unità di lunghezza

A=area

D=diametro

tw o tp=spessore dell'anima (sezione a I) o del tubo (sezione circolare)

bf=larghezza della sezione

tf=spessore dell'ala

k=altezza flangia + altezza raccordo

I_{xx} =inerzia rispetto asse orizzontale (per unità di lunghezza)

S_{xx} =modulo di resistenza rispetto asse orizzontale (per unità di lunghezza)

r_x =raggio giratore d'inerzia lungo x

I_{yy} =inerzia rispetto asse verticale (per unità di lunghezza)

S_{yy} =modulo di resistenza rispetto asse verticale (per unità di lunghezza)

r_y =raggio giratore d'inerzia lungo y

C_w =costante di ingobbamento

$f_y=fyk$

DATI VINCOLI, TIRANTI, PUNTONI, ECC

Support 0: type = tieback

X = 1 m, Z = -2.5 m, S = 1.2 m

Lfree = 5 m, Lfix = 15 m, Rfix = 80 %

Walls: Berlinese Sx

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011

Stage No	Active	Prestress	Slab live load	User add. strain
	Si'/No	(daN)	(daN/m2)	+expansion
0	No	-	-	-
1	No	-	-	-
2	No	-	-	-
3	Si'	45000	-	-
4	Si'	45000	-	-
5	Si'	45000	-	-

Support type= tipo di vincolo

Tieback=tirante

Strut=puntone

Raker=Sbadacchio

LEGENDA PER TIRANTI

Dati generali

Z=quota vincolo

S=interasse in direzione orizzontale

Lfree=lunghezza tratto elastico

Lfix=lunghezza tratto rigido

Rfix=% sfruttamento tratto rigido

Stage No=numero step di scavo

Active=stato tirante (YES=attivo)

Post stress= precarico tirante (carico moltiplicato per interasse)

Walls= indica il nome della paratia alla quale il vincolo è applicato

Nel caso di solette indica il punto di partenza e cioè la paratia di sinistra

PARAMETRI DI CALCOLO PER SINGOLA FASE

Summary of stage assumptions

Name	Analysis	Drive	ka-Mult	Htr T/B	Resist	Res	Contle	Suppor	Axial	Used	Min	Toe	Toe
	Method	Press		(%)	Press	Mult	Metho	Model	Incl	FSwall	FDtoe	FSrot	FSpas
Stage 0	Springs-Up	Ka	N/A	N/A	Kp+ d	N/A		Fixed	N/A	1	0	0	0
Stage 1	Springs-Up	Ka	N/A	N/A	Kp+ d	N/A		Fixed	N/A	1	0	0	0
Stage 2	Springs-Up	Ka	N/A	N/A	Kp+ d	N/A		Fixed	N/A	1	0	0	0
Stage 3	Springs-Up	Ka	N/A	N/A	Kp+ d	N/A		Fixed	N/A	1	0	0	0
Stage 4	Springs-Up	Ka	N/A	N/A	Kp+ d	N/A		Fixed	N/A	1	0	0	0
Stage 5	Springs-Up	Ka	N/A	N/A	Kp+ d	N/A		Fixed	N/A	1	0	0	0

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011

Name=nome fase

Analysis method=metodo di calcolo

- CONventional=analisi all'equilibriolimitate
- springs UP=analisi non lineare (schema a molle elasto plastiche)
- DR=analisi per terreni tipo argilla in condizione drenata
- U=analisi per terreni tipo argilla in condizione NON drenata
- Up=analisi non drenata solo per i terreni selezionati

Drive press=Ka=spinta terreno attiva

ka mult=eventuale moltiplicatore Ka

Htr T/B (%)=schema pressione attiva di tipo trapezoidale

Resit press=Kp=spinta terreno passiva

Res Mult=eventuale moltiplicatore Kp

COntle Method=

Support Model=tipologia vincoli fissi (fixed=fissi)

Axial Incl=se azione assiale inclusa

Used FS wall=coeff di riduzione dominio MN

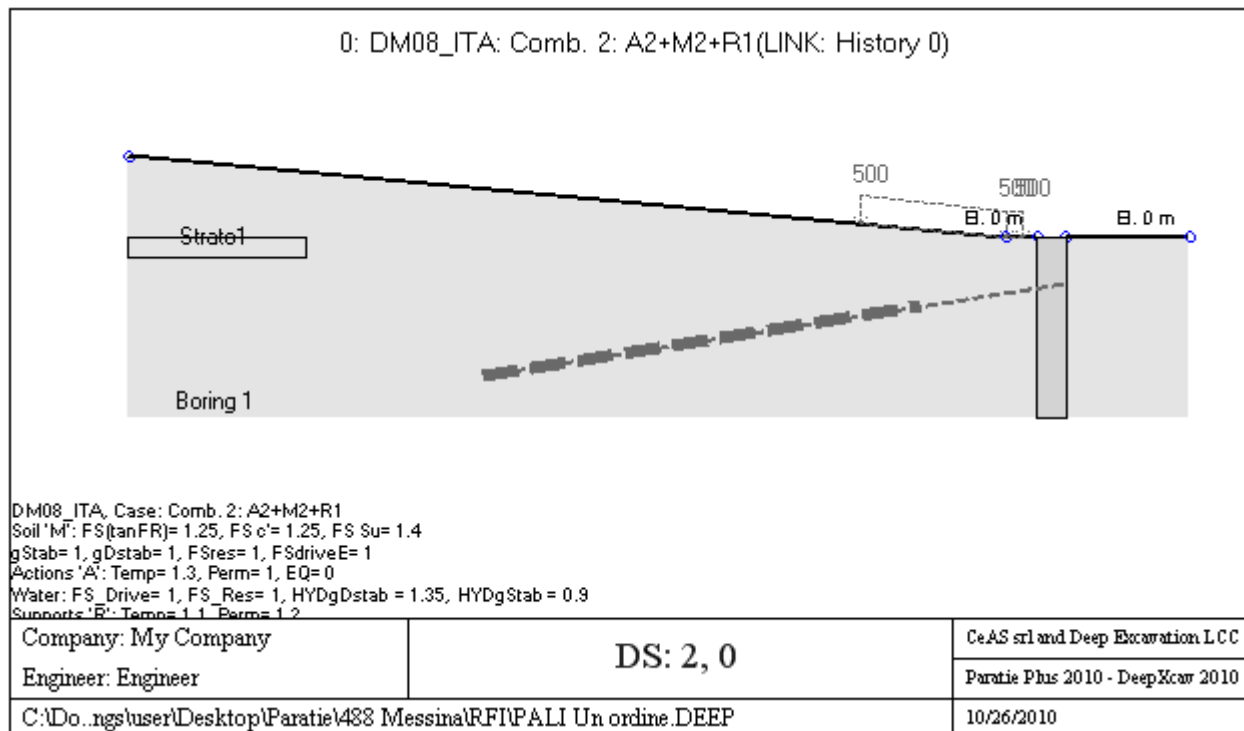
Min FD TOe=sicurezza minima per infissione (analisi classica)

Toe FS rot=sicurezza a rotazione (analisi classica)

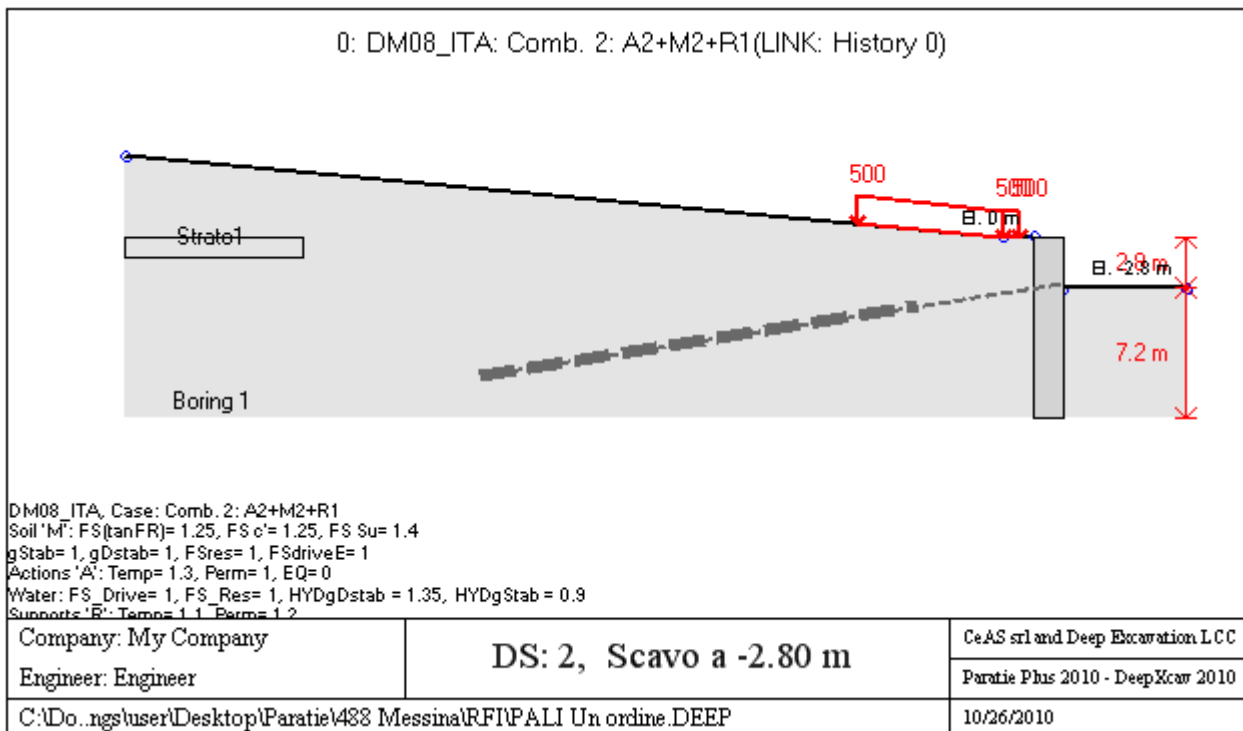
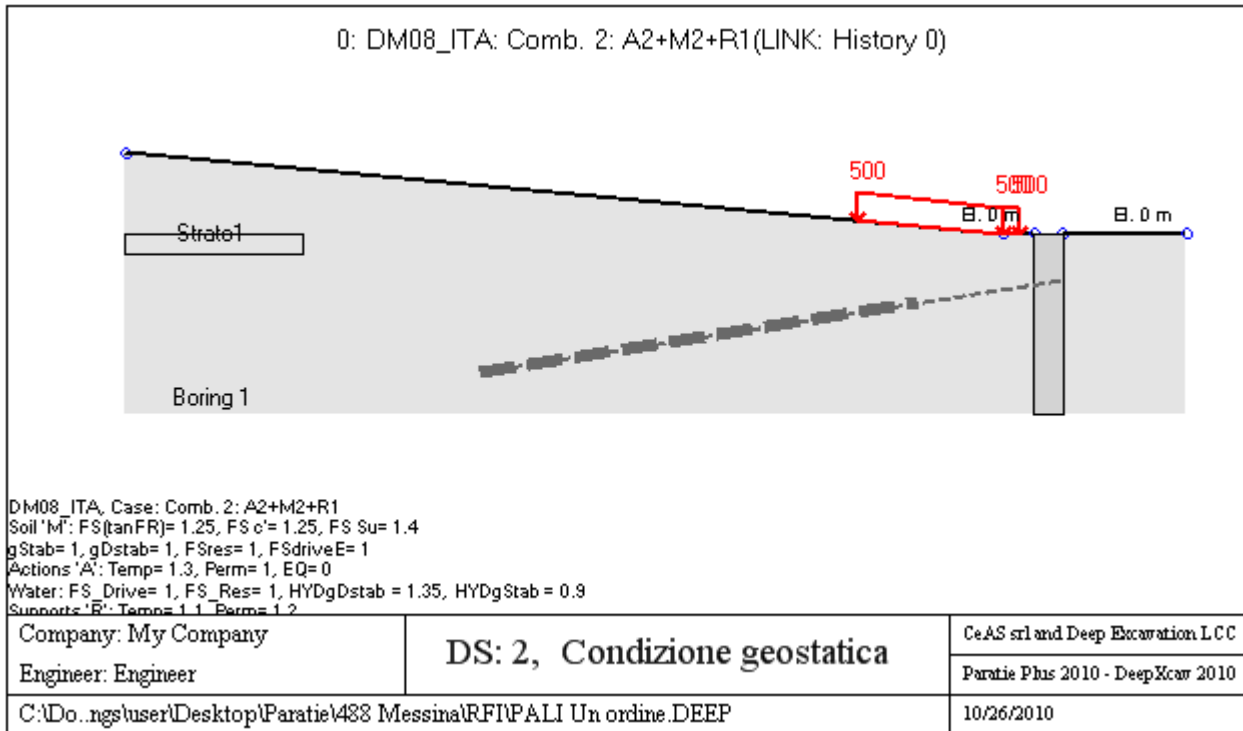
Toe FSpas=sicurezza sulle pressioni agenti/resistenti (analisi classica)

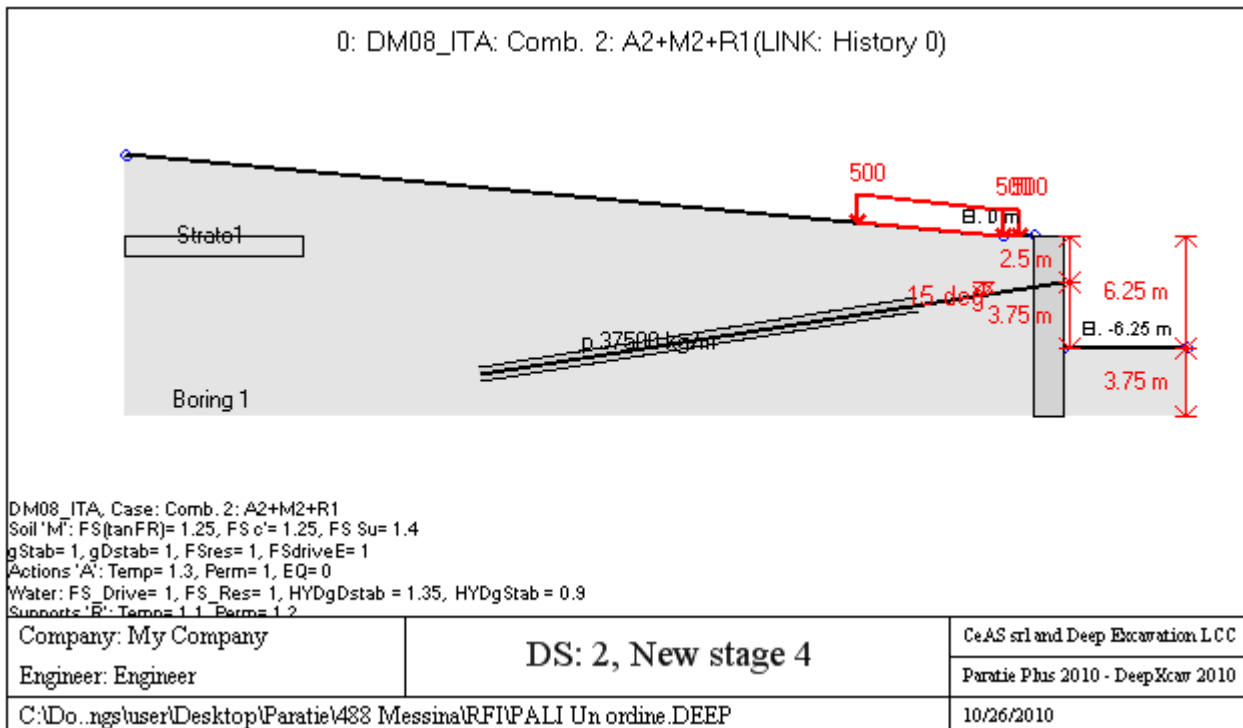
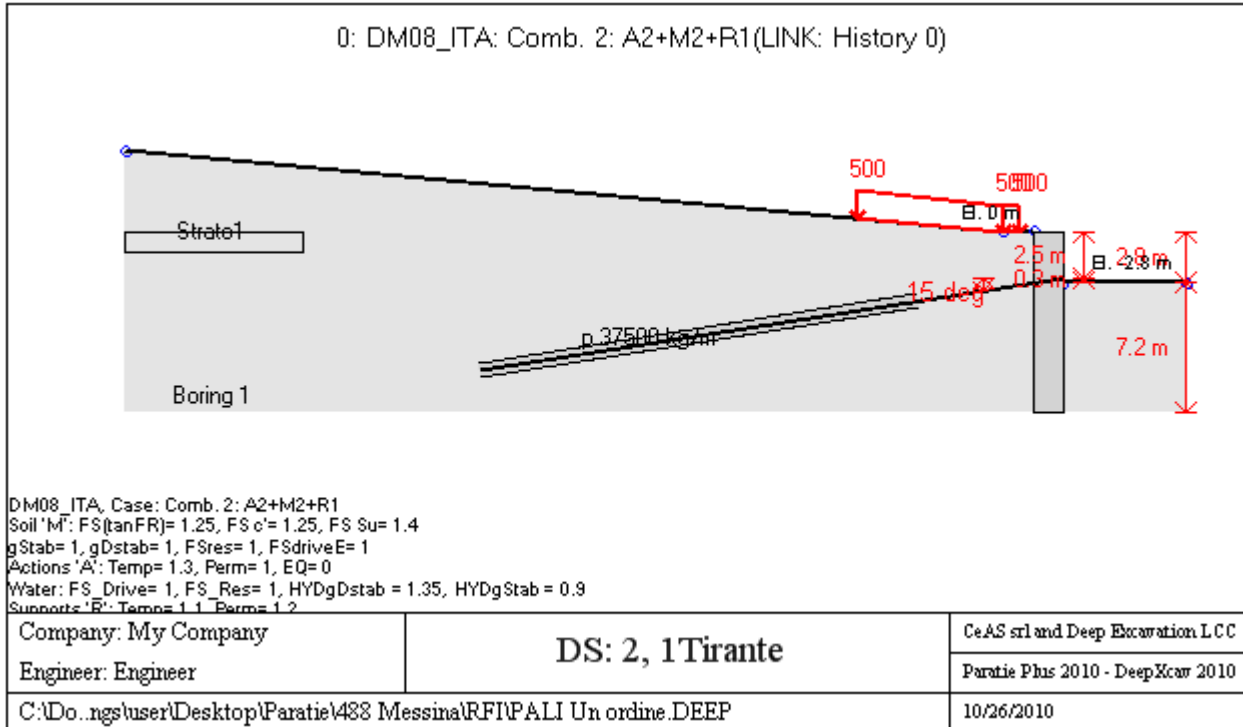
GRAFICI FASI DI SCAVO

Di seguito si riportano gli schemi grafici delle fasi di scavo principali.



RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD	Codice documento	Rev	Data
	SS0558_F0.doc	F0	20/06/2011





Stabilita' del piede

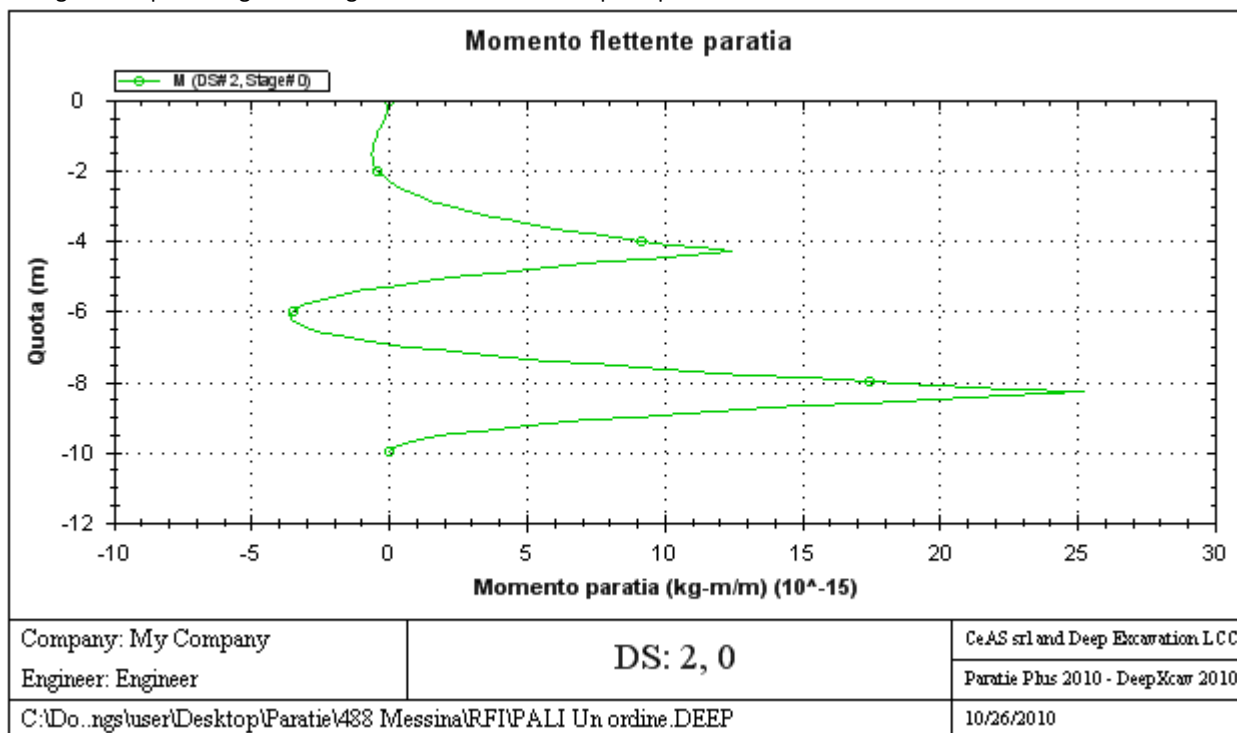
		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
		RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD	<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0

Embedment FS vs Stage

	Min Toe FS	FS1 Passive	FS2 Rotation	FS3 Length (from FS1, FS2)	FS4 Mobilized Passive	FS5 Actual Drive Thrust / Theory
Stage #0	N/A	N/A	N/A	N/A	7.986	1.46
Stage #1	N/A	N/A	N/A	N/A	7.946	1.467
Stage #2	N/A	N/A	N/A	N/A	4.209	1.275
Stage #3	N/A	N/A	N/A	N/A	6.87	2.546
Stage #4	N/A	N/A	N/A	N/A	1.742	2.022
Stage #5	N/A	N/A	N/A	N/A	1.742	2.022

GRAFICI FASI DI SCAVO

Di seguito si riportano gli schemi grafici delle fasi di scavo principali.

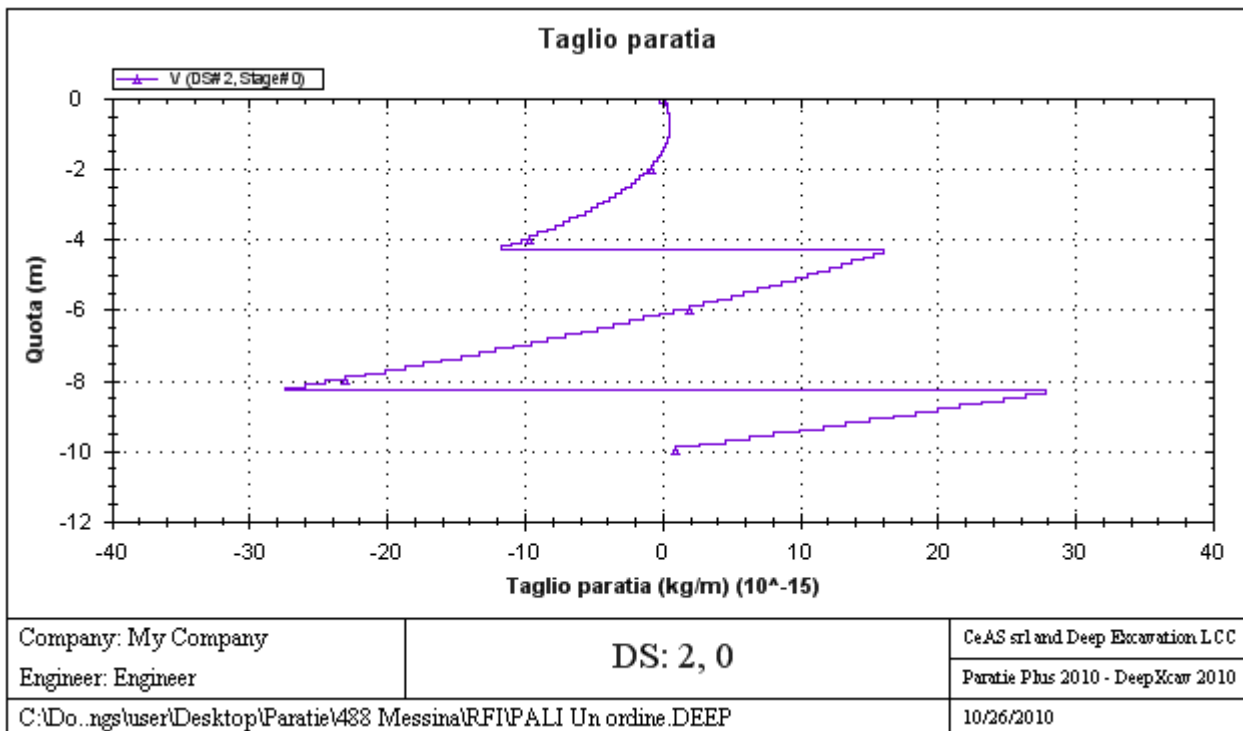
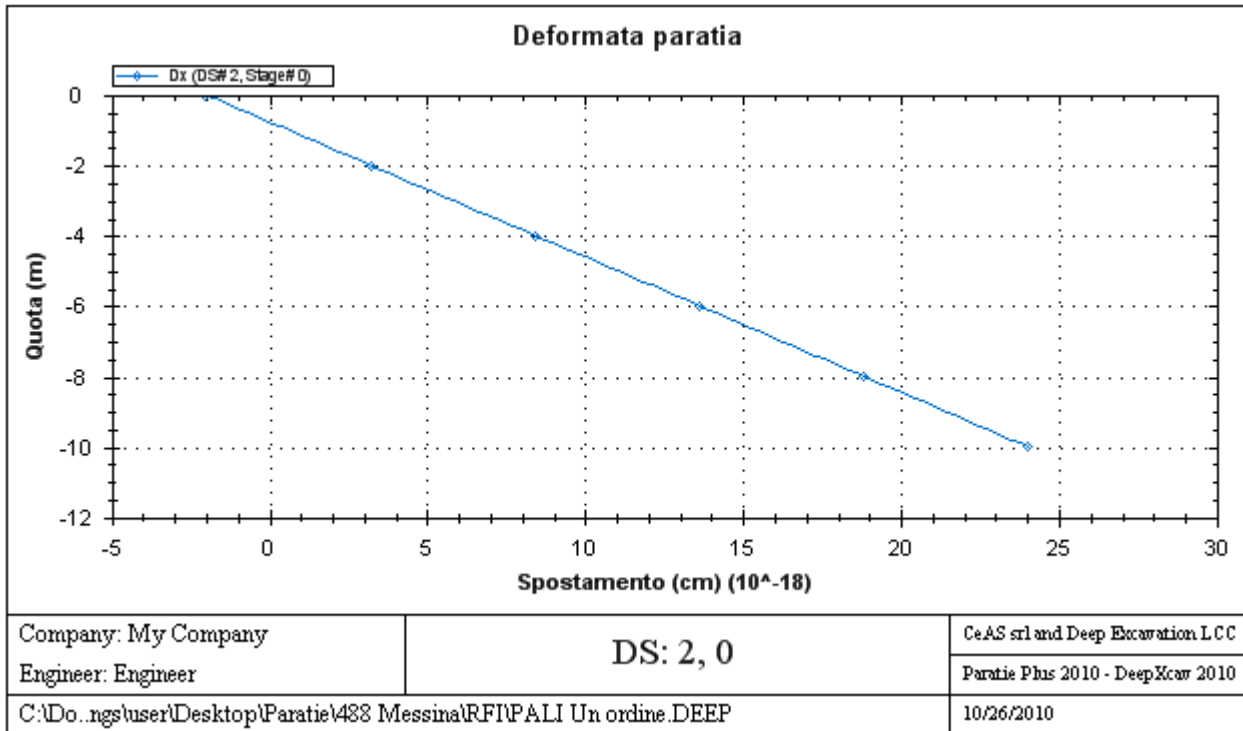


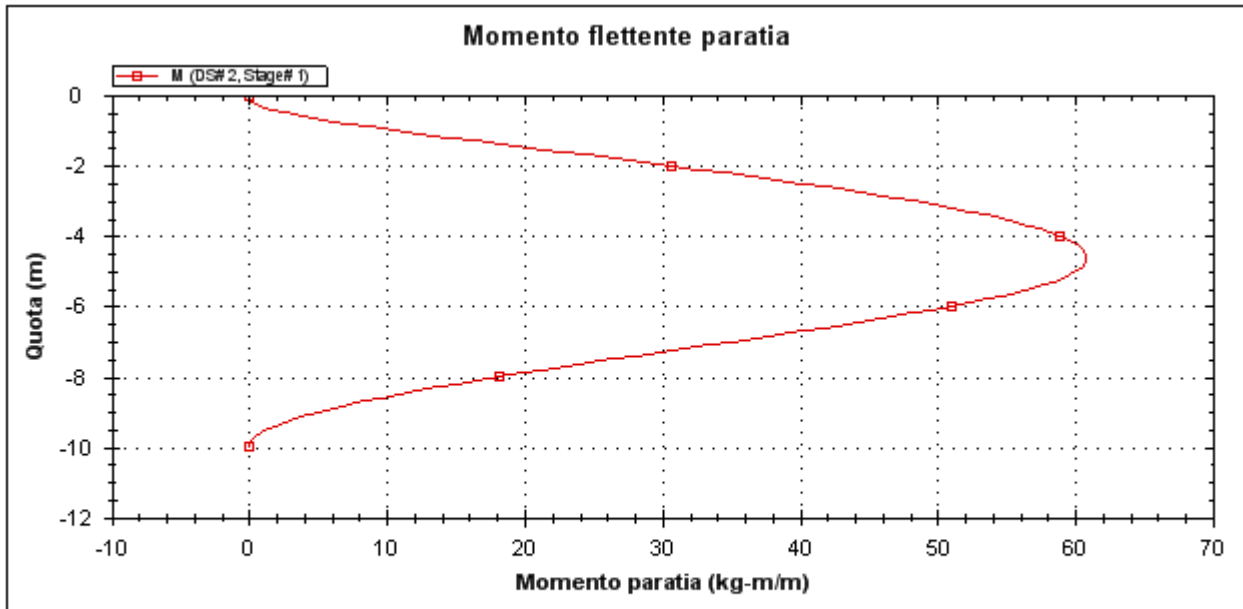
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

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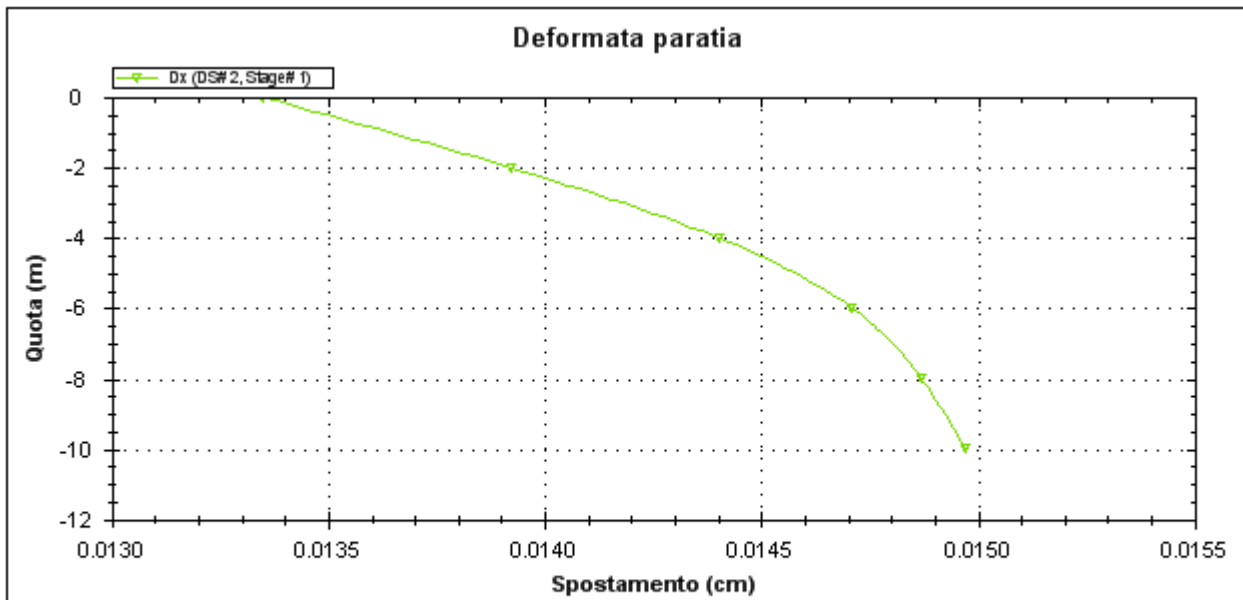
Rev
F0

Data
20/06/2011





Company: My Company Engineer: Engineer	DS: 2, Condizione geostatica	CeAS srl and Deep Excavation LCC Paratie Plus 2010 - DeepXcar 2010
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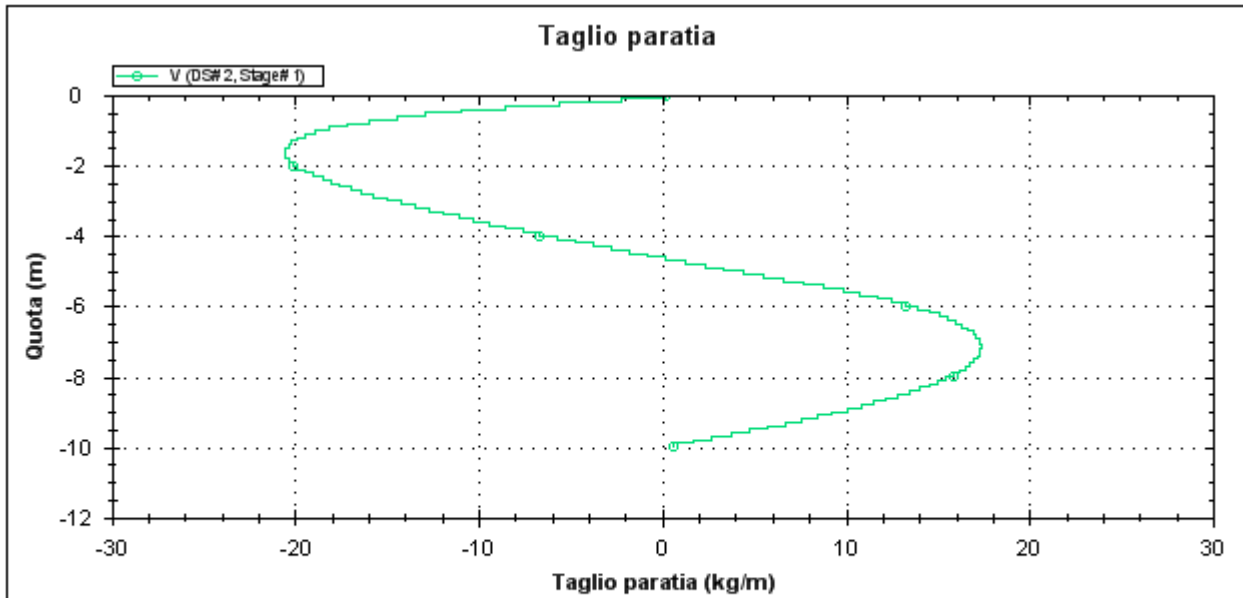
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RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

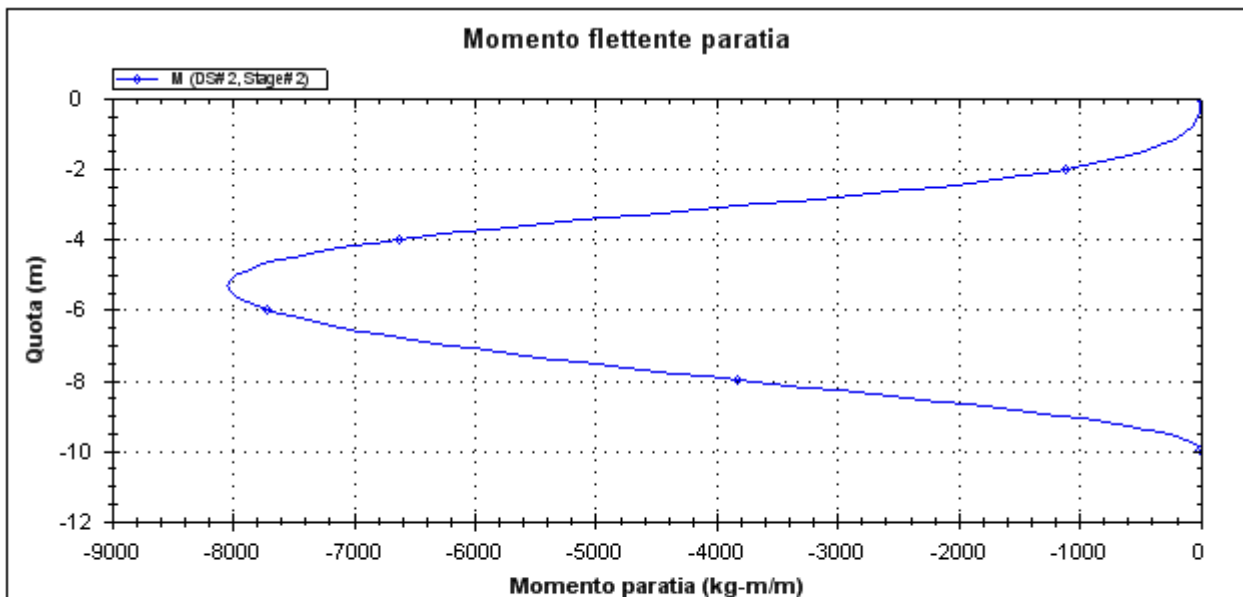
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SS0558_F0.doc

Rev
F0

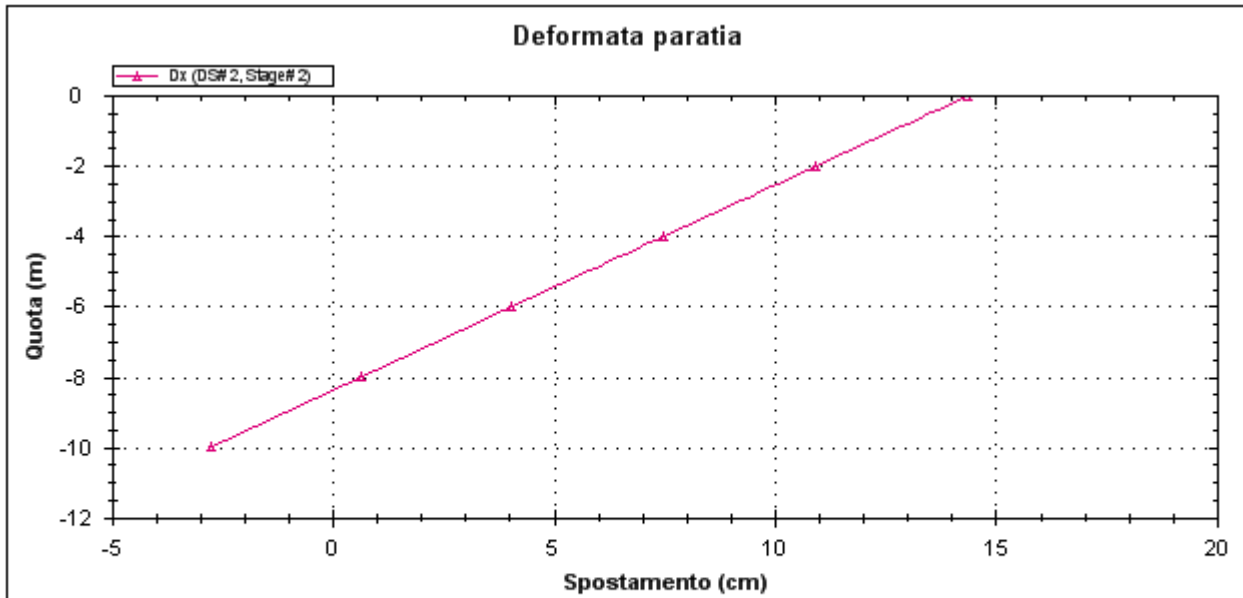
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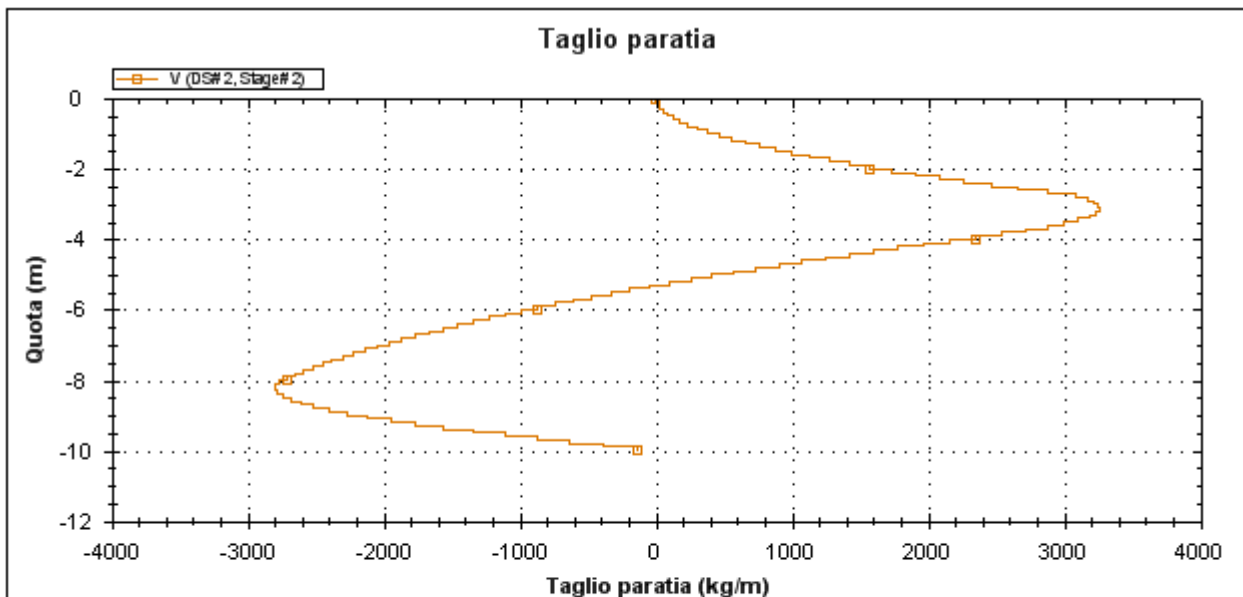
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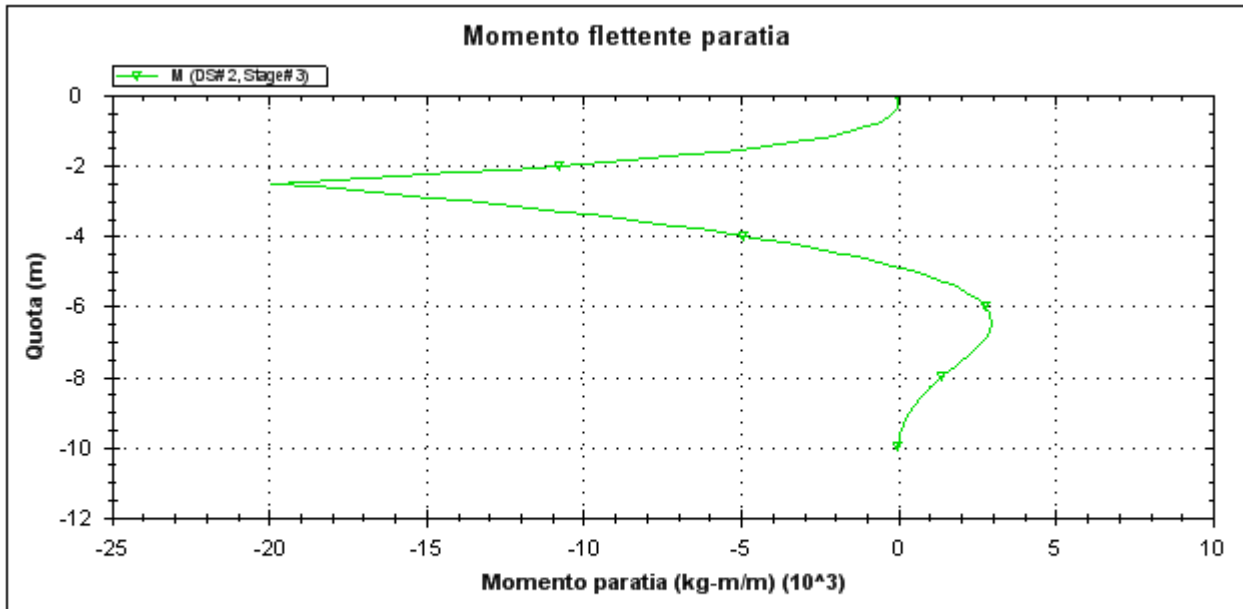
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Engineer: Engineer		Paratie Plus 2010 - DeepXcar 2010
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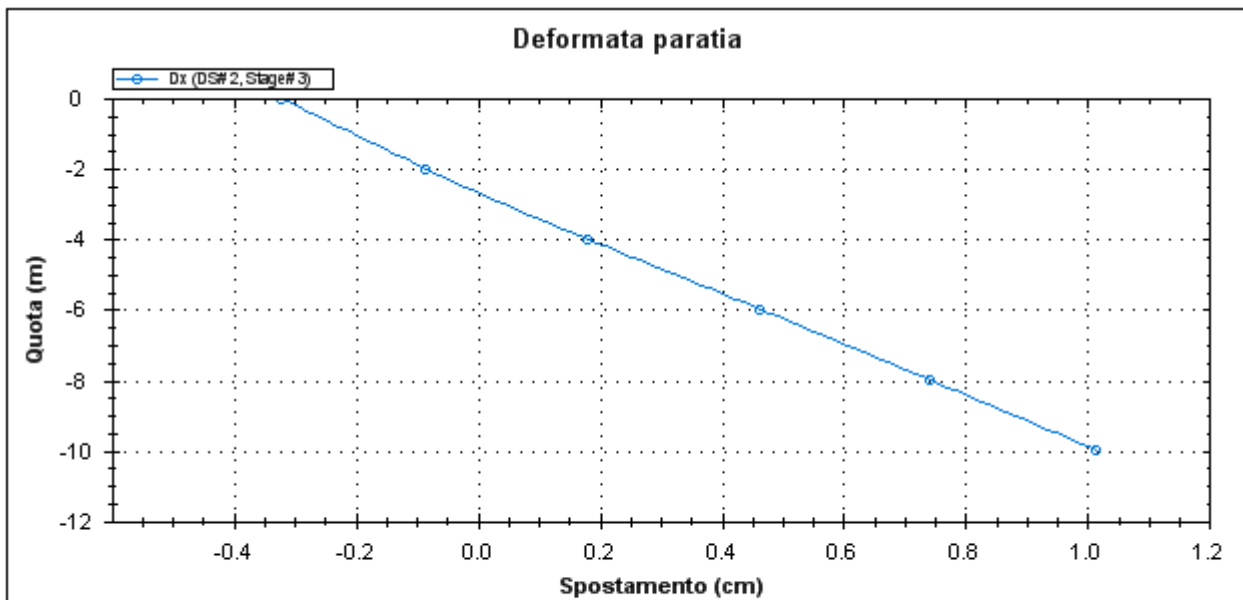
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Engineer: Engineer		Paratie Plus 2010 - DeepXcar 2010
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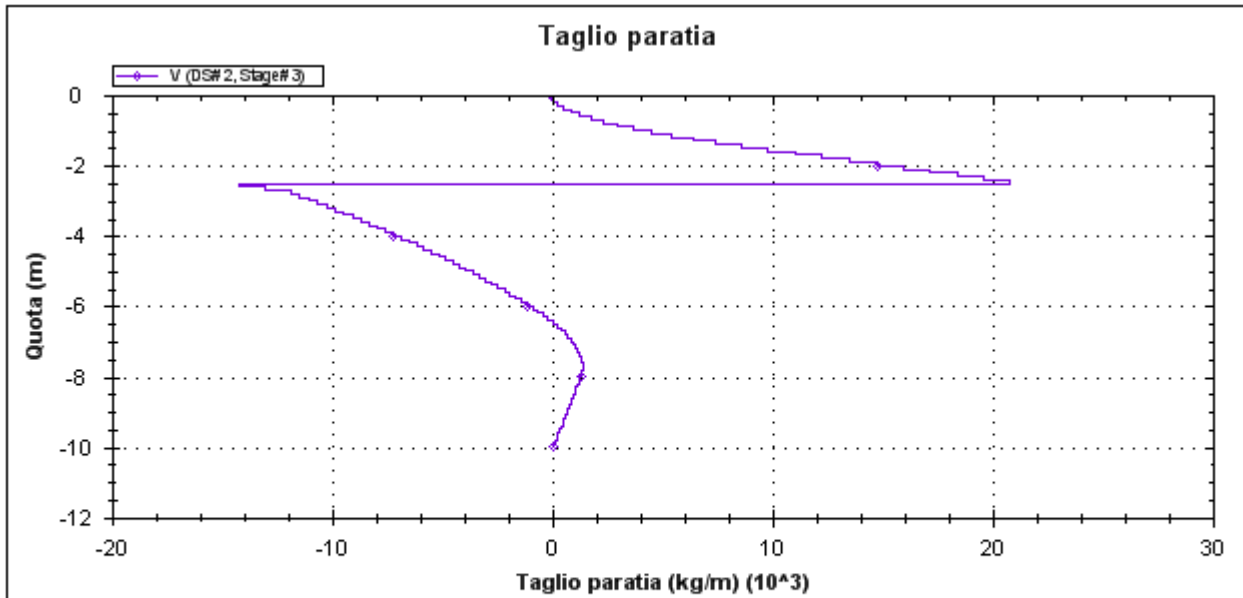
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Engineer: Engineer		Paratie Plus 2010 - DeepXcar 2010
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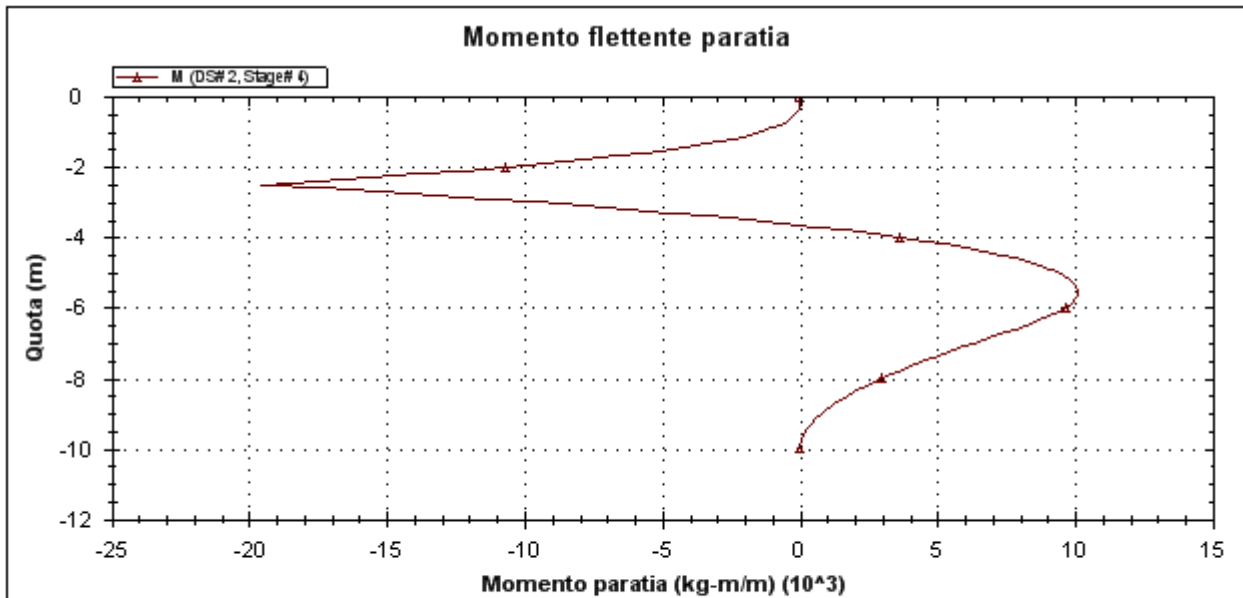
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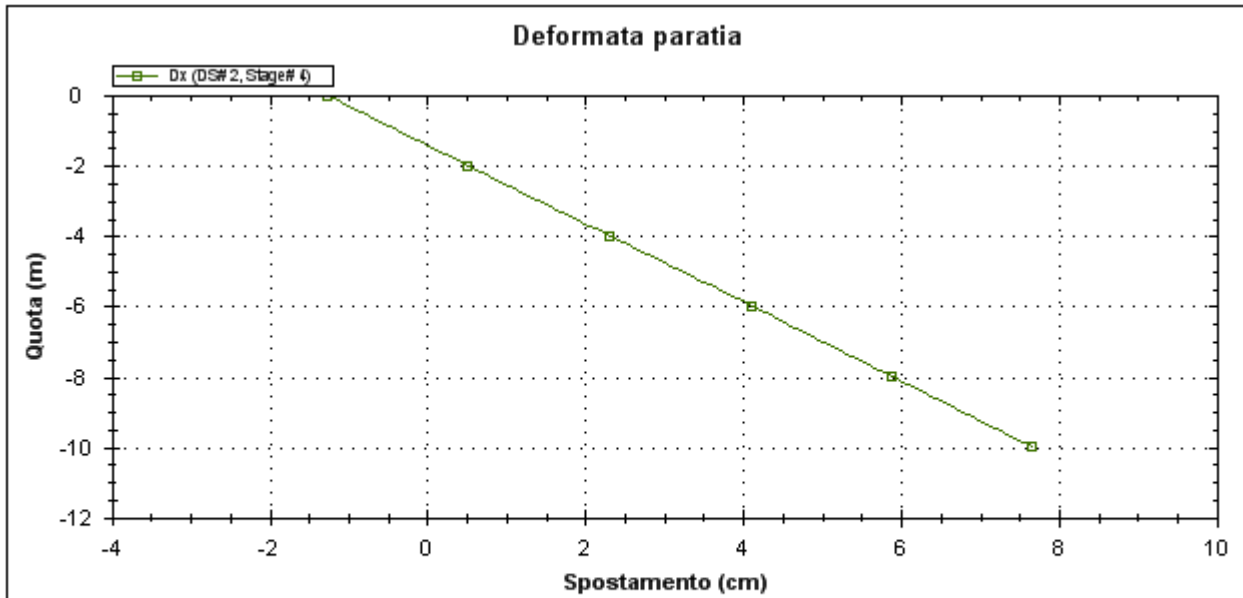
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Engineer: Engineer		Paratie Plus 2010 - DeepXcar 2010
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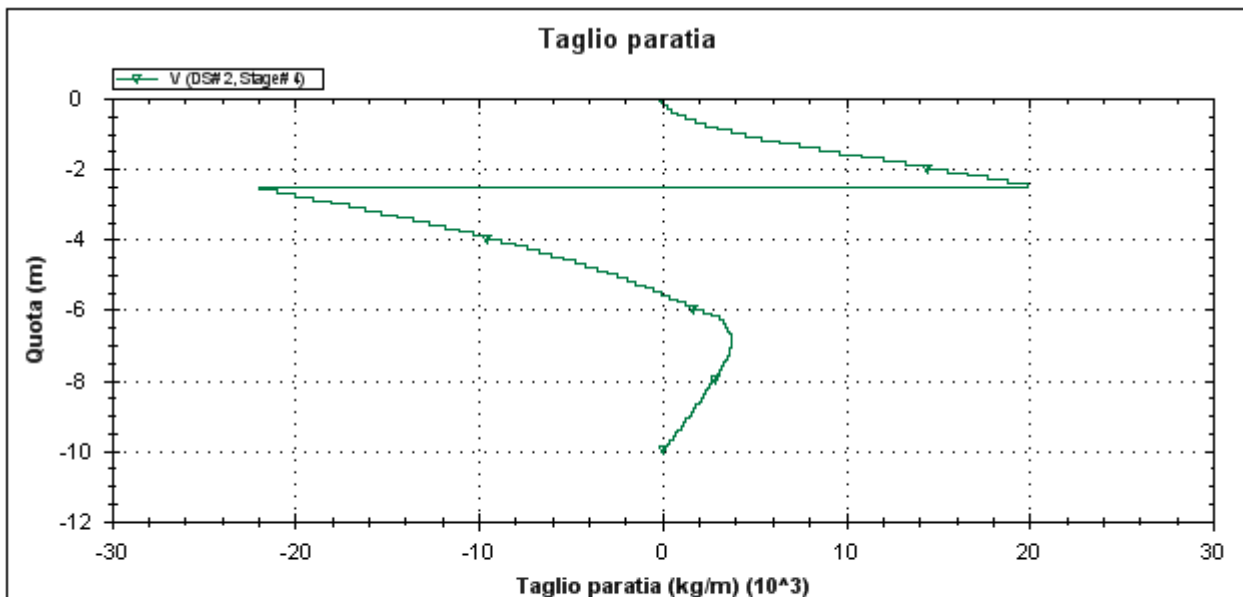
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Engineer: Engineer		Paratie Plus 2010 - DeepXcar 2010
C:\Do...ngs\user\Desktop\Paratie\488 Messina\RFI\PALI Un ordine.DEEP		10/26/2010



Company: My Company	DS: 2, New stage 4	CeAS srl and Deep Excavation LCC
Engineer: Engineer		Paratie Plus 2010 - DeepXcar 2010
C:\Do...ngs\user\Desktop\Paratie\488 Messina\RFI\PALI Un ordine.DEEP		10/26/2010



Company: My Company	DS: 2, New stage 4	CeAS srl and Deep Excavation LCC
Engineer: Engineer		Paratie Plus 2010 - DeepXcar 2010
C:\Do...ngs\user\Desktop\Paratie\488 Messina\RFI\PALI Un ordine.DEEP		10/26/2010



Company: My Company	DS: 2, New stage 4	CeAS srl and Deep Excavation LCC
Engineer: Engineer		Paratie Plus 2010 - DeepXcar 2010
C:\Do...ngs\user\Desktop\Paratie\488 Messina\RFI\PALI Un ordine.DEEP		10/26/2010

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO					
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<table border="1" style="width: 100%; border-collapse: collapse;"> <tr> <td style="width: 50%;"><i>Rev</i></td> <td style="width: 50%;"><i>Data</i></td> </tr> <tr> <td>F0</td> <td>20/06/2011</td> </tr> </table>	<i>Rev</i>	<i>Data</i>	F0	20/06/2011
<i>Rev</i>	<i>Data</i>						
F0	20/06/2011						

9.1.1 VERIFICHE

Viene di seguito riportato un tabulato riassuntivo delle sollecitazioni calcolate.

	0: DM08_ITA: EQK - Seismic	0: DM08_ITA: Comb. 2:	0: DM08_ITA: Comb. 1:	Risultati analisi
	Calculation e1innacefi.il	Calculation e1innacefi.il	Calculation e1innacefi.il	
	13.77	14.39	5.98	Spostamento paratia (cm)
	2.78	2.34	1.6	Cedimenti (cm)
	28791	19950	22178	Momento paratia (daN-m/m)
	34549.2	23940	26613.6	Momento paratia (daN-m)
	29170	21976	21504	Taglio paratia (daN/m)
	35004	26371.2	25804.8	Taglio paratia (daN)
	0.153	0.106	0.118	TSF Comb.paratia
	0.153	0.106	0.118	TSF M+N paratia
	0.904	0.681	0.666	TSF V paratia
	58842	44450	43626	Max. reazione vincoli
	70610.4	53340	52351.2	Max. reazione vincoli (daN)
	0.612	0.462	0.454	Verifica vincoli
	0.612	0.462	0.454	TSF vincoli
	0.516	0.39	0.295	TSF sfilamento tirante
	3.22	3.22	4.026	FS fondo scavo
	1.47	1.742	3.034	FS % passiva mobilitata
	1.266	1.275	1.457	Vera/Attiva (analisi NL)

Si procede quindi andando a verificare i pali nei confronti delle massime sollecitazioni flessionali e taglianti.

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO					
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<table border="1" style="width: 100%; border-collapse: collapse;"> <thead> <tr> <th style="text-align: left;"><i>Rev</i></th> <th style="text-align: left;"><i>Data</i></th> </tr> </thead> <tbody> <tr> <td style="text-align: center;">F0</td> <td style="text-align: center;">20/06/2011</td> </tr> </tbody> </table>	<i>Rev</i>	<i>Data</i>	F0	20/06/2011
<i>Rev</i>	<i>Data</i>						
F0	20/06/2011						

VERIFICA A FLESSIONE

$$M_{sd} = 345 \text{ KNm}$$

Flessione:

SEZIONE	diametro (cm)	100
ARMATURA	ripartita	24 ϕ 24
INDICI DI RESISTENZA	Mrd =	1.597 kNm
	IR =	4,63

VERIFICA A TAGLIO (IN ESTREMITA')

ARMATURA	ripartita	24 ϕ 24
----------	-----------	--------------

$$V_{sd} = 350 \text{ kN}$$

RISULTATI VERIFICA A TAGLIO	
Verifica delle bielle compresse	
Taglio resistente ultimo (VRcd):	315813.719
ctg(Theta):	1.00
Indice di resistenza:	0.11
Verifica con armatura trasversale	
Taglio attribuito all'armatura (VRsd):	17502.001
Armatura trasversale per unita' di lunghezza (Asw, cm ² /m):	5.14
Staffe a 2 braccia	
:	ϕ 8/19.6cm

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO					
		RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD	Codice documento SS0558_F0.doc	Rev F0	Data 20/06/2011		

9.2 BERLINESI DUE ORDINI

Progetto: PALI RFI

Risultati per la Design Section 1: 0: DM08_ITA: Comb. 1: A1+M1+R1

APPROCCI DI PROGETTO E FATTORI DI COMBINAZIONE

Scenari di progetto utilizzati (da Normativa o personalizzati) e relativi fattori di combinazione

Stag	Design Name	Design	F(tan fr)	F (c')	F (Su)	F (EQ)	F(per load)	F(tem load)	F(per sup)	F(tem sup)	F (Dsta)	F (stabil)	F (Dsta)	F (stabil)	F (Dsta)	F (stabil)	F (Dsta)	F (stabil)
0	DM08 IT	1:	1	1	1	0	1.3	1.5	1.2	1.1	1.3	1	1.3	1	1.35	0.9	1	1
1	DM08 IT	1:	1	1	1	0	1.3	1.5	1.2	1.1	1.3	1	1.3	1	1.35	0.9	1	1
2	DM08 IT	1:	1	1	1	0	1.3	1.5	1.2	1.1	1.3	1	1.3	1	1.35	0.9	1	1
3	DM08 IT	1:	1	1	1	0	1.3	1.5	1.2	1.1	1.3	1	1.3	1	1.35	0.9	1	1
4	DM08 IT	1:	1	1	1	0	1.3	1.5	1.2	1.1	1.3	1	1.3	1	1.35	0.9	1	1
5	DM08 IT	1:	1	1	1	0	1.3	1.5	1.2	1.1	1.3	1	1.3	1	1.35	0.9	1	1
6	DM08 IT	1:	1	1	1	0	1.3	1.5	1.2	1.1	1.3	1	1.3	1	1.35	0.9	1	1
7	DM08 IT	1:	1	1	1	0	1.3	1.5	1.2	1.1	1.3	1	1.3	1	1.35	0.9	1	1

Stage=Fase di scavo

Design Code=Codice di verifica

Ftan fr=fattore moltiplicatore tangente angolo di attrito

F C'=fattore moltiplicatore coesione efficace

F Su'=fattore moltiplicatore coesione non drenata

F EQ=fattore moltiplicatore reazione sismica

F perm load=fattore moltiplicatore carichi permanenti

F temp load=fattore moltiplicatore carichi accidentali/variabili

F perm supp=fattore di riduzione resistenza per verifica pull out tirante

F temp supp=fattore di riduzione resistenza per verifica pull out tirante

F earth Dstab=fattore moltiplicatore per spinta attiva nel caso sfavorevole

F earth stab=fattore moltiplicatore per spinta attiva nel caso favorevole

F GWT Dstab (ground water)=fattore moltiplicatore per spinta idrostatica sfavorevole

F GWT stab (ground water)=fattore moltiplicatore per spinta idrostatica favorevole

F HYD Dstab=fattore moltiplicatore per spinta idrodinamica sfavorevole

F HYD stab=fattore moltiplicatore per spinta idrodinamica favorevole

F UPL Dstab=fattore moltiplicatore per sifonamento sfavorevole

F UPL stab=fattore moltiplicatore per sifonamento favorevole

DATI TERRENO

Name	g tot	g dry	Frict	C'	Su	FRp	FRcv	Eload	Eur	kAp	kPp	kAcv	kPcv	Vary	Spring	Color
	(daN/m ³)	(daN/m ³)	(deg)	(daN/)	(daN/)	(deg)	(deg)	(daN/m ²)	(daN/m)	Springs	Springs	Springs	Springs		Model	
Strato	1900	1900	35	0	N/A	N/A	N/A	200000	600000	0.27	3.69	N/A	N/A	True	Linear	
Strato	1900	1631.55	38	0	N/A	N/A	N/A	400000	120000	0.24	4.2	N/A	N/A	True	Linear	

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011

gtot=peso specifico /totale terreno
gdry=peso secco del terreno
Frict=angolo di attrito di calcolo
C'=coesione efficace
Su = Coesione non drenata, parametro attivo per terreni tipo CLAY in condizioni NON drenate
Dilat=Dilatanza terreno (parametro valido solo in analisi non lineare)
Evc=modulo a compressione vergine molla equivalente terreno
Eur=modulo di scarico/ricarico (fase elastica) molla equivalente terreno
Kap= coefficiente di spinta attiva di picco
Kpp= coefficiente di spinta passiva di picco
Kacv= coefficiente di spinta attiva di picco
Kpcv= coefficiente di spinta passiva di picco
Spring models= modalit  di definizione dei moduli di rigidezza molle terreno (LIN, EXP, SIMC)
LIN= Lineare-Elastico-Perfettamente plastico
EXP: esponenziale, SUB: Modulo di reazione del sottosuolo
SIMC= Modo semplificato per argille

STRATIGRAFIA TERRENI

Top Elev= quota superiore strato
Soil type=nome del terreno
OCR=rappporto di sovraconsolidazione
K0=coefficiente di spinta a riposo

Name: Boring 1, pos: (-8, 0)

Top elev.	Soil type	OCR	Ko
0	Strato1	1	0.43
-13	Strato2	1	0.38

DATI GENERALI RELATIVI A MATERIALI E PROPRIETA MECCANICHE ELEMENTI STRUTTURALI

Acciaio

Name	Strength Fy	Fu	Elastic E	Density g
	(daN/cm ²)	(daN/cm ²)	(daN/cm ²)	(daN/m ³)
S355	3620	5200.6	2100615.4	7851.8148

Calcestruzzo

Name	Strength Fc'	Elastic E	Density g	Tension Strength Ft
	(daN/cm ²)	(daN/cm ²)	(daN/m ³)	(daN/cm ²)
C25/30	254.9	320965.9	2549.291	10

Barre in acciaio

Name	Strength Fy	Elastic E
	(daN/cm ²)	(daN/cm ²)
S1862 (Strands)	18987.1	2141404
B450C	4588.7	2141404

Legno

Name	Ultimate Bending Srtength	Ultimate Tensile Strength	Ultimate Shear Strength	Density g	Elastic E
	(daN/cm ²)	(daN/cm ²)	(daN/cm ²)	(daN/m ³)	(daN/cm ²)
Regular grade	70.4	70.4	41.8	801.2522	56288.3

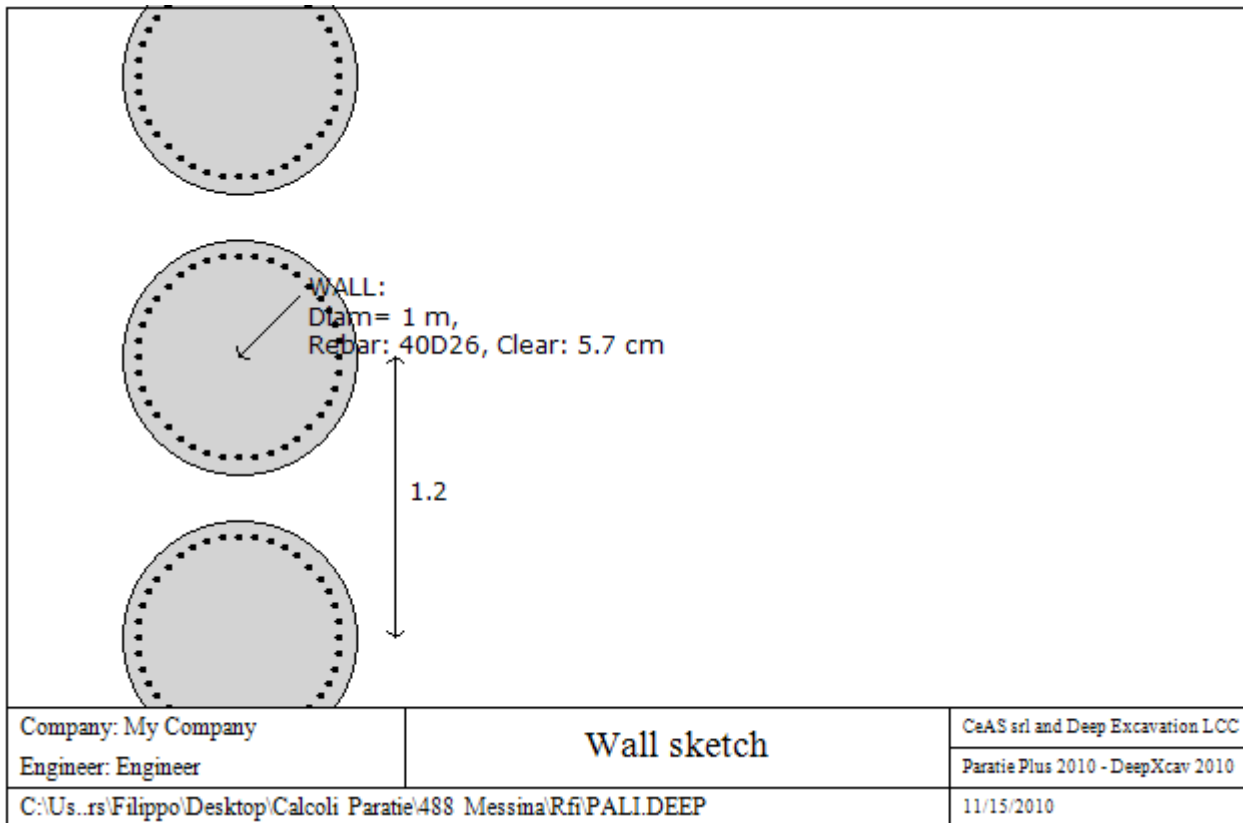
		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO					
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<i>Rev</i>	<i>Data</i>						
F0	20/06/2011						

STEEL=acciaio
Name=nome materiale
strength $f_y=f_{yk}$ =res caratteristica acciaio
Fu=fuk=resistenza ultima
Elastic E=modulo elastico
Density g=peso specifico
CONCRETE=calcestruzzo
Name=nome materiale
 $f_c=f_{ck}$ =resistenza cilindrica a compressione caratteristica cls
Elastic E=modulo elastico
Density g=peso specifico
Tension strength= $f_t=f_{tk}$ =resistenza a trazione caratteristica
STEEL REBAR
Name=nome materiale
strength $f_y=f_{yk}$ =resistenza caratteristica acciaio
Elastic E=modulo elastico
WOOD=legno
Name=nome materiale
Ultimate bending strength $F_b=f_{bk}$ =resistenza caratteristica a flessione
Ultimate tensile strength $F_{tu}=f_{tuk}$ =res caratt. parallela alle fibre
Ultimate shear strength $F_{vu}=f_{vuk}$ =res. caratt. a taglio
Density g=peso specifico
Elastic E=modulo elastico

DATI PARATIE

Sezione paratia0: Berlinese Sx

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO	
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD	<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011



Wall uses wall section0: PALI 1000

Tipo paratia: Pali tangenti: pali in calcestruzzo armato

Quota sommita' paratia: 0 m Quota piede paratia: -16 m

Dimensione fuori piano paratia: 1.2 Spessore paratia = 1

Ampiezza zona spinta passiva al di sotto del piano di scavo: 1 Ampiezza zona spinta attiva al di sotto del piano di scavo: 1

fc' cls = 254.9 Fy barre = 4588.7 Ecls = 320965.9 FcT calcestruzzo a trazione = 10% di Fc'

fy profilati in acciaio = 3620 Eacciaio = 2100615.4

Attrito paratia: % attrito terreno = 50%

Le capacita' paratie in acciaio sono calcolate con NTC 2008

Le capacita' paratie in calcestruzzo sono calcolate con ACI 318-2002.

Nota: con la capacita' ultima si dovrebbe adottare un fattore di sicurezza strutturale.

Proprieta' paratie di pali tangenti

Concrete section type: Rectangular

Section dimensions

D = 100 m B = 100 m A = 7853.98163397448 cm² Ixx = 4908738.52123405 cm⁴

Longitudinal reinforcement

Top rebars: N = 40 bars #D26 = AsTop 212.36 cm², Ctop = 7 m

Bottom rebars: N = 40 bars #D25 = AsBot NaN cm², Cbot = 7 m

Shear reinforcements

Bar #D10 = As 0.785 cm², sV = 12 m, sH = 25 m

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO					
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<i>Rev</i>	<i>Data</i>						
F0	20/06/2011						

DATI GENERALI PARATIA

Hor wall spacing=interasse tra pannelli
passive width below exc=larghezza di riferimento per calcolo zona passiva per analisi classica
concrete $f'c=fck$ =res cilindrica caratteristica cls
Rebar $f_y=fyk$ =res caratteristica acciaio armature
Econc=modulo elastico cls
Concrete tension $fct=fctk$ =resistenza caratteristica a trazione cls
Steel members $f_y=fyk$ =res caratteristica acciaio
Esteel=modulo elastico acciaio

DATI TABELLATI (si omette la spiegazione dei parametri già descritti in precedenza)

1) Diaphragm wall=sezione rettangolare in CA

N/A= il valore non è disponibile in quanto non correlato al tipo di sezione in uso

$F_y=fyk$

$F'c=fck$

D=altezza paratia

B=base paratia

tf=spessore

2) Steel sheet pile=palancolata

DES=tipo di palancolata

Shape=forma

W=peso per unità di lunghezza

A=area

h=altezza

t=spessore lamiera orizzontale

b=base singolo elemento a Z o U

s=spessore lati obliqui

I_{xx} =inerzia asse principale palancolata (per unità di lunghezza)

S_{xx} =modulo di resistenza asse principale palancolata (per unità di lunghezza)

3) Secant pile wall (pali allineati e sovrapposti), Tangent pile wall=pali allineati (Berlinesi, micropali), soldier pile (pali in acciaio con collegamento in cls), soldier pile and timber lagging (pali in acciaio con collegamento con elementi in legno)

W=peso per unità di lunghezza

A=area

D=diametro

tw o tp=spessore dell'anima (sezione a l) o del tubo (sezione circolare)

bf=larghezza della sezione

tf=spessore dell'ala

k=altezza flangia + altezza raccordo

I_{xx} =inerzia rispetto asse orizzontale (per unità di lunghezza)

S_{xx} =modulo di resistenza rispetto asse orizzontale (per unità di lunghezza)

r_x =raggio giratore d'inerzia lungo x

I_{yy} =inerzia rispetto asse verticale (per unità di lunghezza)

S_{yy} =modulo di resistenza rispetto asse verticale (per unità di lunghezza)

r_y =raggio giratore d'inerzia lungo y

Cw=costante di ingobbamento

$f_y=fyk$

DATI VINCOLI, TIRANTI, PUNTONI, ECC

Support 0: type = tieback

X = 1 m, Z = -2.5 m, S = 1.2 m

Lfree = 7.782 m, Lfix = 7.5 m, Rfix = 90 %

Walls: Berlinese Sx

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011

Stage No	Active	Prestress	Slab live load	User add. strain
	Si'/No	(daN)	(daN/m2)	+expansion
0	No	22500	-	-
1	No	22500	-	-
2	No	22500	-	-
3	Si'	22500	-	-
4	Si'	22500	-	-
5	Si'	22500	-	-
6	Si'	22500	-	-
7	Si'	22500	-	-

Support 1: type = tieback

X = 1 m, Z = -5 m, S = 1.2 m

Lfree = 6.684 m, Lfix = 5 m, Rfix = 80 %

Walls: Berlinese Sx

Stage No	Active	Prestress	Slab live load	User add. strain
	Si'/No	(daN)	(daN/m2)	+expansion
0	No	22500	-	-
1	No	22500	-	-
2	No	22500	-	-
3	No	22500	-	-
4	No	22500	-	-
5	Si'	22500	-	-
6	Si'	22500	-	-
7	Si'	22500	-	-

Support type= tipo di vincolo

Tieback=tirante

Strut=puntone

Raker=Sbadacchio

LEGENDA PER TIRANTI

Dati generali

Z=quota vincolo

S=interasse in direzione orizzontale

Lfree=lunghezza tratto elastico

Lfix=lunghezza tratto rigido

Rfix=% sfruttamento tratto rigido

Stage No=numero step di scavo

Active=stato tirante (YES=attivo)

Post stress= precarico tirante (carico moltiplicato per interasse)

Walls= indica il nome della paratia alla quale il vincolo è applicato

Nel caso di solette indica il punto di partenza e cioè la paratia di sinistra

PARAMETRI DI CALCOLO PER SINGOLA FASE

Summary of stage assumptions

Name	Analysis	Drive	ka-Mult	Htr T/B	Resist	Res	Contlev	Support	Axial	Used	Min	Toe	Toe
	Method	Press		(%)	Press	Mult	Method	Model	Incl	FSwall	FDtoe	FSrot	FSpas
Stage 0	Springs-Up	Ka	N/A	N/A	Kp+ d	N/A		Fixed	N/A	1	0	0	0

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011

Stage 1	Springs-Up	Ka	N/A	N/A	Kp+ d	N/A		Fixed	N/A	1	0	0	0
Stage 2	Springs-Up	Ka	N/A	N/A	Kp+ d	N/A		Fixed	N/A	1	0	0	0
Stage 3	Springs-Up	Ka	N/A	N/A	Kp+ d	N/A		Fixed	N/A	1	0	0	0
Stage 4	Springs-Up	Ka	N/A	N/A	Kp+ d	N/A		Fixed	N/A	1	0	0	0
Stage 5	Springs-Up	Ka	N/A	N/A	Kp+ d	N/A		Fixed	N/A	1	0	0	0
Stage 6	Springs-Up	Ka	N/A	N/A	Kp+ d	N/A		Fixed	N/A	1	0	0	0
Stage 7	Springs-Up	Ka	N/A	N/A	Kp+ d	N/A		Fixed	N/A	1	0	0	0

Name=nome fase

Analysis method=metodo di calcolo

CONventional=analisi all'equilibriolimito

springs UP=analisi non lineare (schema a molle elasto plastiche)

DR=analisi per terreni tipo argilla in condizione drenata

U=analisi per terreni tipo argilla in condizione NON drenata

Up=analisi non drenata solo per i terreni selezionati

Drive press=Ka=spinta terreno attiva

ka mult=eventuale moltiplicatore Ka

Htr T/B (%)=schema pressione attiva di tipo trapezoidale

Resit press=Kp=spinta terreno passiva

Res Mult=eventuale moltiplicatore Kp

COntle Method=

Support Model=tipologia vincoli fissi (fixed=fissi)

Axial Incl=se azione assiale inclusa

Used FS wall=coeff di riduzione dominio MN

Min FD TOe=sicurezza minima per infissione (analisi classica)

Toe FS rot=sicurezza a rotazione (analisi classica)

Toe FSpas=sicurezza sulle pressioni agenti/resistenti (analisi classica)

GRAFICI FASI DI SCAVO

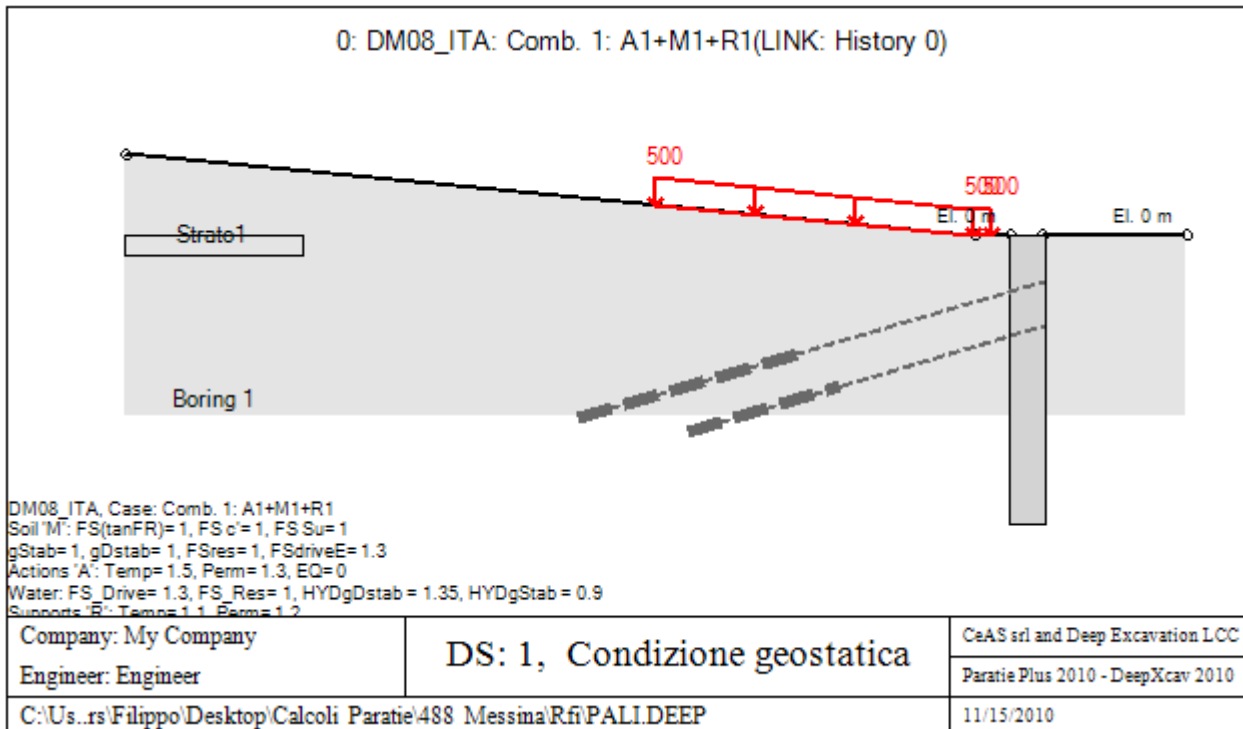
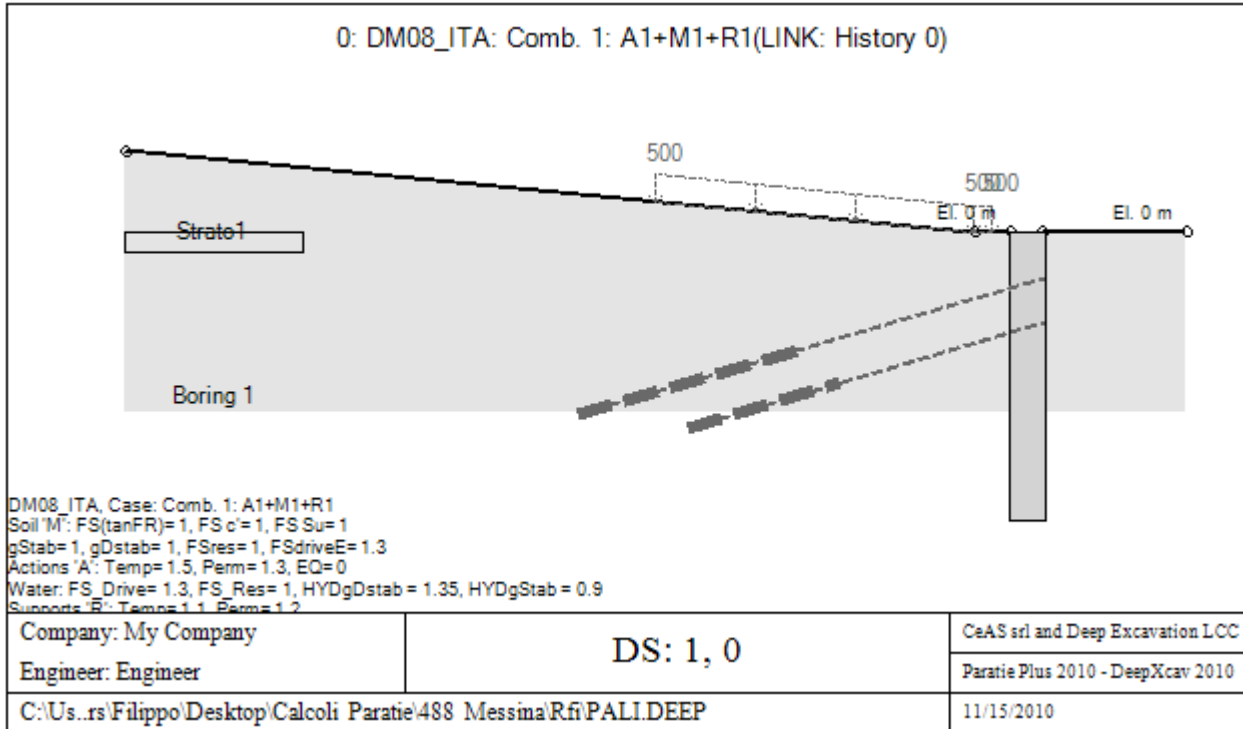
Di seguito si riportano gli schemi grafici delle fasi di scavo principali.

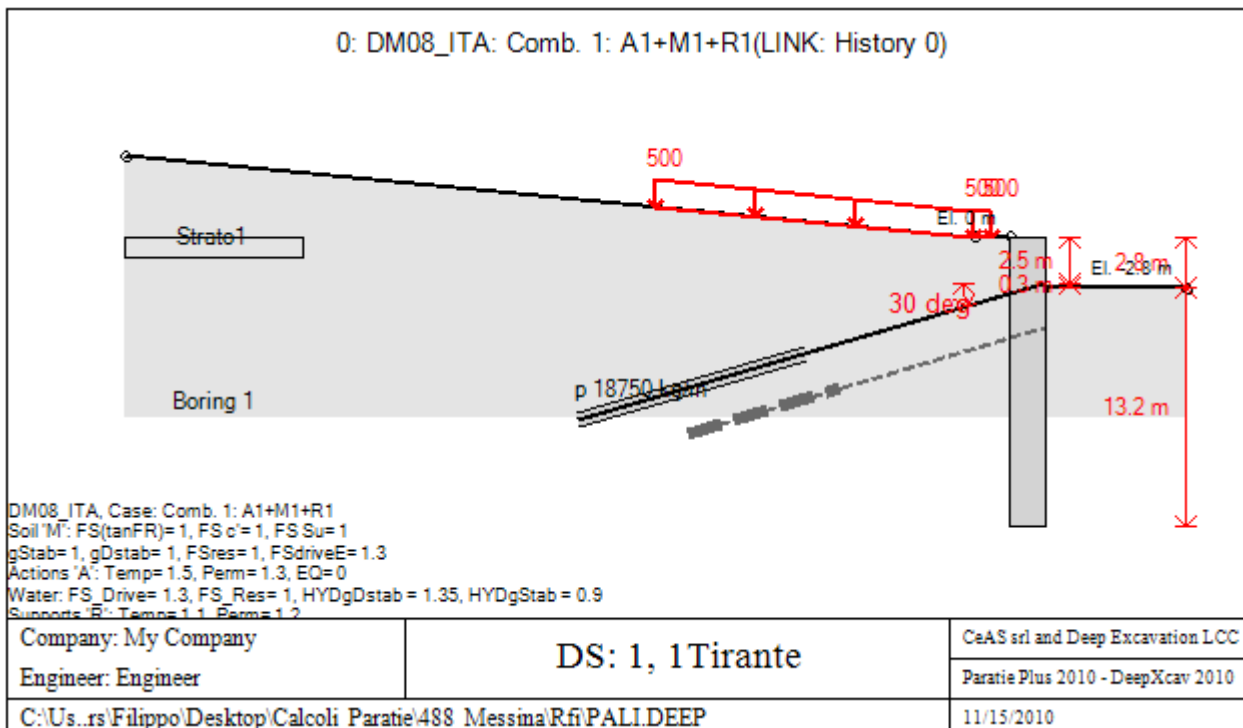
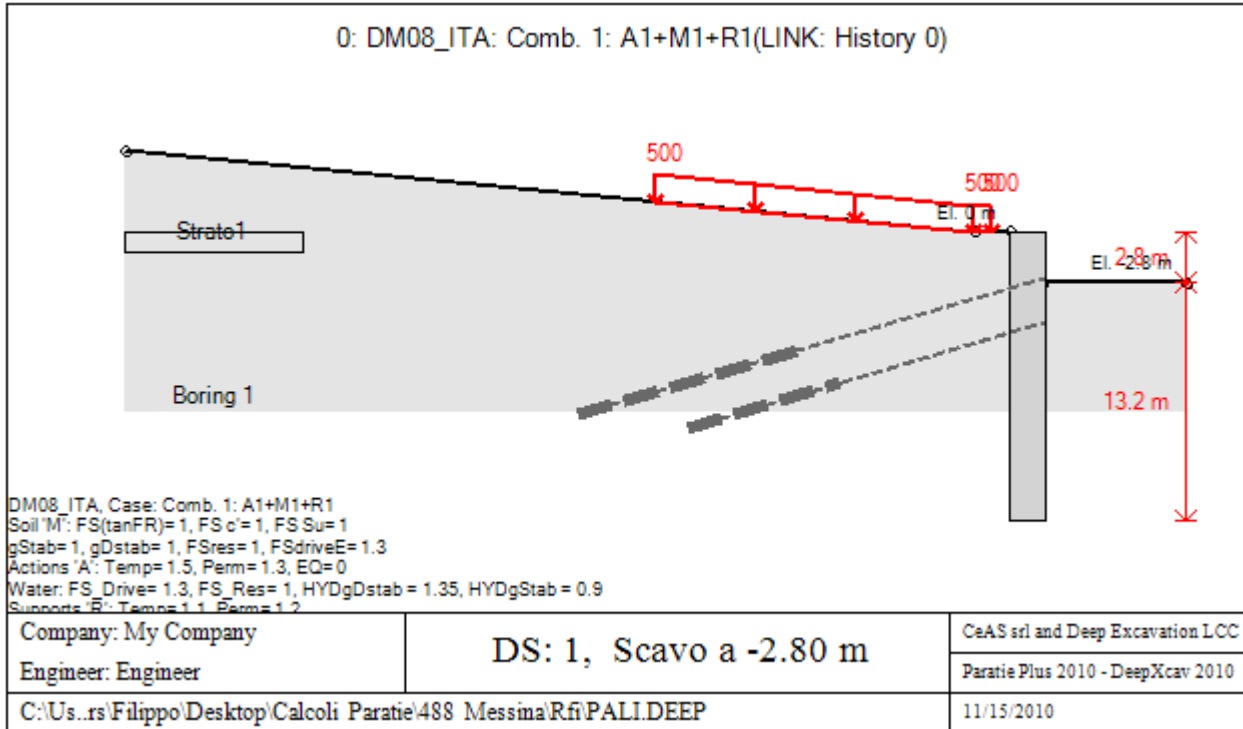
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

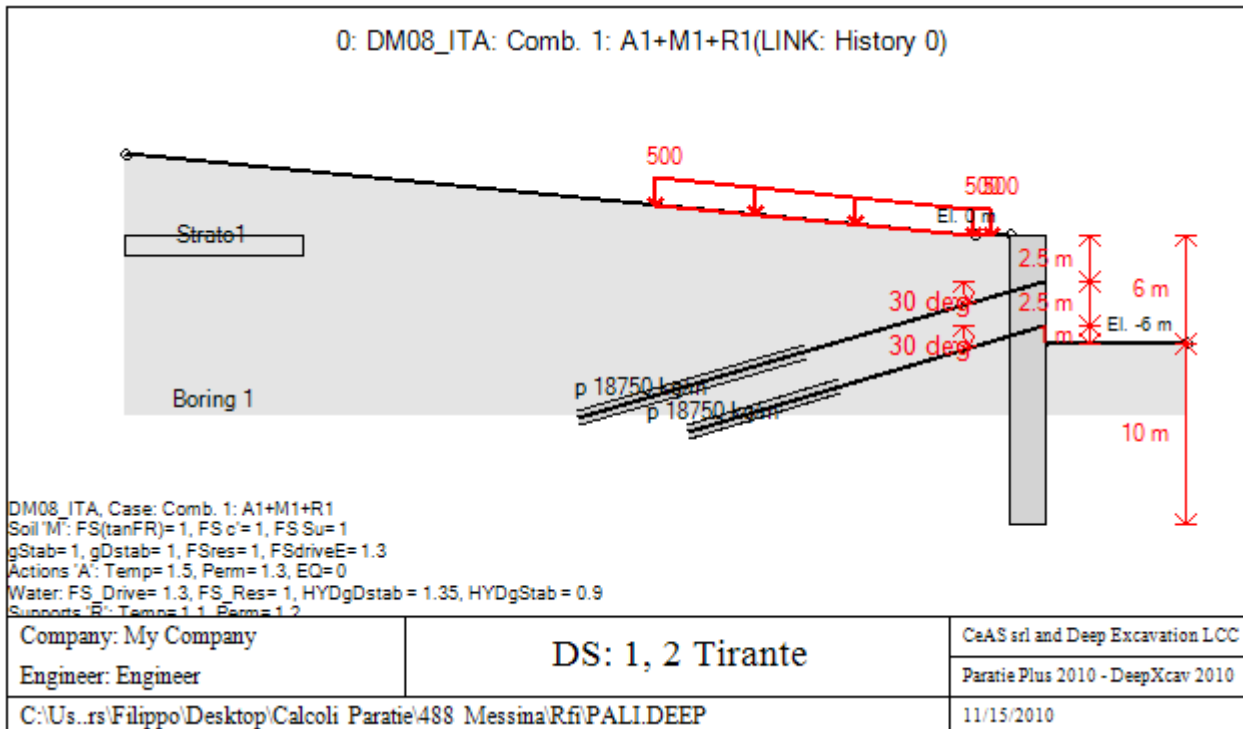
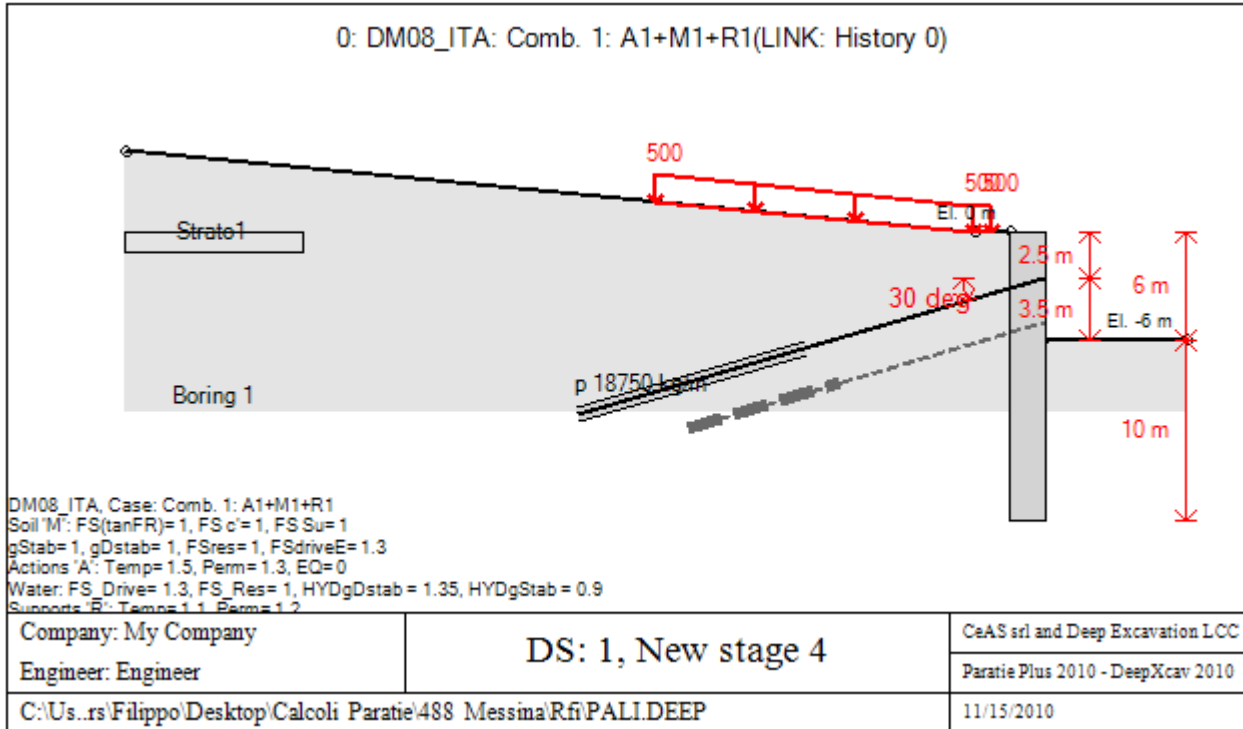
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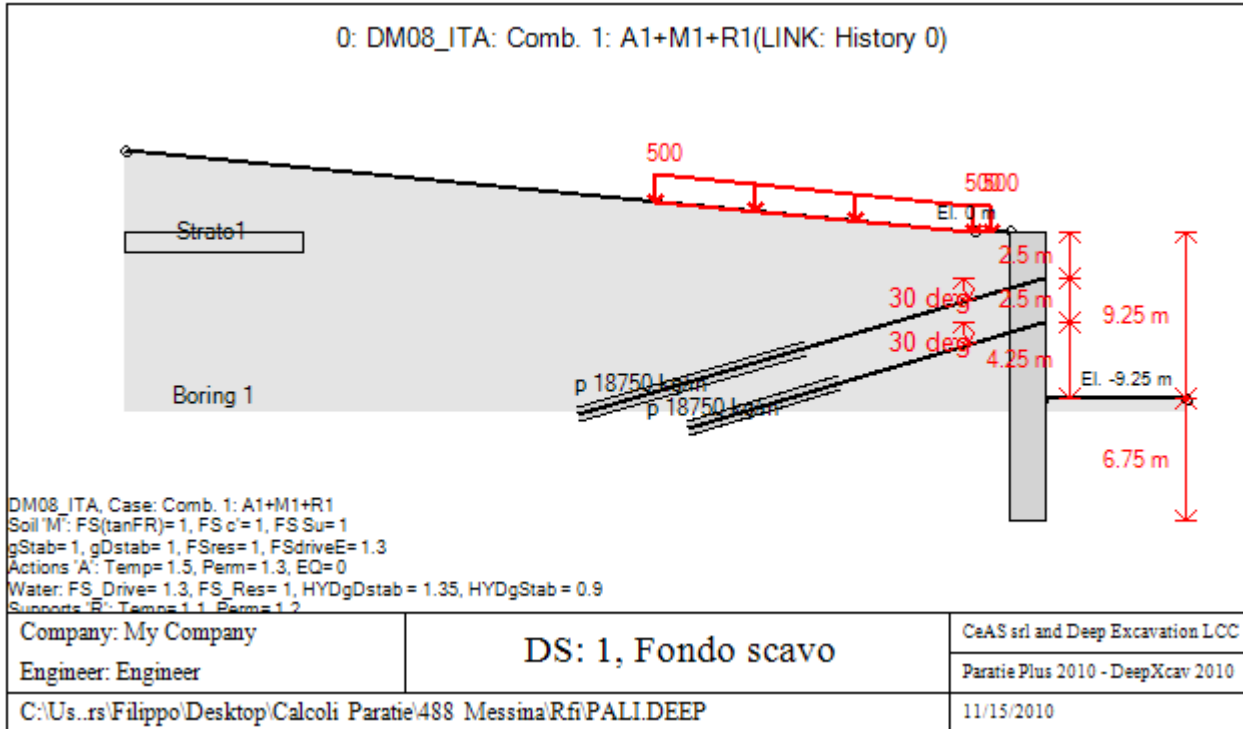
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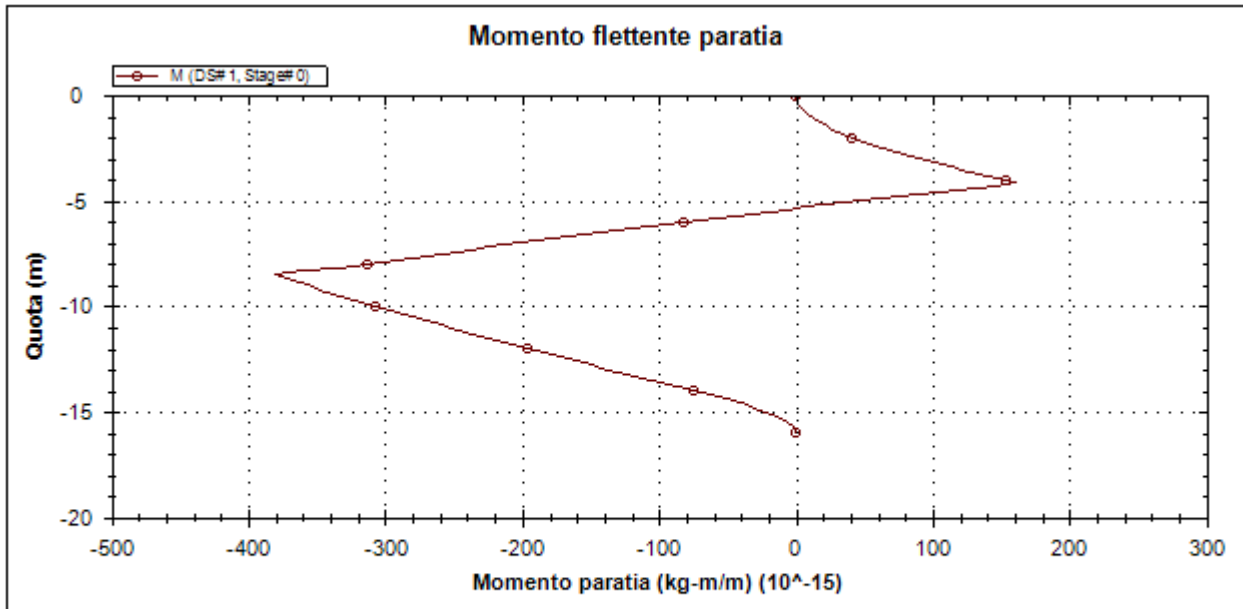
Stabilita' del piede

Embedment FS vs Stage

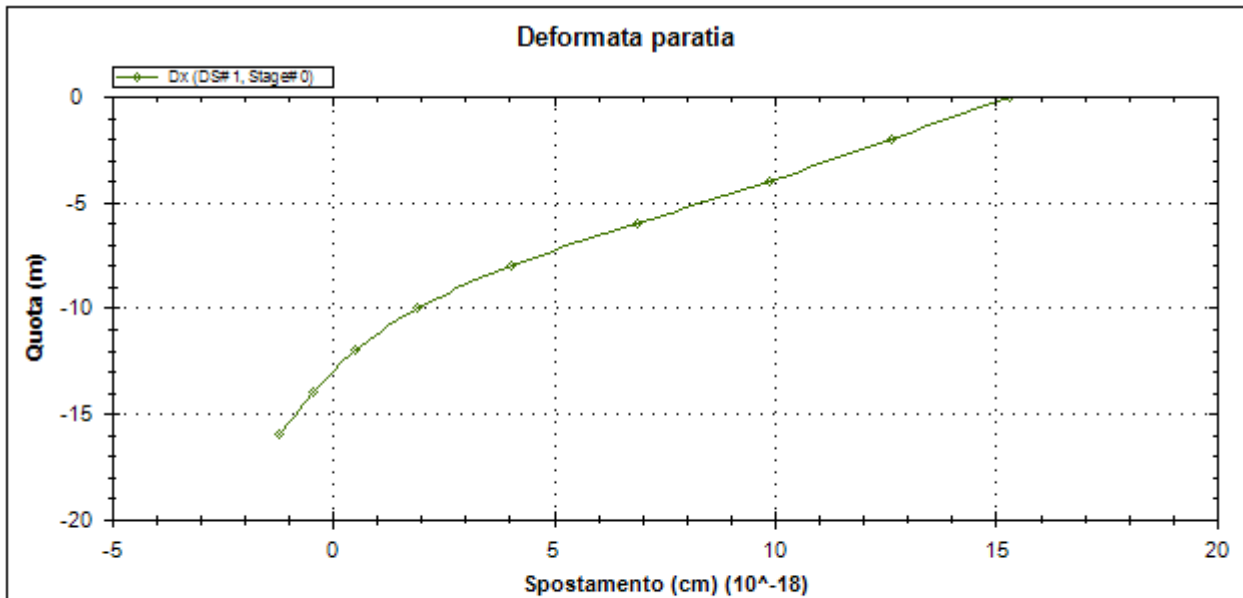
	Min Toe FS	FS1 Passive	FS2 Rotation	FS3 Length (from FS1,	FS4 Mobilized	FS5 Actual Drive Thrust /
Stage #0	N/A	N/A	N/A	N/A	13.937	1.719
Stage #1	N/A	N/A	N/A	N/A	13.904	1.723
Stage #2	N/A	N/A	N/A	N/A	10.922	1.504
Stage #3	N/A	N/A	N/A	N/A	11.515	1.7
Stage #4	N/A	N/A	N/A	N/A	8.337	1.454
Stage #5	N/A	N/A	N/A	N/A	8.625	1.627
Stage #6	N/A	N/A	N/A	N/A	4.987	1.453
Stage #7	N/A	N/A	N/A	N/A	4.987	1.453

GRAFICI FASI DI SCAVO

Di seguito si riportano gli schemi grafici delle fasi di scavo principali.



Company: My Company	DS: 1, 0	CeAS srl and Deep Excavation LCC
Engineer: Engineer		Paratie Plus 2010 - DeepXcav 2010
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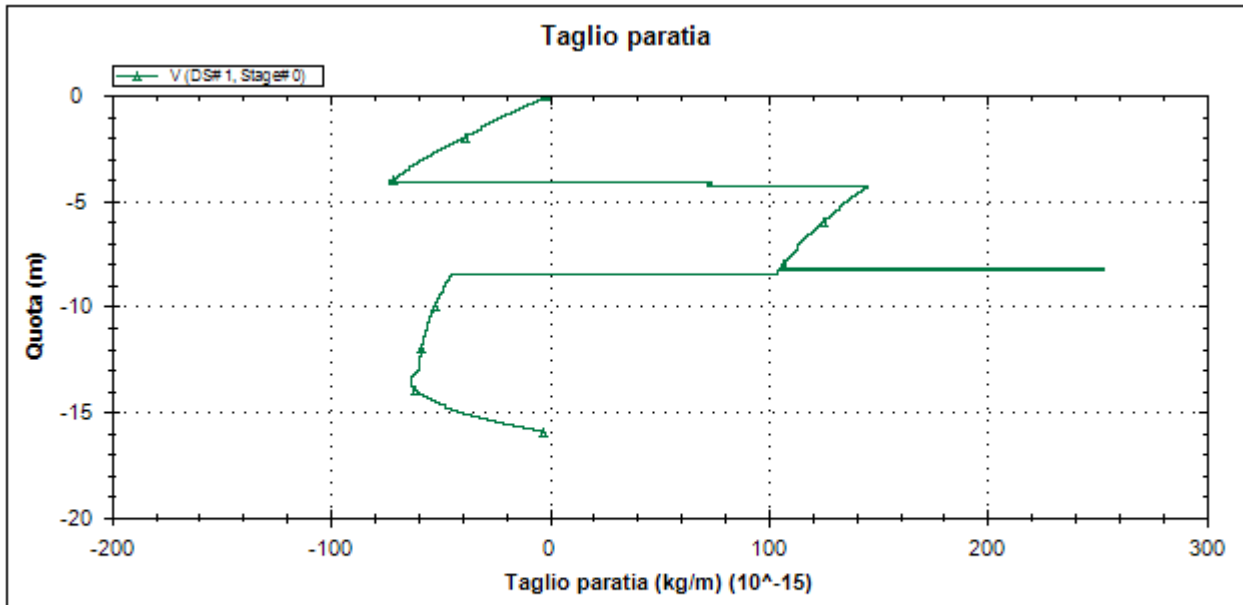
Company: My Company	DS: 1, 0	CeAS srl and Deep Excavation LCC
Engineer: Engineer		Paratie Plus 2010 - DeepXcav 2010
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RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

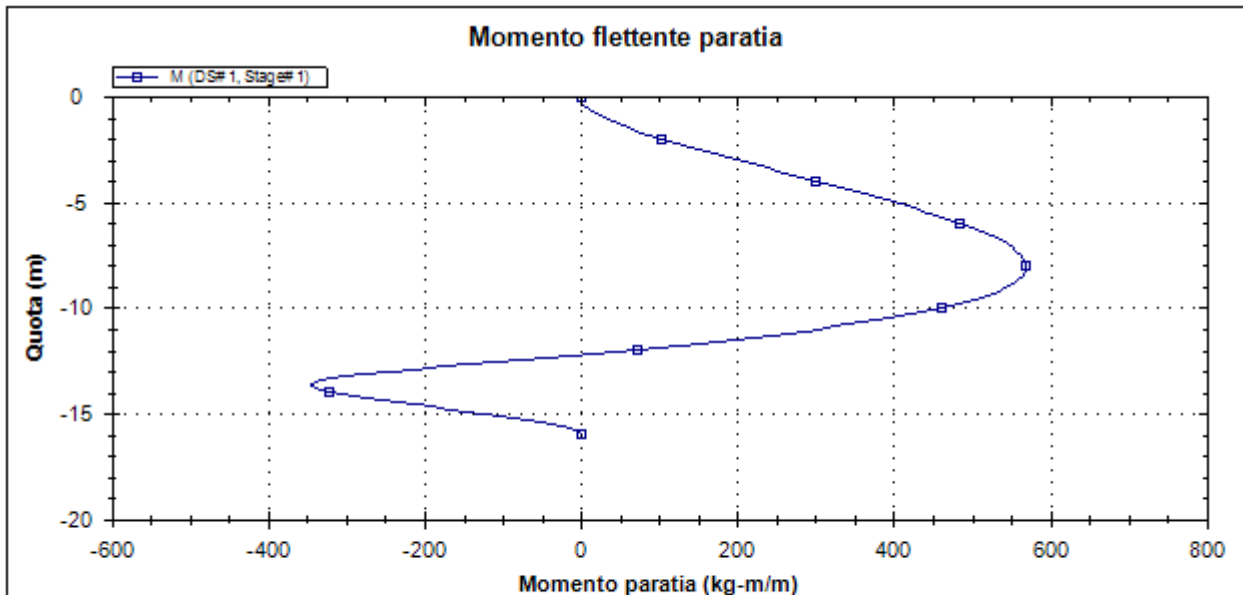
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Rev
F0

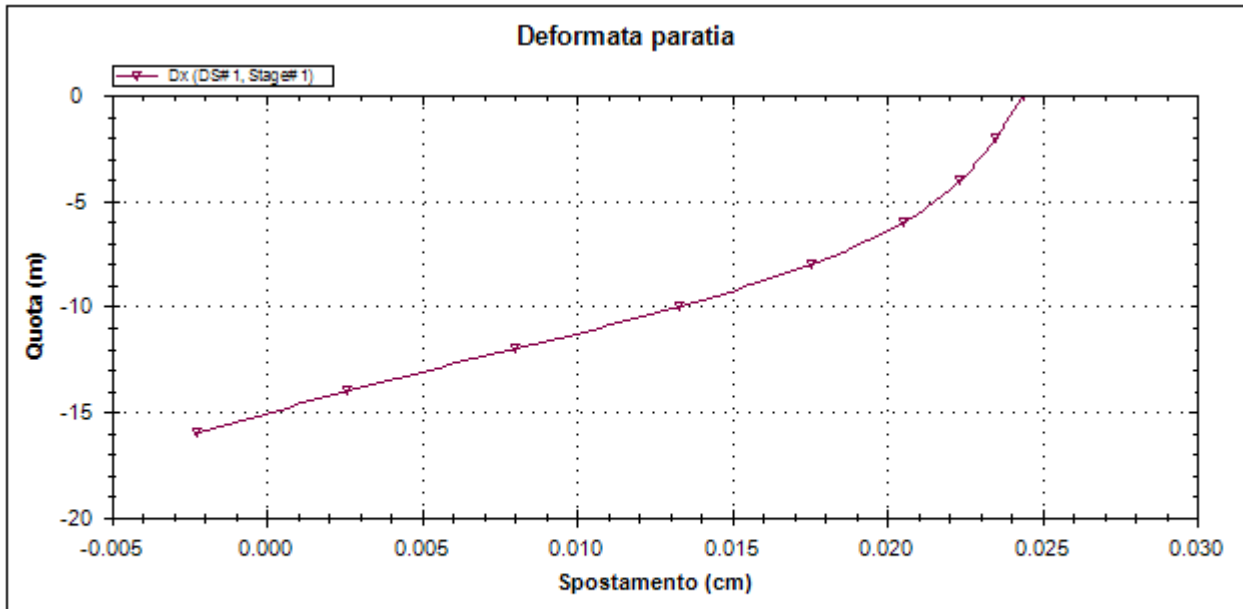
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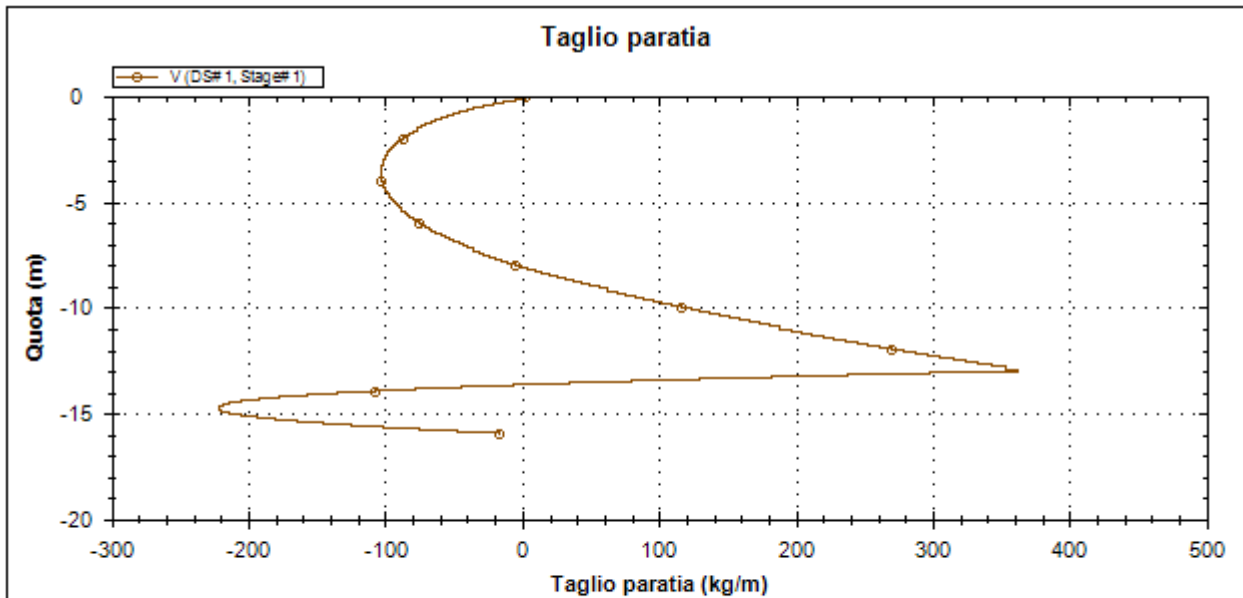
Company: My Company	DS: 1, 0	CeAS srl and Deep Excavation LCC
Engineer: Engineer		Paratie Plus 2010 - DeepXcav 2010
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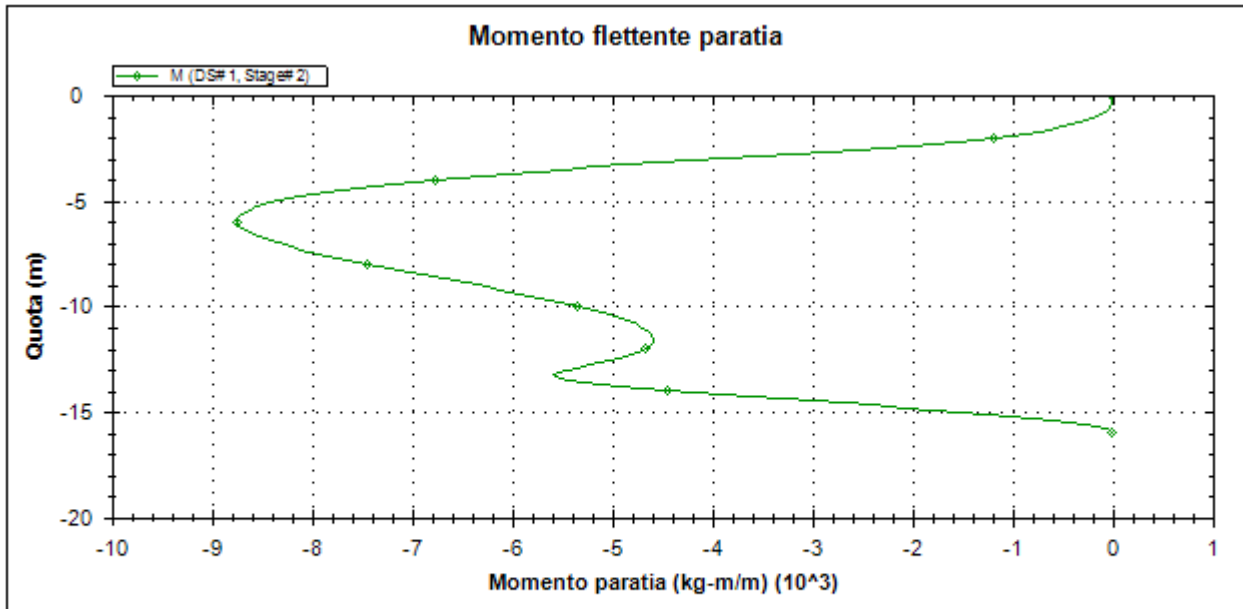
Company: My Company	DS: 1, Condizione geostatica	CeAS srl and Deep Excavation LCC
Engineer: Engineer		Paratie Plus 2010 - DeepXcav 2010
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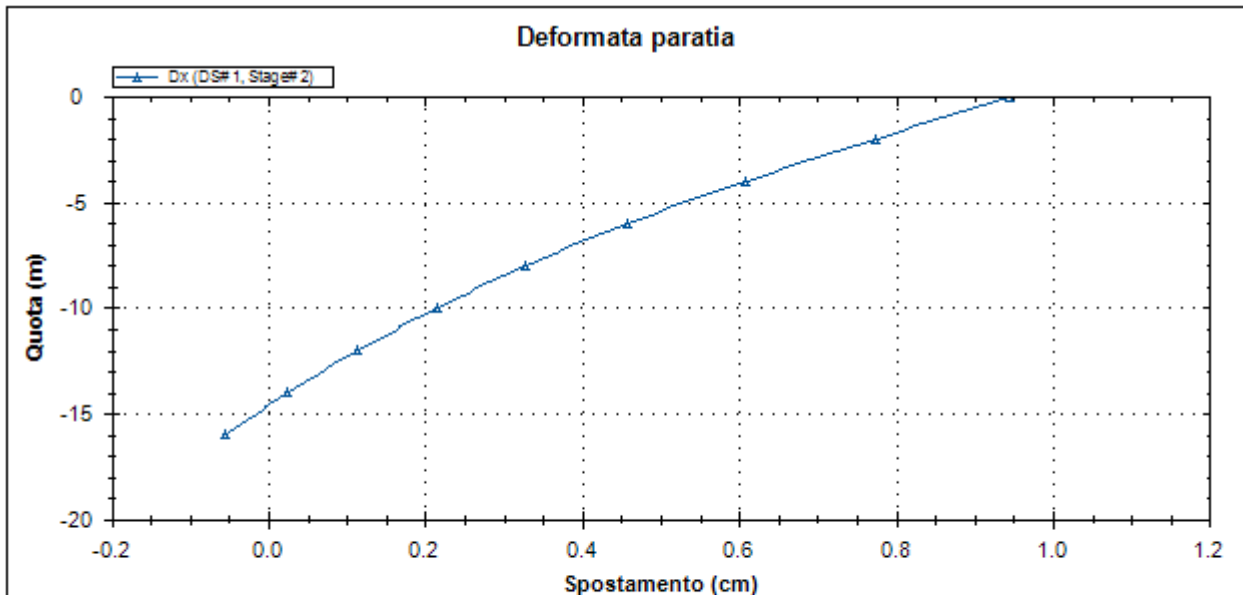
Company: My Company Engineer: Engineer	DS: 1, Condizione geostatica	CeAS srl and Deep Excavation LCC Paratie Plus 2010 - DeepXcav 2010
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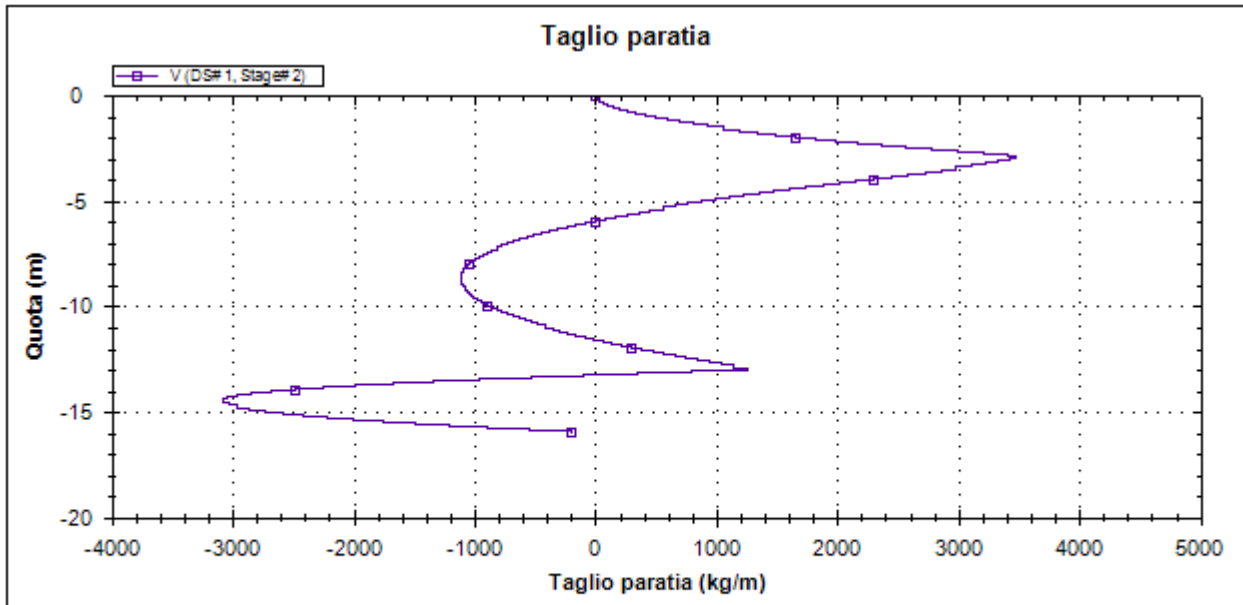
Company: My Company Engineer: Engineer	DS: 1, Condizione geostatica	CeAS srl and Deep Excavation LCC Paratie Plus 2010 - DeepXcav 2010
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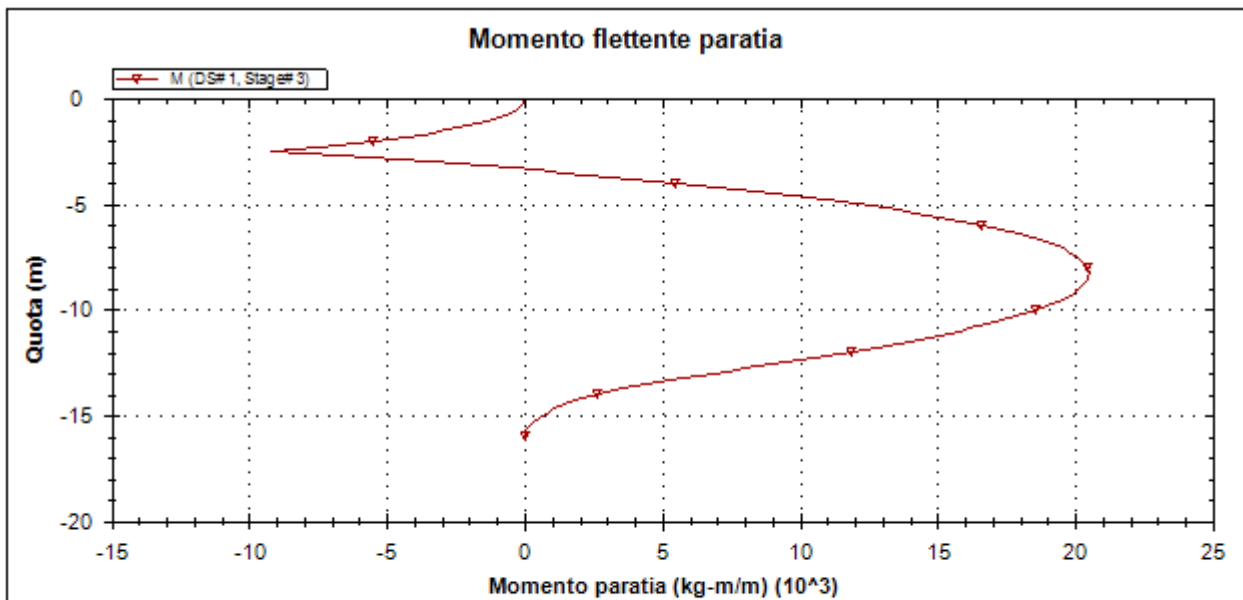
Company: My Company	DS: 1, Scavo a -2.80 m	CeAS srl and Deep Excavation LCC
Engineer: Engineer		Paratie Plus 2010 - DeepXcav 2010
C:\Us...rs\Filippo\Desktop\Calcoli Paratie\488 Messina\Rfi\PALI.DEEP		11/15/2010



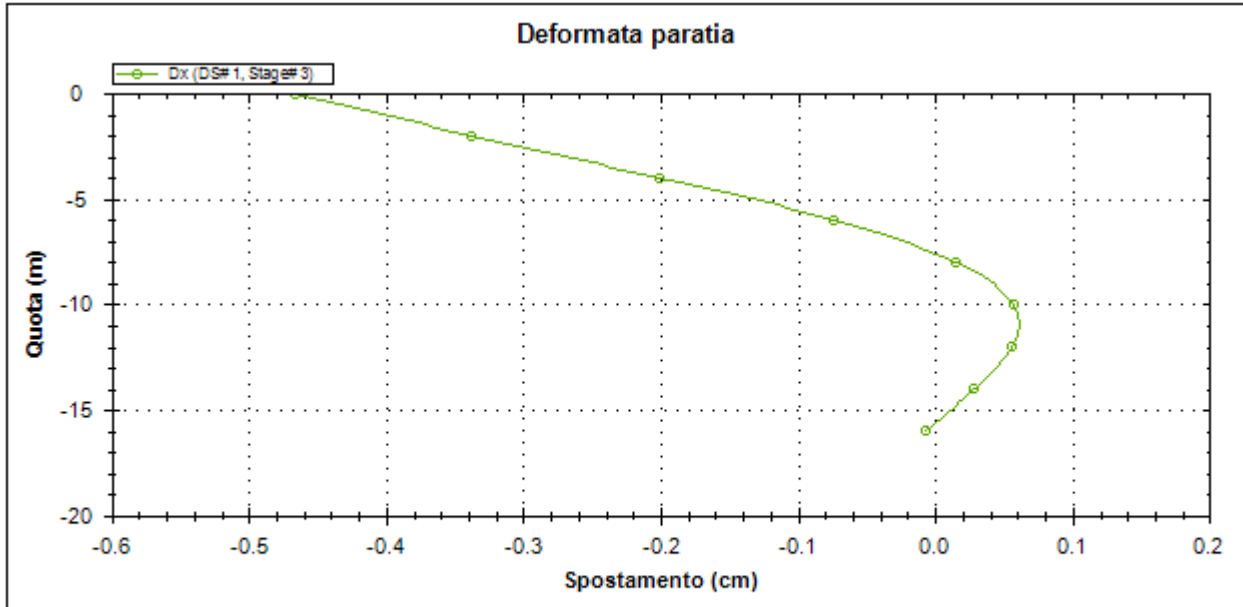
Company: My Company	DS: 1, Scavo a -2.80 m	CeAS srl and Deep Excavation LCC
Engineer: Engineer		Paratie Plus 2010 - DeepXcav 2010
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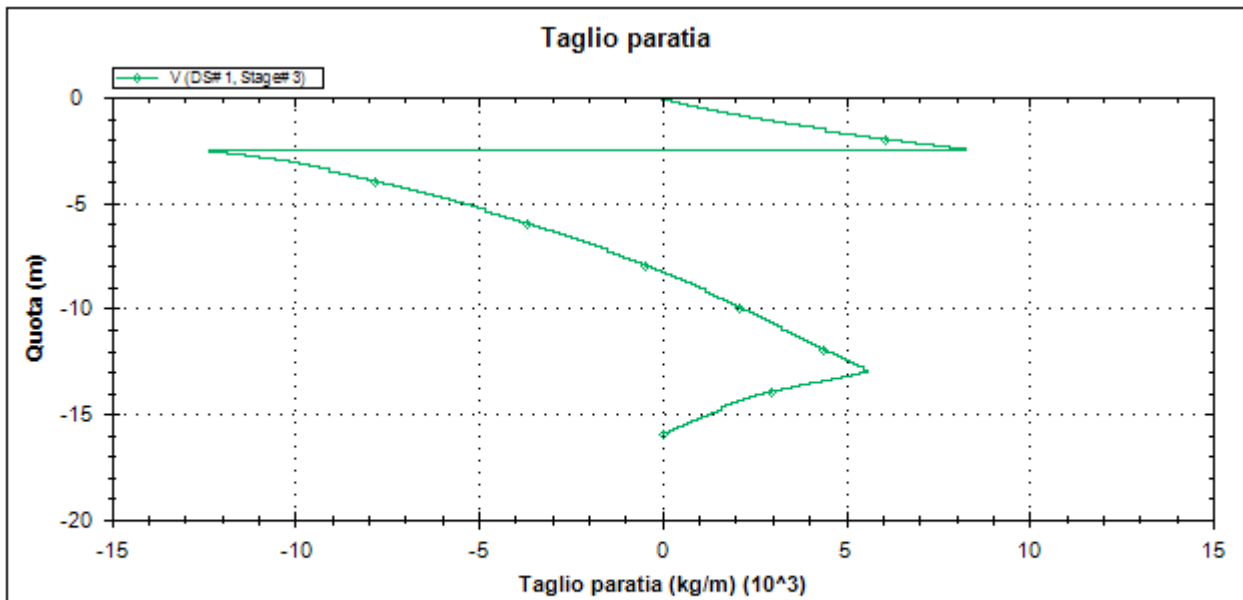
Company: My Company	DS: 1, Scavo a -2.80 m	CeAS srl and Deep Excavation LCC
Engineer: Engineer		Paratie Plus 2010 - DeepXcav 2010
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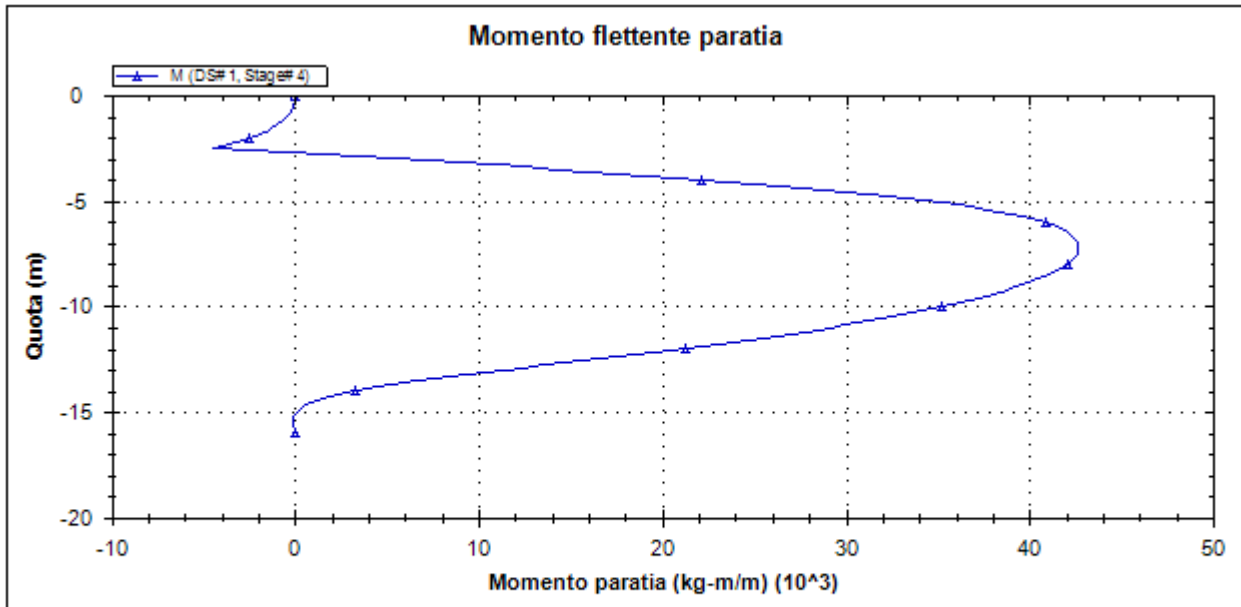
Company: My Company	DS: 1, 1 Tirante	CeAS srl and Deep Excavation LCC
Engineer: Engineer		Paratie Plus 2010 - DeepXcav 2010
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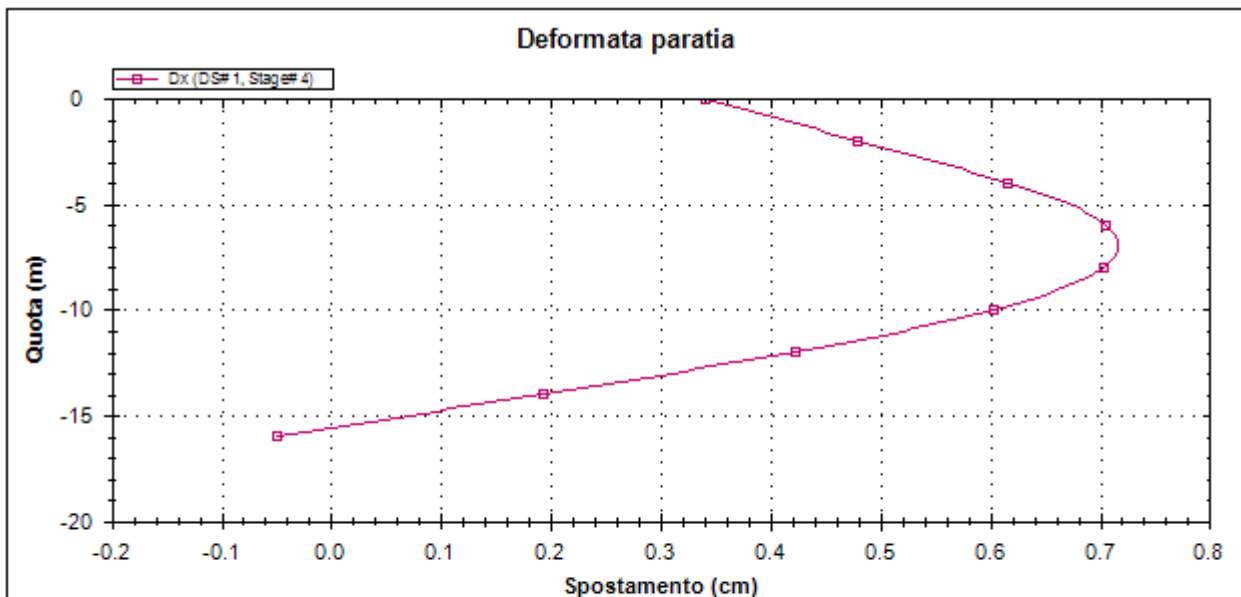
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Engineer: Engineer		Paratie Plus 2010 - DeepXcav 2010
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Company: My Company	DS: 1, 1 Tirante	CeAS srl and Deep Excavation LCC
Engineer: Engineer		Paratie Plus 2010 - DeepXcav 2010
C:\Us...rs\Filippo\Desktop\Calcoli Paratie\488 Messina\Rfi\PALI.DEEP		11/15/2010



Company: My Company	DS: 1, New stage 4	CeAS srl and Deep Excavation LCC
Engineer: Engineer		Paratie Plus 2010 - DeepXcav 2010
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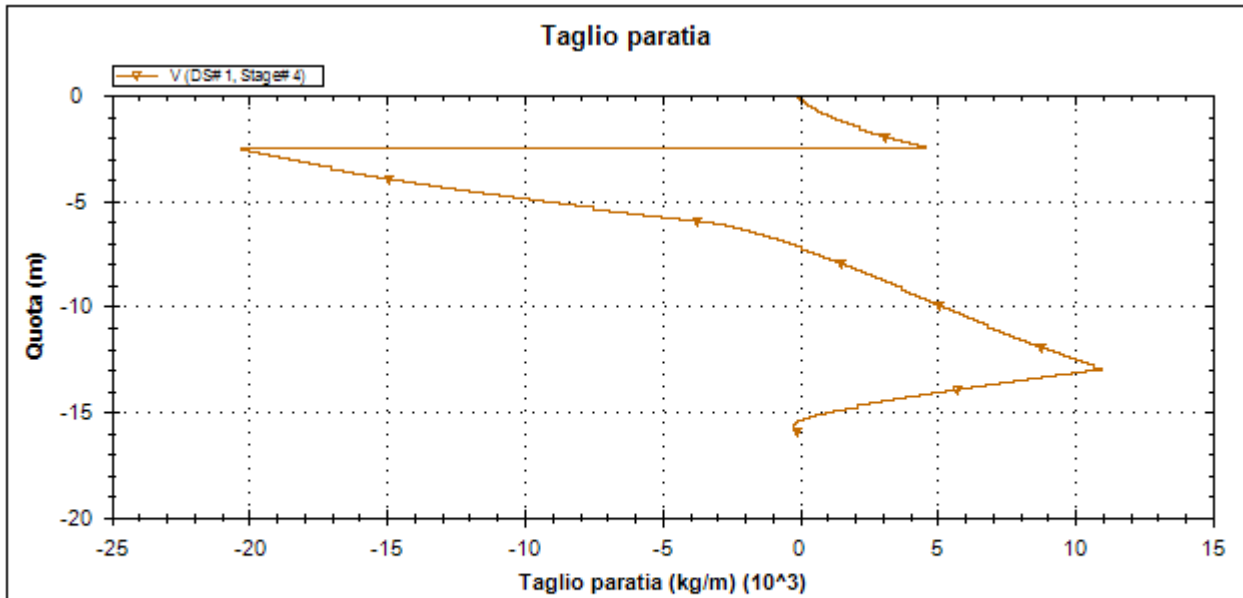
Company: My Company	DS: 1, New stage 4	CeAS srl and Deep Excavation LCC
Engineer: Engineer		Paratie Plus 2010 - DeepXcav 2010
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RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

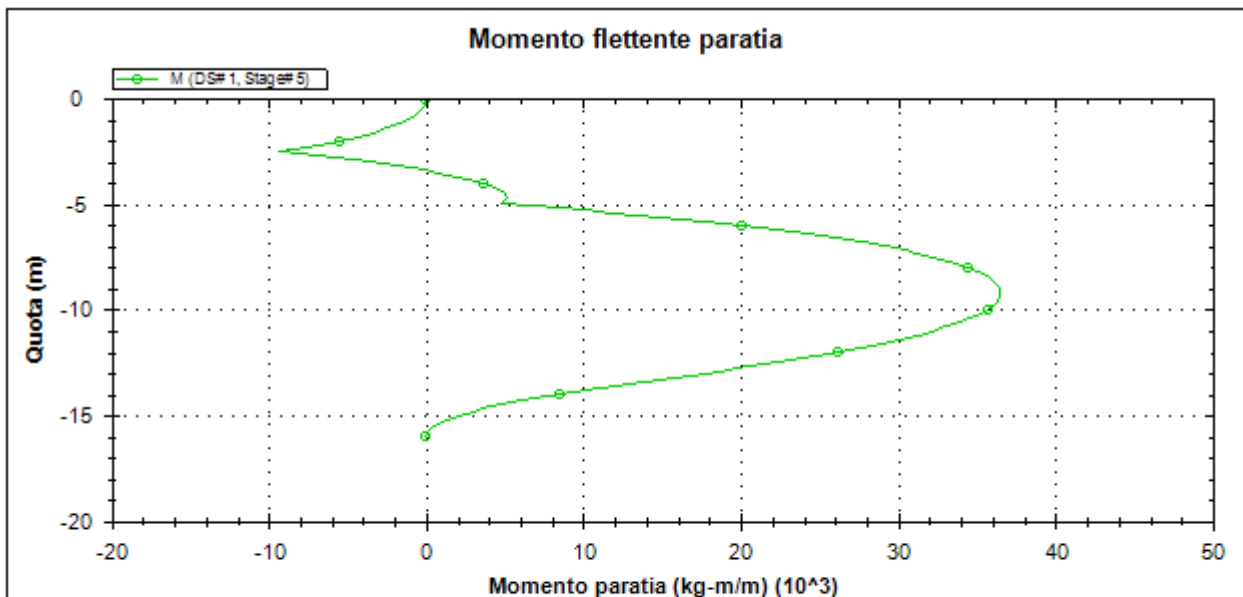
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Rev
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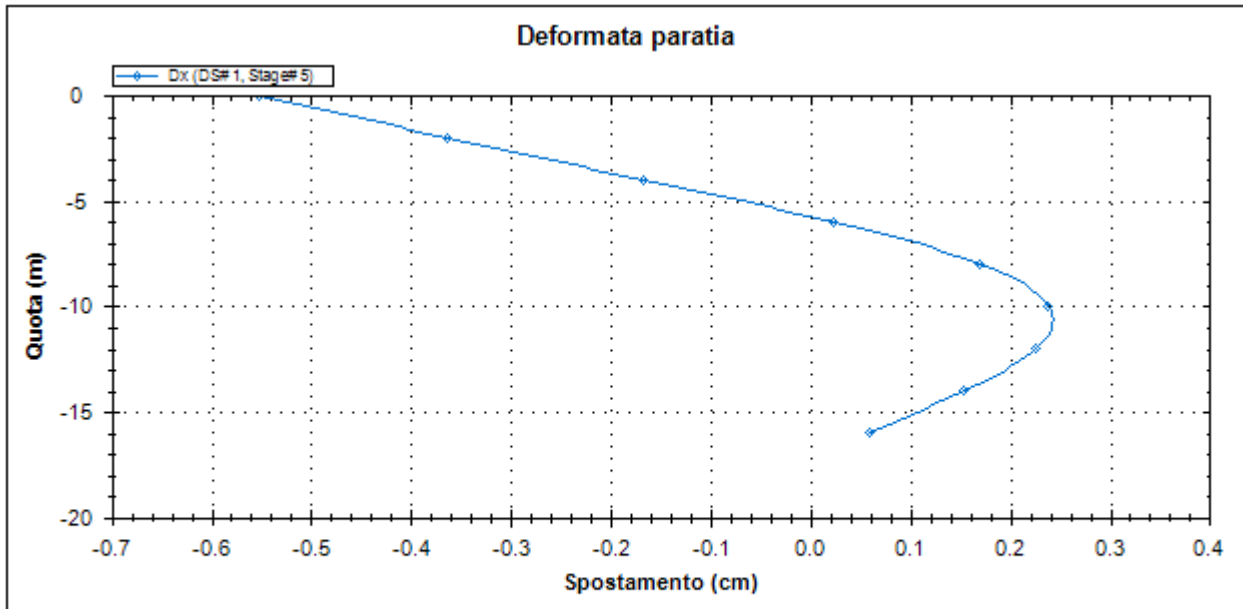
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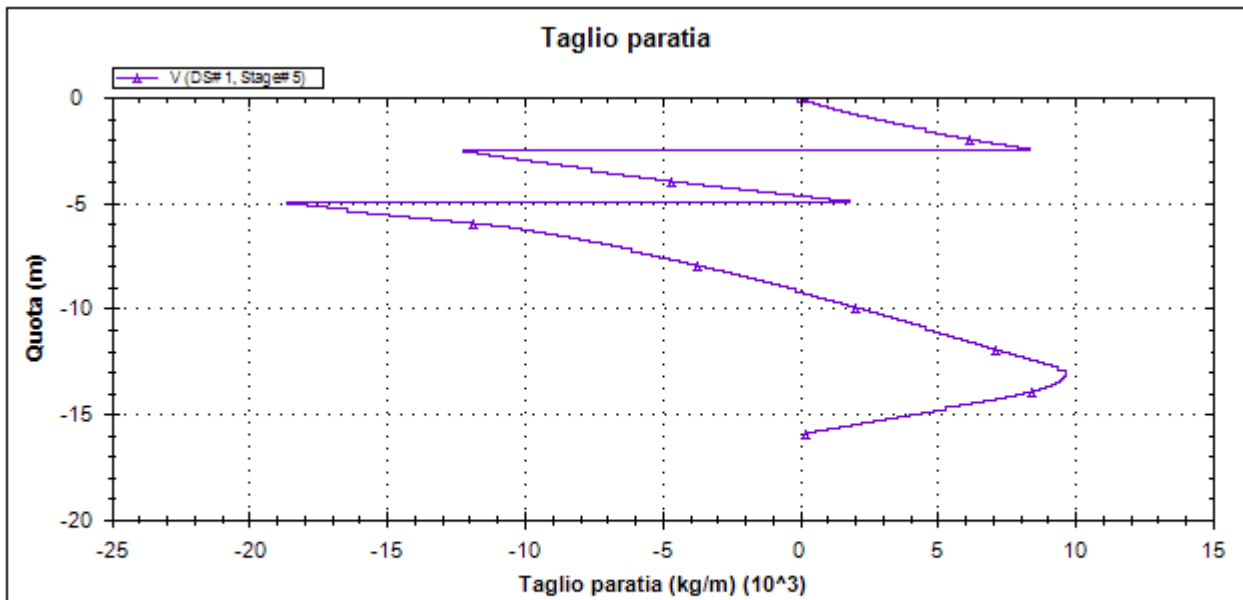
Company: My Company	DS: 1, New stage 4	CeAS srl and Deep Excavation LCC
Engineer: Engineer		Paratie Plus 2010 - DeepXcav 2010
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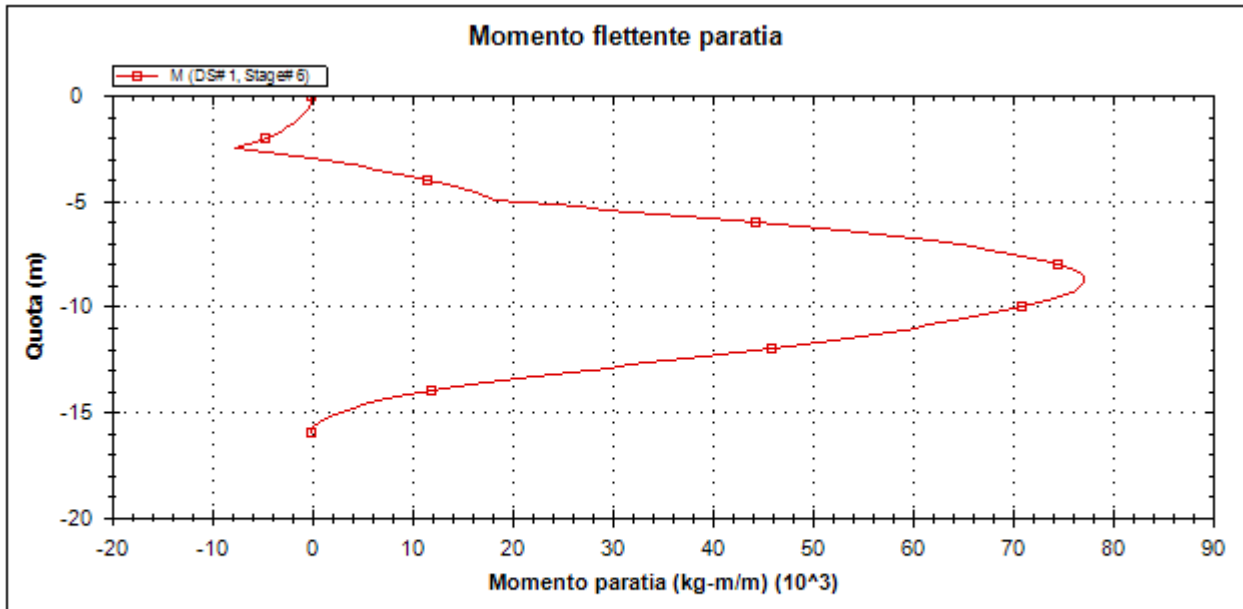
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Engineer: Engineer		Paratie Plus 2010 - DeepXcav 2010
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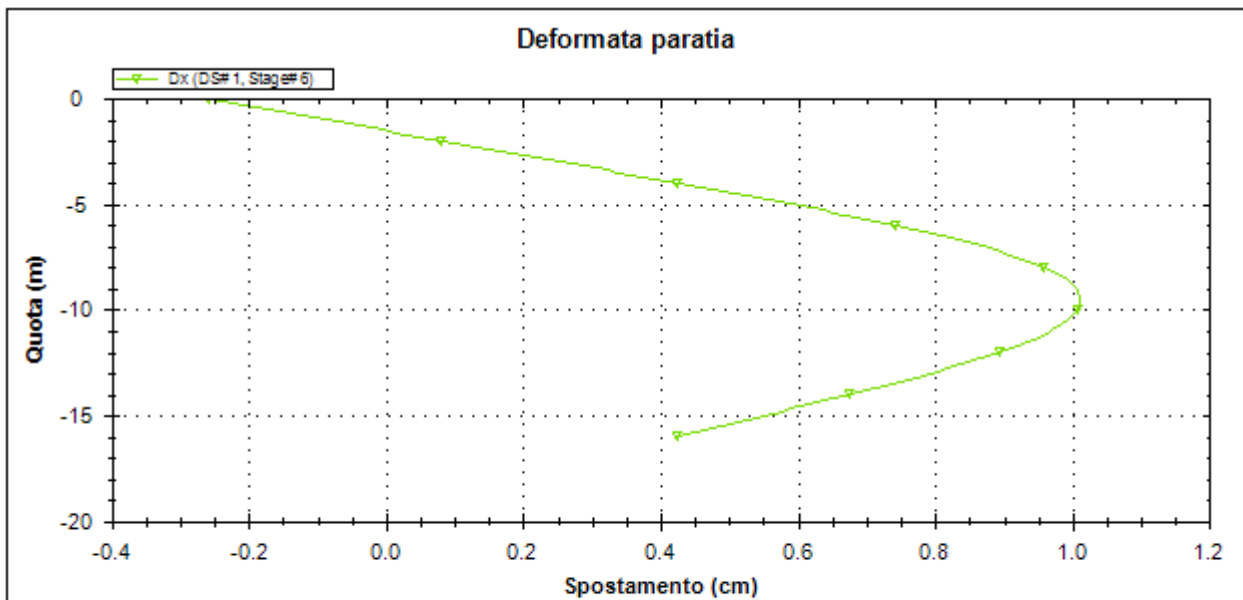
Company: My Company	DS: 1, 2 Tirante	CeAS srl and Deep Excavation LCC
Engineer: Engineer		Paratie Plus 2010 - DeepXcav 2010
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Company: My Company	DS: 1, 2 Tirante	CeAS srl and Deep Excavation LCC
Engineer: Engineer		Paratie Plus 2010 - DeepXcav 2010
C:\Us...rs\Filippo\Desktop\Calcoli Paratie\488 Messina\Rfi\PALI.DEEP		11/15/2010



Company: My Company	DS: 1, Fondo scavo	CeAS srl and Deep Excavation LCC
Engineer: Engineer		Paratie Plus 2010 - DeepXcav 2010
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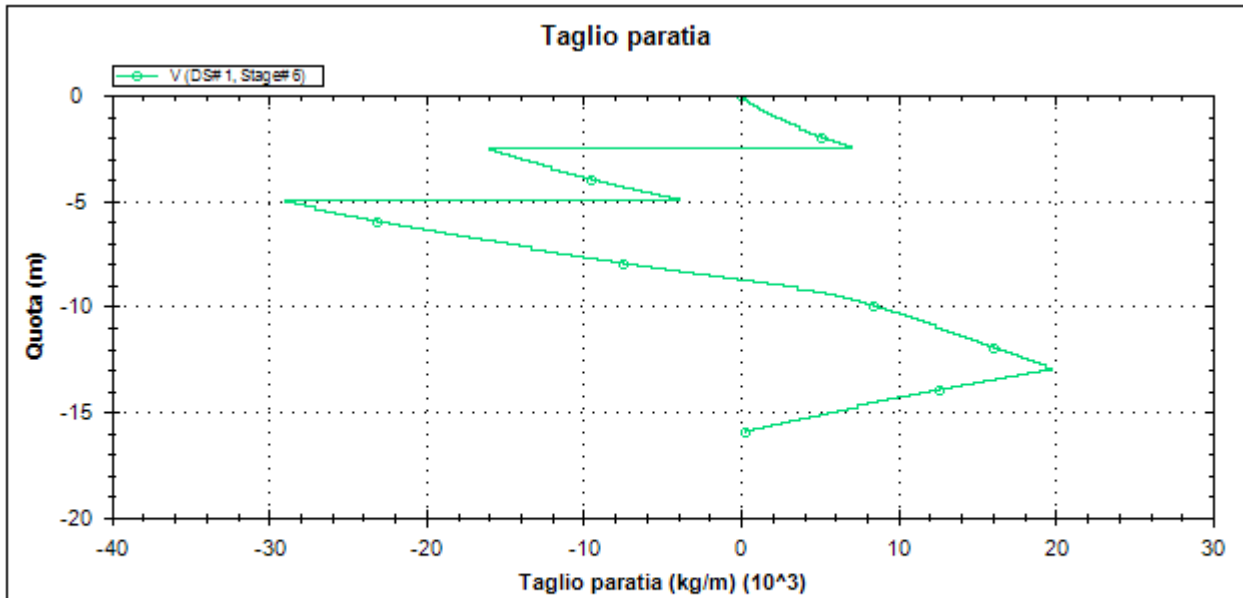
Company: My Company	DS: 1, Fondo scavo	CeAS srl and Deep Excavation LCC
Engineer: Engineer		Paratie Plus 2010 - DeepXcav 2010
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RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

Codice documento
SS0558_F0.doc

Rev
F0

Data
20/06/2011



Company: My Company	DS: 1, Fondo scavo	CeAS srl and Deep Excavation LCC
Engineer: Engineer		Paratie Plus 2010 - DeepXcav 2010
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		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
		RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD	<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0

Progetto: PALI RFI
Risultati per la Design Section 2: 0: DM08_ITA: Comb. 2: A2+M2+R1

APPROCCI DI PROGETTO E FATTORI DI COMBINAZIONE

Scenari di progetto utilizzati (da Normativa o personalizzati) e relativi fattori di combinazione

Stag	Design	Design	F(tan	F	F	F	F(per	F(tem	F(per	F(tem	F	F	F	F	F	F	F	F
	Name		fr)	(c')	(Su)	(EQ)	load)	load)	sup)	sup)	(Dsta	(stab)	(Dsta	(stab)	(Dsta	(stab)	(Dsta	(stab)
0	DM08 IT	2:	1.25	1.25	1.4	0	1	1.3	1.2	1.1	1	1	1	1	1.35	0.9	1	1
1	DM08 IT	2:	1.25	1.25	1.4	0	1	1.3	1.2	1.1	1	1	1	1	1.35	0.9	1	1
2	DM08 IT	2:	1.25	1.25	1.4	0	1	1.3	1.2	1.1	1	1	1	1	1.35	0.9	1	1
3	DM08 IT	2:	1.25	1.25	1.4	0	1	1.3	1.2	1.1	1	1	1	1	1.35	0.9	1	1
4	DM08 IT	2:	1.25	1.25	1.4	0	1	1.3	1.2	1.1	1	1	1	1	1.35	0.9	1	1
5	DM08 IT	2:	1.25	1.25	1.4	0	1	1.3	1.2	1.1	1	1	1	1	1.35	0.9	1	1
6	DM08 IT	2:	1.25	1.25	1.4	0	1	1.3	1.2	1.1	1	1	1	1	1.35	0.9	1	1
7	DM08 IT	2:	1.25	1.25	1.4	0	1	1.3	1.2	1.1	1	1	1	1	1.35	0.9	1	1

Stage=Fase di scavo

Design Code=Codice di verifica

Ftan fr=fattore moltiplicatore tangente angolo di attrito

F C'=fattore moltiplicatore coesione efficace

F Su'=fattore moltiplicatore coesione non drenata

F EQ=fattore moltiplicatore azione sismica

F perm load=fattore moltiplicatore carichi permanenti

F temp load=fattore moltiplicatore carichi accidentali/variabili

F perm supp=fattore di riduzione resistenza per verifica pull out tirante

F temp supp=fattore di riduzione resistenza per verifica pull out tirante

F earth Dstab=fattore moltiplicatore per spinta attiva nel caso sfavorevole

F earth stab=fattore moltiplicatore per spinta attiva nel caso favorevole

F GWT Dstab (ground water)=fattore moltiplicatore per spinta idrostatica sfavorevole

F GWT stab (ground water)=fattore moltiplicatore per spinta idrostatica favorevole

F HYD Dstab=fattore moltiplicatore per spinta idrodinamica sfavorevole

F HYD stab=fattore moltiplicatore per spinta idrodinamica favorevole

F UPL Dstab=fattore moltiplicatore per sifonamento sfavorevole

F UPL stab=fattore moltiplicatore per sifonamento favorevole

DATI TERRENO

Name	g tot	g dry	Frict	C'	Su	FRp	FRcv	Eload	Eur	kAp	kPp	kAcv	kPcv	Vary	Spring	Color
	(daN/m ³)	(daN/m ³)	(deg)	(daN/	(daN/	(deg)	(deg)	(daN/m ²)	(daN/m	Springs	Springs	Springs	Springs		Model	
Strato	1900	1900	35	0	N/A	N/A	N/A	200000	600000	0.27	3.69	N/A	N/A	True	Linear	
Strato	1900	1631.55	38	0	N/A	N/A	N/A	400000	120000	0.24	4.2	N/A	N/A	True	Linear	

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011

gtot=peso specifico /totale terreno
gdry=peso secco del terreno
Frict=angolo di attrito di calcolo
C'=coesione efficace
Su = Coesione non drenata, parametro attivo per terreni tipo CLAY in condizioni NON drenate
Dilat=Dilatanza terreno (parametro valido solo in analisi non lineare)
Evc=modulo a compressione vergine molla equivalente terreno
Eur=modulo di scarico/ricarico (fase elastica) molla equivalente terreno
Kap= coefficiente di spinta attiva di picco
Kpp= coefficiente di spinta passiva di picco
Kacv= coefficiente di spinta attiva di picco
Kpcv= coefficiente di spinta passiva di picco
Spring models= modalità di definizione dei moduli di rigidezza molle terreno (LIN, EXP, SIMC)
LIN= Lineare-Elastico-Perfettamente plastico
EXP: esponenziale, SUB: Modulo di reazione del sottosuolo
SIMC= Modo semplificato per argille

STRATIGRAFIA TERRENI

Top Elev= quota superiore strato
Soil type=nome del terreno
OCR=rappporto di sovraconsolidazione
K0=coefficiente di spinta a riposo

Name: Boring 1, pos: (-8, 0)

Top elev.	Soil type	OCR	Ko
0	Strato1	1	0.43
-13	Strato2	1	0.38

DATI GENERALI RELATIVI A MATERIALI E PROPRIETA MECCANICHE ELEMENTI STRUTTURALI

Acciaio

Name	Strength Fy	Fu	Elastic E	Density g
	(daN/cm ²)	(daN/cm ²)	(daN/cm ²)	(daN/m ³)
S355	3620	5200.6	2100615.4	7851.8148

Calcestruzzo

Name	Strength Fc'	Elastic E	Density g	Tension Strength Ft
	(daN/cm ²)	(daN/cm ²)	(daN/m ³)	(daN/cm ²)
C25/30	254.9	320965.9	2549.291	10

Barre in acciaio

Name	Strength Fy	Elastic E
	(daN/cm ²)	(daN/cm ²)
S1862 (Strands)	18987.1	2141404
B450C	4588.7	2141404

Legno

Name	Ultimate Bending Srtength	Ultimate Tensile Strength	Ultimate Shear Strength	Density g	Elastic E
	(daN/cm ²)	(daN/cm ²)	(daN/cm ²)	(daN/m ³)	(daN/cm ²)
Regular grade	70.4	70.4	41.8	801.2522	56288.3

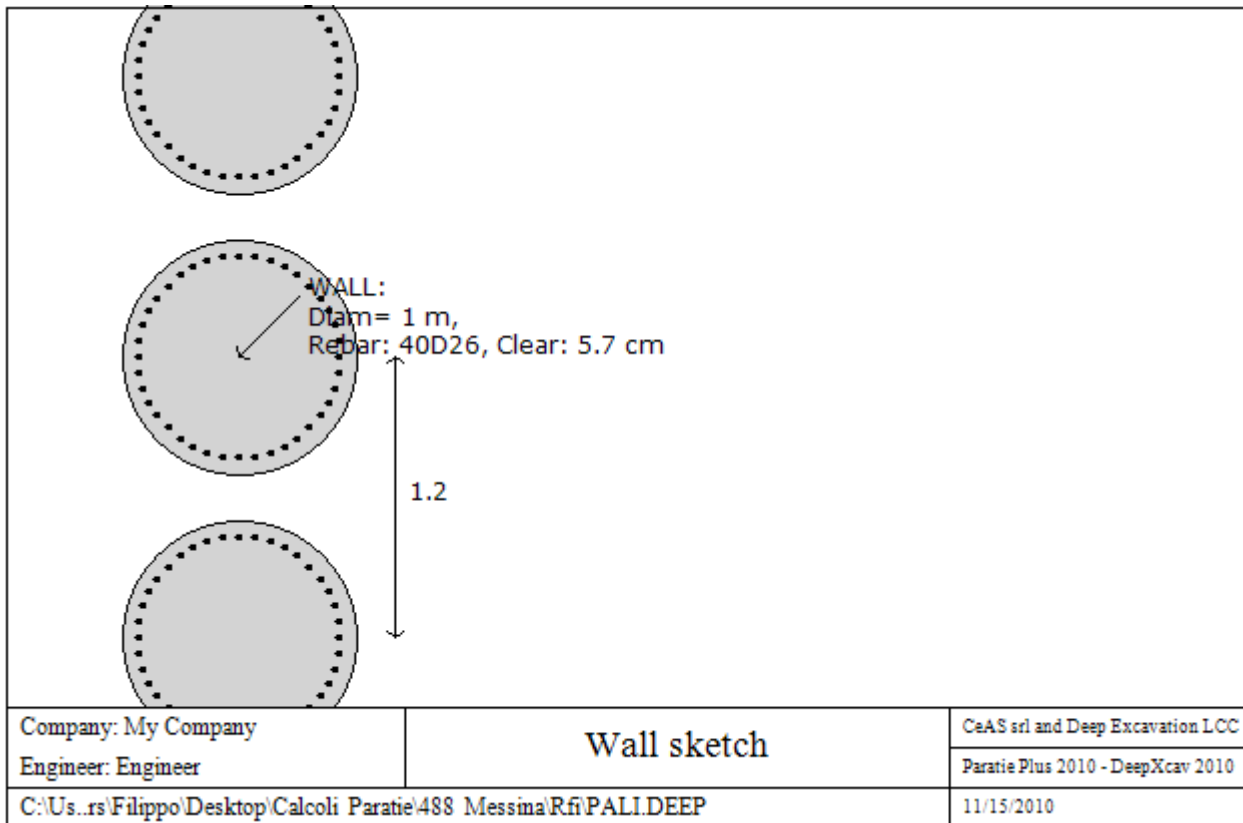
		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO					
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<table border="1" style="width: 100%; border-collapse: collapse;"> <thead> <tr> <th style="text-align: left;"><i>Rev</i></th> <th style="text-align: left;"><i>Data</i></th> </tr> </thead> <tbody> <tr> <td style="text-align: left;">F0</td> <td style="text-align: left;">20/06/2011</td> </tr> </tbody> </table>	<i>Rev</i>	<i>Data</i>	F0	20/06/2011
<i>Rev</i>	<i>Data</i>						
F0	20/06/2011						

STEEL=acciaio
Name=nome materiale
strength $f_y=f_yk$ =res caratteristica acciaio
Fu=fuk=resistenza ultima
Elastic E=modulo elastico
Density g=peso specifico
CONCRETE=calcestruzzo
Name=nome materiale
 $f_c=f_{ck}$ =resistenza cilindrica a compressione caratteristica cls
Elastic E=modulo elastico
Density g=peso specifico
Tension strength= $f_t=f_{tk}$ =resistenza a trazione caratteristica
STEEL REBAR
Name=nome materiale
strength $f_y=f_yk$ =resistenza caratteristica acciaio
Elastic E=modulo elastico
WOOD=legno
Name=nome materiale
Ultimate bending strength $F_b=f_{bk}$ =resistenza caratteristica a flessione
Ultimate tensile strength $F_{tu}=f_{tuk}$ =res caratt. parallela alle fibre
Ultimate shear strength $F_{vu}=f_{vuk}$ =res. caratt. a taglio
Density g=peso specifico
Elastic E=modulo elastico

DATI PARATIE

Sezione paratia0: Berlinese Sx

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011



Wall uses wall section0: PALI 1000

Tipo paratia: Pali tangenti: pali in calcestruzzo armato

Quota sommita' paratia: 0 m Quota piede paratia: -16 m

Dimensione fuori piano paratia: 1.2 Spessore paratia = 1

Ampiezza zona spinta passiva al di sotto del piano di scavo: 1 Ampiezza zona spinta attiva al di sotto del piano di scavo: 1

fc' cls = 254.9 Fy barre = 4588.7 Ecls = 320965.9 FcT calcestruzzo a trazione = 10% di Fc'

fy profilati in acciaio = 3620 Eacciaio = 2100615.4

Attrito paratia: % attrito terreno = 50%

Le capacita' paratie in acciaio sono calcolate con NTC 2008

Le capacita' paratie in calcestruzzo sono calcolate con ACI 318-2002.

Nota: con la capacita' ultima si dovrebbe adottare un fattore di sicurezza strutturale.

Proprieta' paratie di pali tangenti

Concrete section type: Rectangular

Section dimensions

D = 100 m B = 100 m A = 7853.98163397448 cm² Ixx = 4908738.52123405 cm⁴

Longitudinal reinforcement

Top rebars: N = 40 bars #D26 = AsTop 212.36 cm², Ctop = 7 m

Bottom rebars: N = 40 bars #D25 = AsBot NaN cm², Cbot = 7 m

Shear reinforcements

Bar #D10 = As 0.785 cm², sV = 12 m, sH = 25 m

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<i>Rev</i>	<i>Data</i>						
F0	20/06/2011						

DATI GENERALI PARATIA

Hor wall spacing=interasse tra pannelli
passive width below exc=larghezza di riferimento per calcolo zona passiva per analisi classica
concrete $f'c=fck$ =res cilindrica caratteristica cls
Rebar $f_y=fyk$ =res caratteristica acciaio armature
Econc=modulo elastico cls
Concrete tension $fct=fctk$ =resistenza caratteristica a trazione cls
Steel members $f_y=fyk$ =res caratteristica acciaio
Esteel=modulo elastico acciaio

DATI TABELLATI (si omette la spiegazione dei parametri già descritti in precedenza)

1) Diaphragm wall=sezione rettangolare in CA

N/A= il valore non è disponibile in quanto non correlato al tipo di sezione in uso

$F_y=fyk$

$F'c=fck$

D=altezza paratia

B=base paratia

tf=spessore

2) Steel sheet pile=palancolata

DES=tipo di palancolata

Shape=forma

W=peso per unità di lunghezza

A=area

h=altezza

t=spessore lamiera orizzontale

b=base singolo elemento a Z o U

s=spessore lati obliqui

I_{xx} =inerzia asse principale palancolata (per unità di lunghezza)

S_{xx} =modulo di resistenza asse principale palancolata (per unità di lunghezza)

3) Secant pile wall (pali allineati e sovrapposti), Tangent pile wall=pali allineati (Berlinesi, micropali), soldier pile (pali in acciaio con collegamento in cls), soldier pile and timber lagging (pali in acciaio con collegamento con elementi in legno)

W=peso per unità di lunghezza

A=area

D=diametro

tw o tp=spessore dell'anima (sezione a l) o del tubo (sezione circolare)

bf=larghezza della sezione

tf=spessore dell'ala

k=altezza flangia + altezza raccordo

I_{xx} =inerzia rispetto asse orizzontale (per unità di lunghezza)

S_{xx} =modulo di resistenza rispetto asse orizzontale (per unità di lunghezza)

r_x =raggio giratore d'inerzia lungo x

I_{yy} =inerzia rispetto asse verticale (per unità di lunghezza)

S_{yy} =modulo di resistenza rispetto asse verticale (per unità di lunghezza)

r_y =raggio giratore d'inerzia lungo y

Cw=costante di ingobbamento

$f_y=fyk$

DATI VINCOLI, TIRANTI, PUNTONI, ECC

Support 0: type = tieback

X = 1 m, Z = -2.5 m, S = 1.2 m

Lfree = 7.782 m, Lfix = 7.5 m, Rfix = 90 %

Walls: Berlinese Sx

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011

Stage No	Active	Prestress	Slab live load	User add. strain
	Si'/No	(daN)	(daN/m2)	+expansion
0	No	22500	-	-
1	No	22500	-	-
2	No	22500	-	-
3	Si'	22500	-	-
4	Si'	22500	-	-
5	Si'	22500	-	-
6	Si'	22500	-	-
7	Si'	22500	-	-

Support 1: type = tieback

X = 1 m, Z = -5 m, S = 1.2 m

Lfree = 6.684 m, Lfix = 5 m, Rfix = 80 %

Walls: Berlinese Sx

Stage No	Active	Prestress	Slab live load	User add. strain
	Si'/No	(daN)	(daN/m2)	+expansion
0	No	22500	-	-
1	No	22500	-	-
2	No	22500	-	-
3	No	22500	-	-
4	No	22500	-	-
5	Si'	22500	-	-
6	Si'	22500	-	-
7	Si'	22500	-	-

Support type= tipo di vincolo

Tieback=tirante

Strut=puntone

Raker=Sbadacchio

LEGENDA PER TIRANTI

Dati generali

Z=quota vincolo

S=interasse in direzione orizzontale

Lfree=lunghezza tratto elastico

Lfix=lunghezza tratto rigido

Rfix=% sfruttamento tratto rigido

Stage No=numero step di scavo

Active=stato tirante (YES=attivo)

Post stress= precarico tirante (carico moltiplicato per interasse)

Walls= indica il nome della paratia alla quale il vincolo è applicato

Nel caso di solette indica il punto di partenza e cioè la paratia di sinistra

PARAMETRI DI CALCOLO PER SINGOLA FASE

Summary of stage assumptions

Name	Analysis	Drive	ka-Mult	Htr T/B	Resist	Res	Contlev	Support	Axial	Used	Min	Toe	Toe
	Method	Press		(%)	Press	Mult	Method	Model	Incl	FSwall	FDtoe	FSrot	FSpas
Stage 0	Springs-Up	Ka	N/A	N/A	Kp+ d	N/A		Fixed	N/A	1	0	0	0

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011

Stage 1	Springs-Up	Ka	N/A	N/A	Kp+ d	N/A		Fixed	N/A	1	0	0	0
Stage 2	Springs-Up	Ka	N/A	N/A	Kp+ d	N/A		Fixed	N/A	1	0	0	0
Stage 3	Springs-Up	Ka	N/A	N/A	Kp+ d	N/A		Fixed	N/A	1	0	0	0
Stage 4	Springs-Up	Ka	N/A	N/A	Kp+ d	N/A		Fixed	N/A	1	0	0	0
Stage 5	Springs-Up	Ka	N/A	N/A	Kp+ d	N/A		Fixed	N/A	1	0	0	0
Stage 6	Springs-Up	Ka	N/A	N/A	Kp+ d	N/A		Fixed	N/A	1	0	0	0
Stage 7	Springs-Up	Ka	N/A	N/A	Kp+ d	N/A		Fixed	N/A	1	0	0	0

Name=nome fase

Analysis method=metodo di calcolo

CONventional=analisi all'equilibriolimito

springs UP=analisi non lineare (schema a molle elasto plastiche)

DR=analisi per terreni tipo argilla in condizione drenata

U=analisi per terreni tipo argilla in condizione NON drenata

Up=analisi non drenata solo per i terreni selezionati

Drive press=Ka=spinta terreno attiva

ka mult=eventuale moltiplicatore Ka

Htr T/B (%)=schema pressione attiva di tipo trapezoidale

Resit press=Kp=spinta terreno passiva

Res Mult=eventuale moltiplicatore Kp

COntle Method=

Support Model=tipologia vincoli fissi (fixed=fissi)

Axial Incl=se azione assiale inclusa

Used FS wall=coeff di riduzione dominio MN

Min FD TOe=sicurezza minima per infissione (analisi classica)

Toe FS rot=sicurezza a rotazione (analisi classica)

Toe FSpas=sicurezza sulle pressioni agenti/resistenti (analisi classica)

GRAFICI FASI DI SCAVO

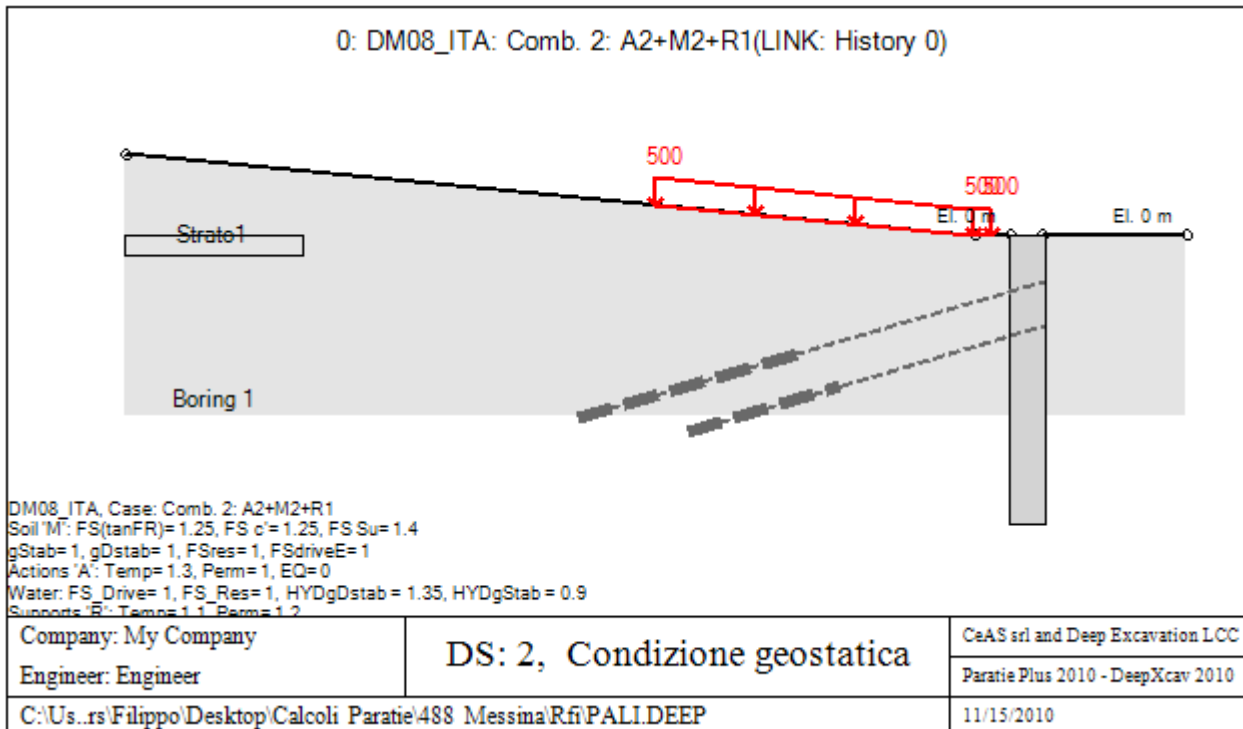
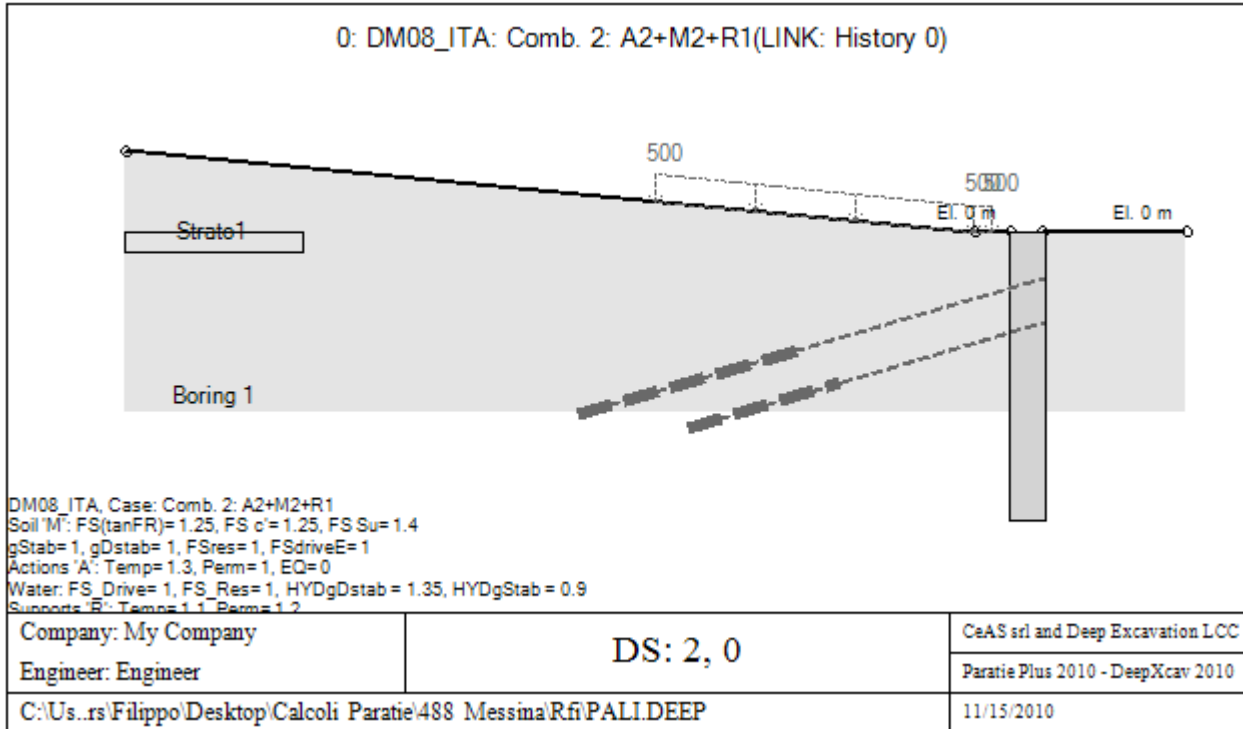
Di seguito si riportano gli schemi grafici delle fasi di scavo principali.

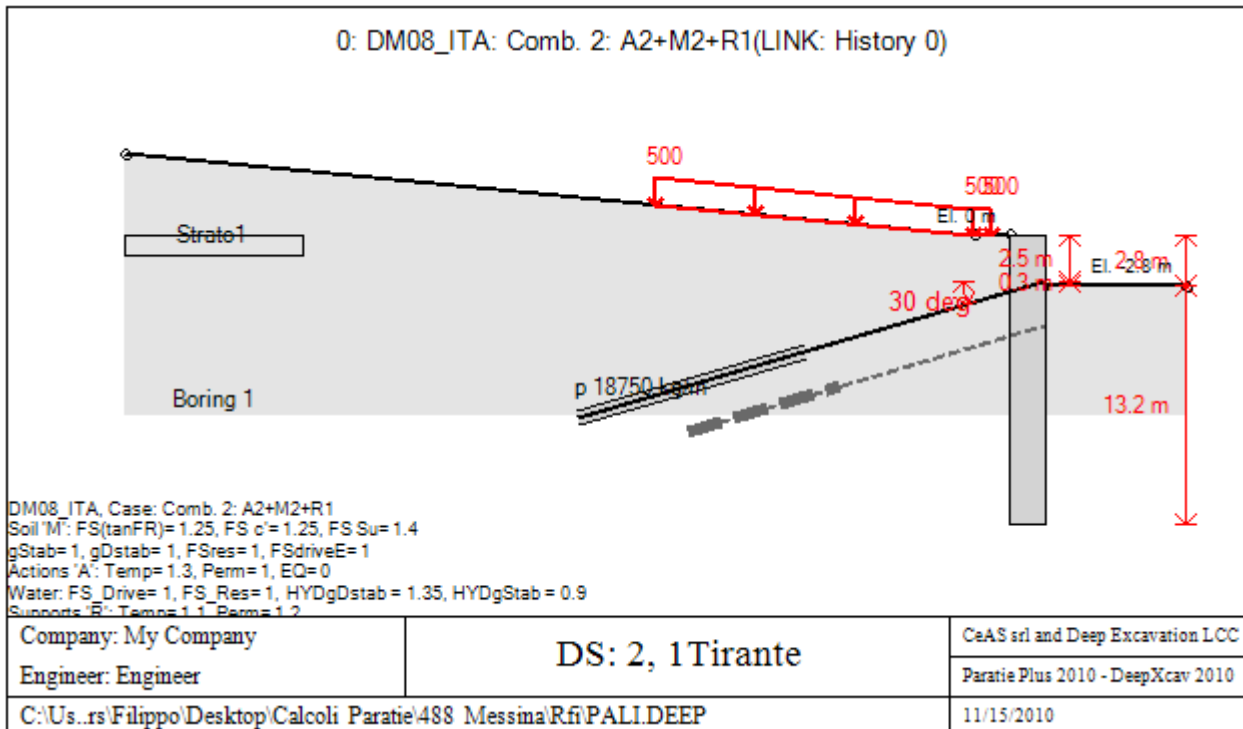
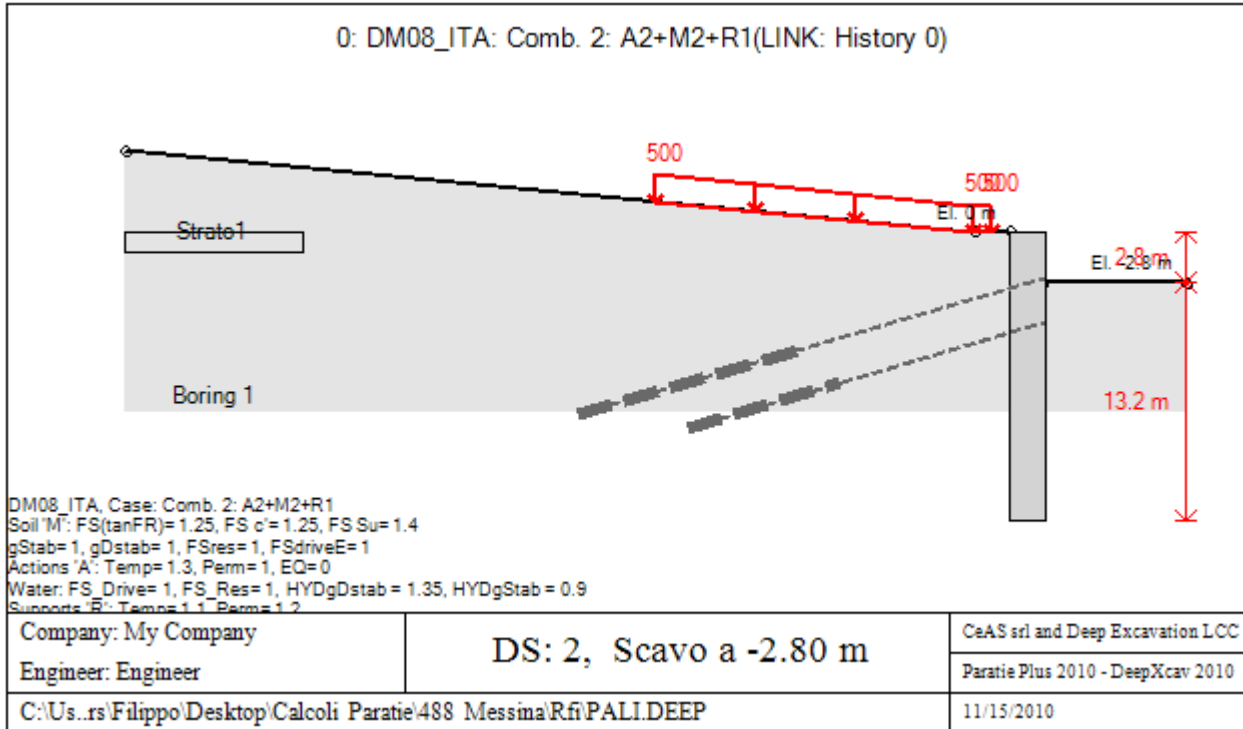
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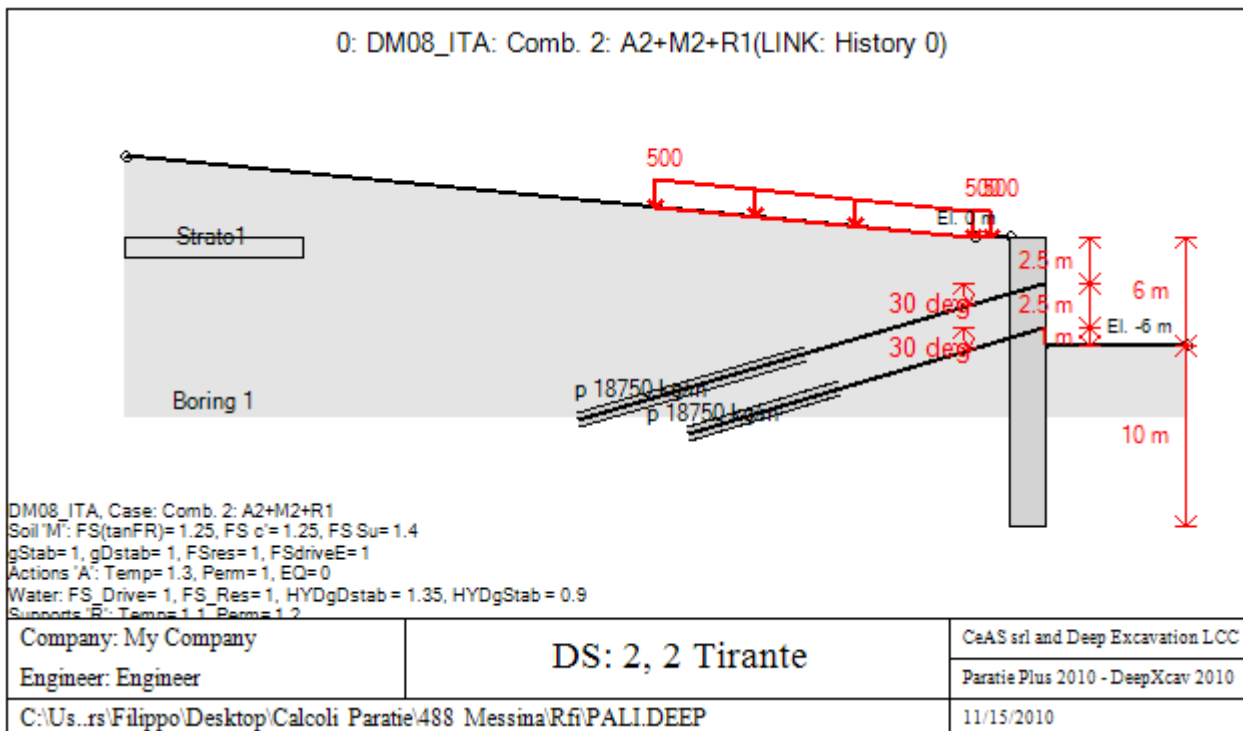
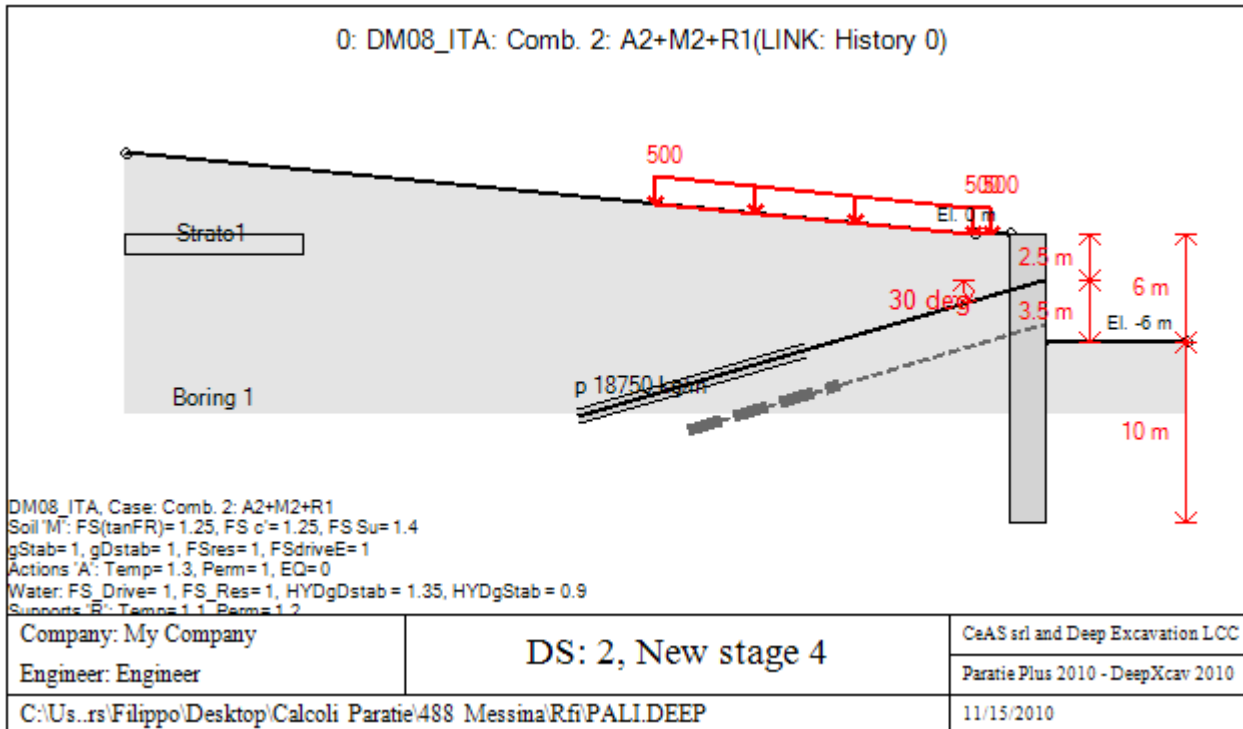
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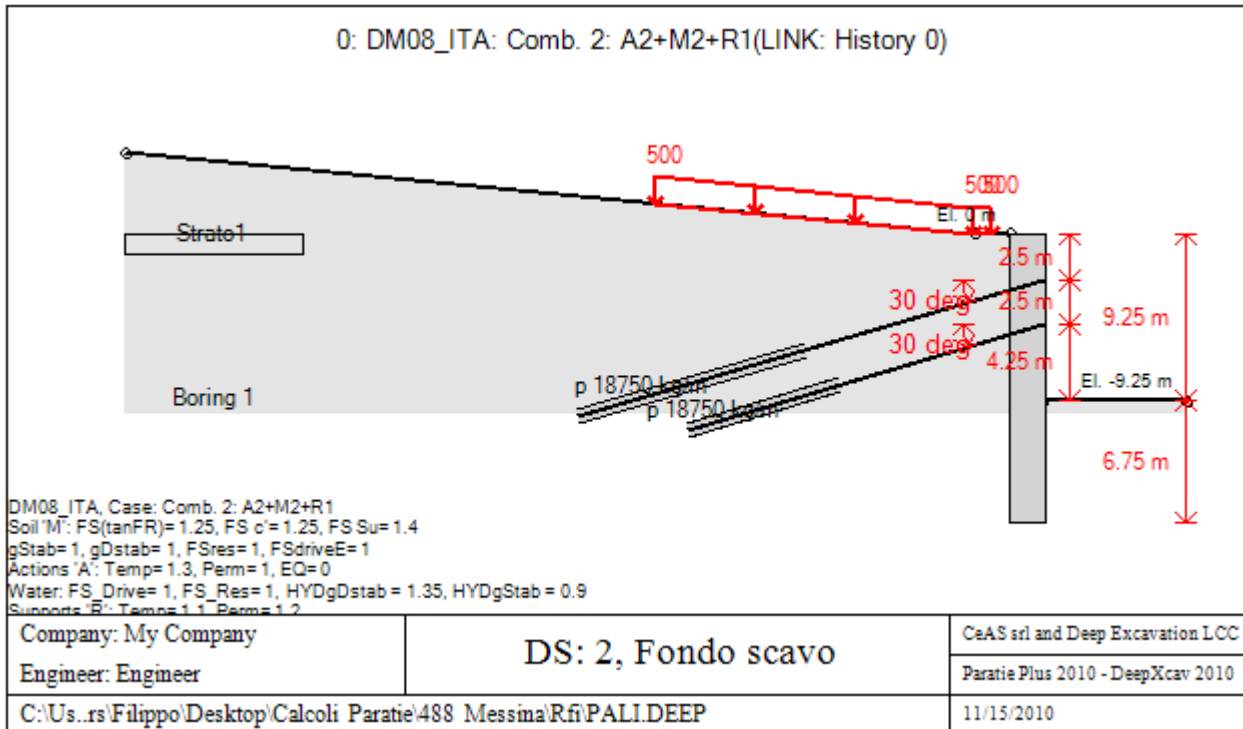
Rev
F0

Data
20/06/2011









Stabilita' del piede

Embedment FS vs Stage

	Min Toe FS	FS1 Passive	FS2 Rotation	FS3 Length (from FS1,	FS4 Mobilized	FS5 Actual Drive Thrust /
Stage #0	N/A	N/A	N/A	N/A	9.413	1.328
Stage #1	N/A	N/A	N/A	N/A	9.382	1.333
Stage #2	N/A	N/A	N/A	N/A	7.136	1.196
Stage #3	N/A	N/A	N/A	N/A	7.594	1.336
Stage #4	N/A	N/A	N/A	N/A	5.241	1.184
Stage #5	N/A	N/A	N/A	N/A	5.388	1.317
Stage #6	N/A	N/A	N/A	N/A	2.979	1.205
Stage #7	N/A	N/A	N/A	N/A	2.979	1.205

GRAFICI FASI DI SCAVO

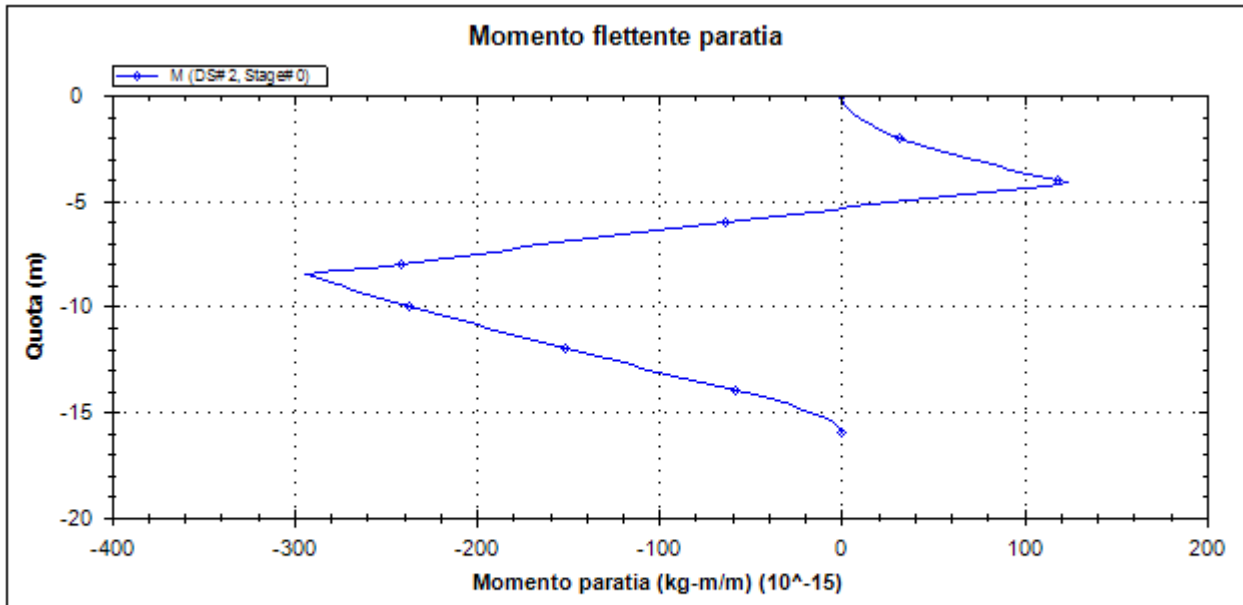
Di seguito si riportano gli schemi grafici delle fasi di scavo principali.

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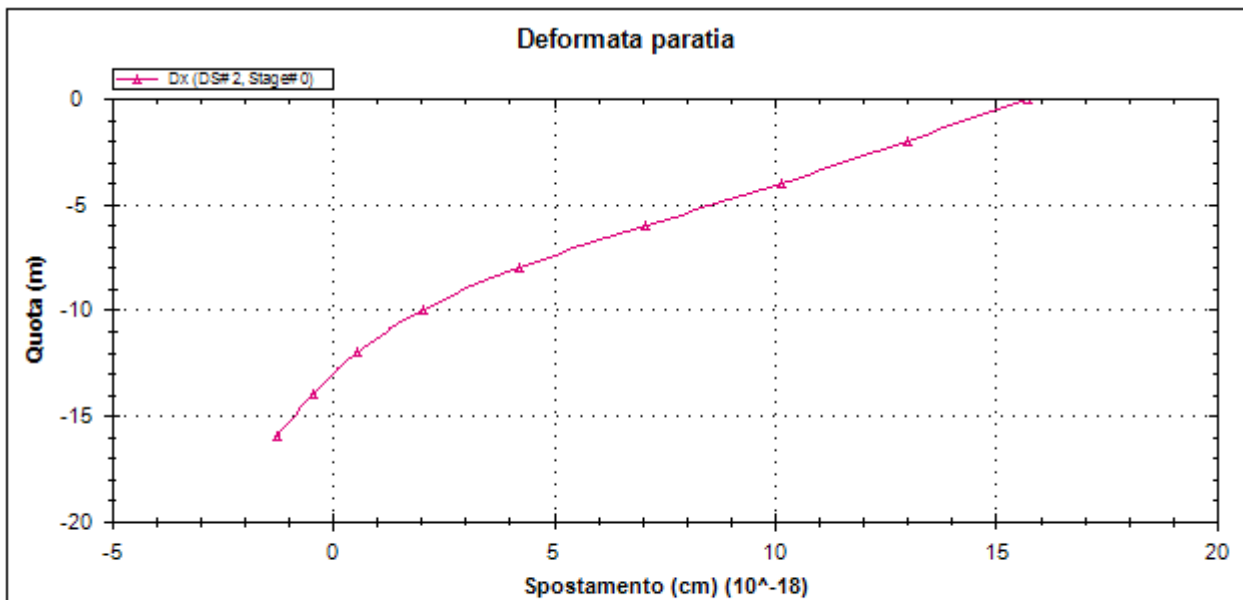
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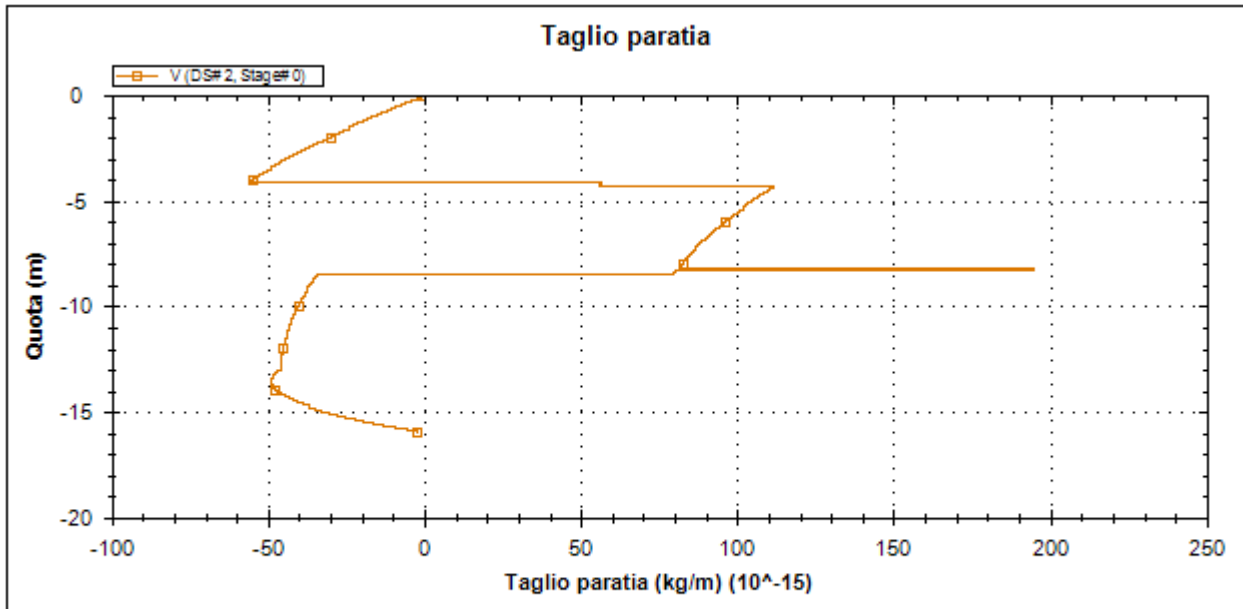
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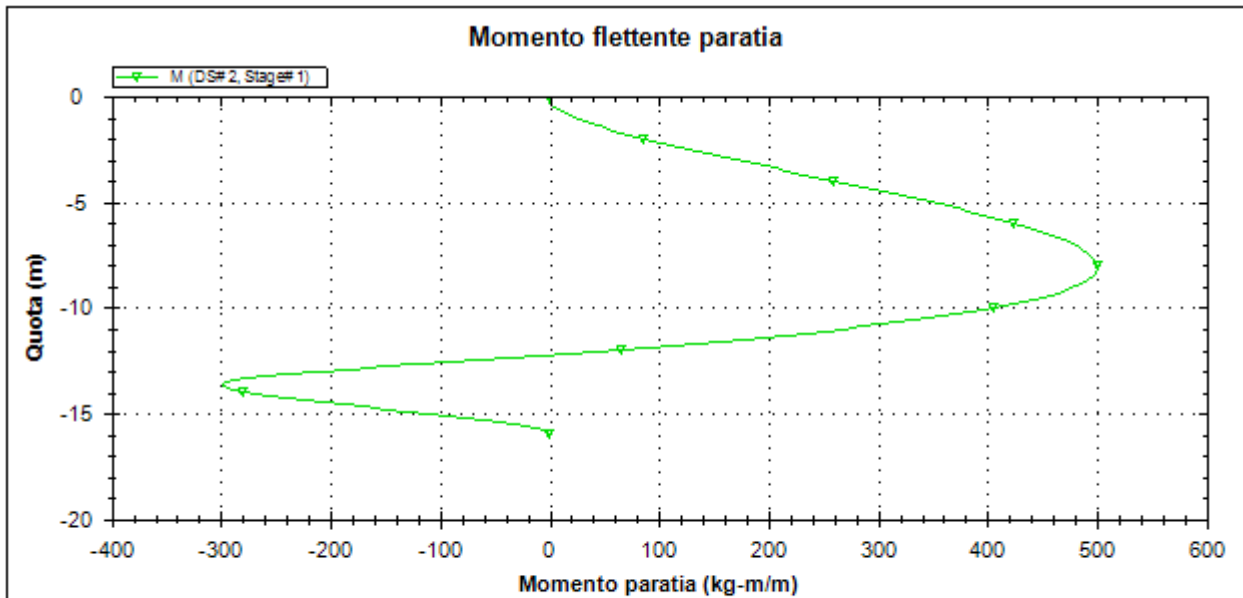
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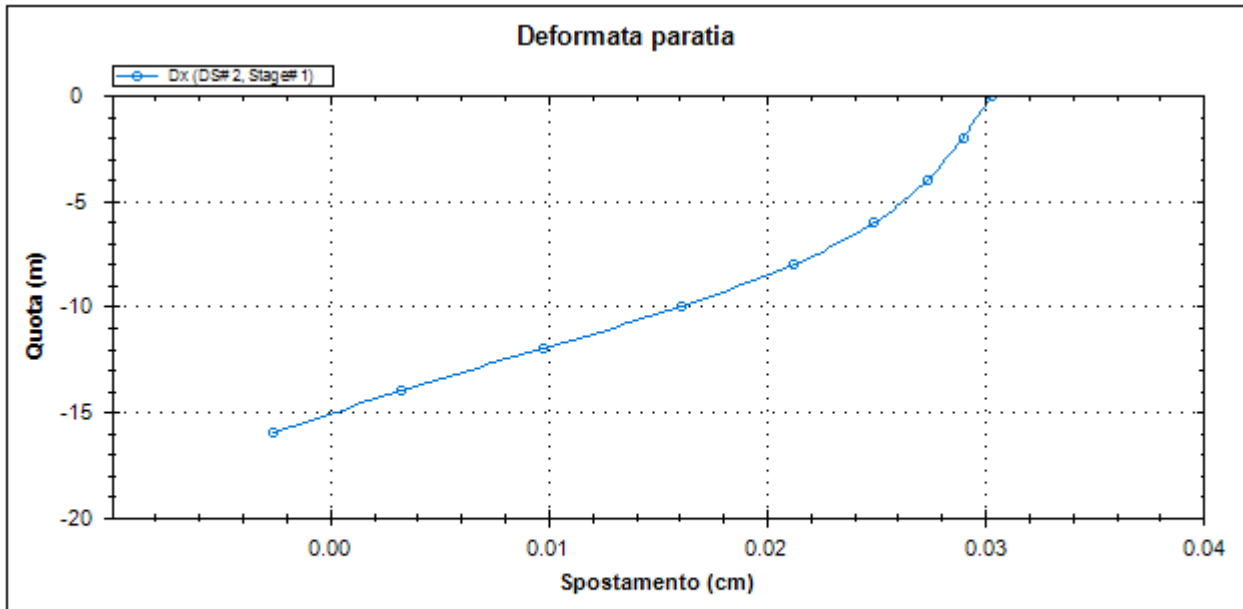
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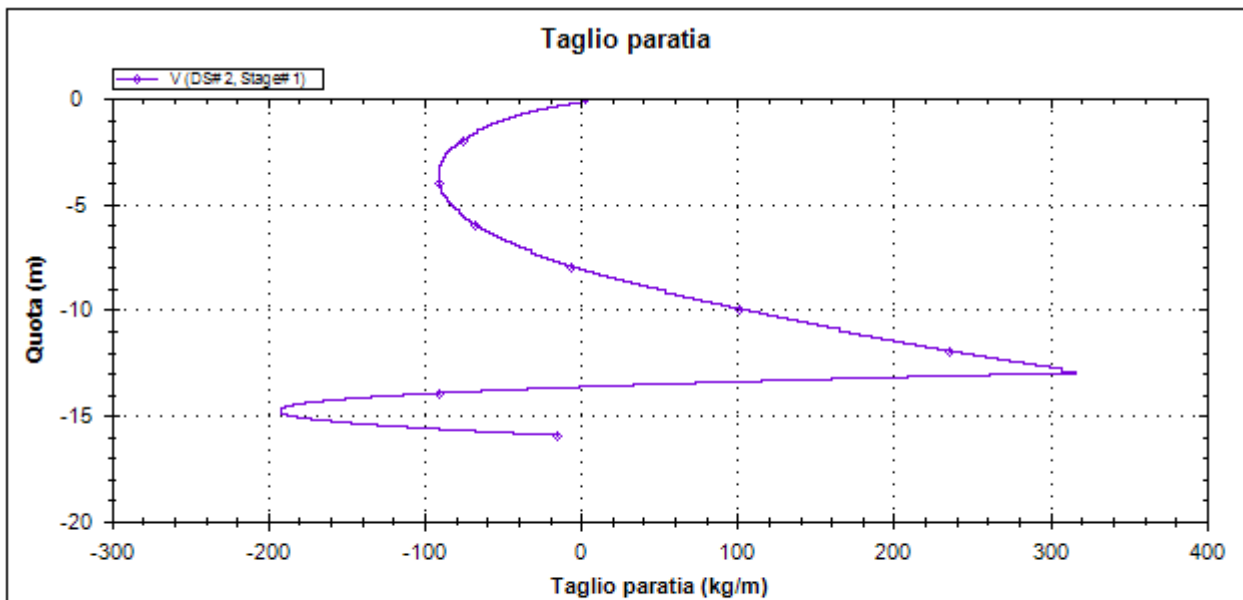
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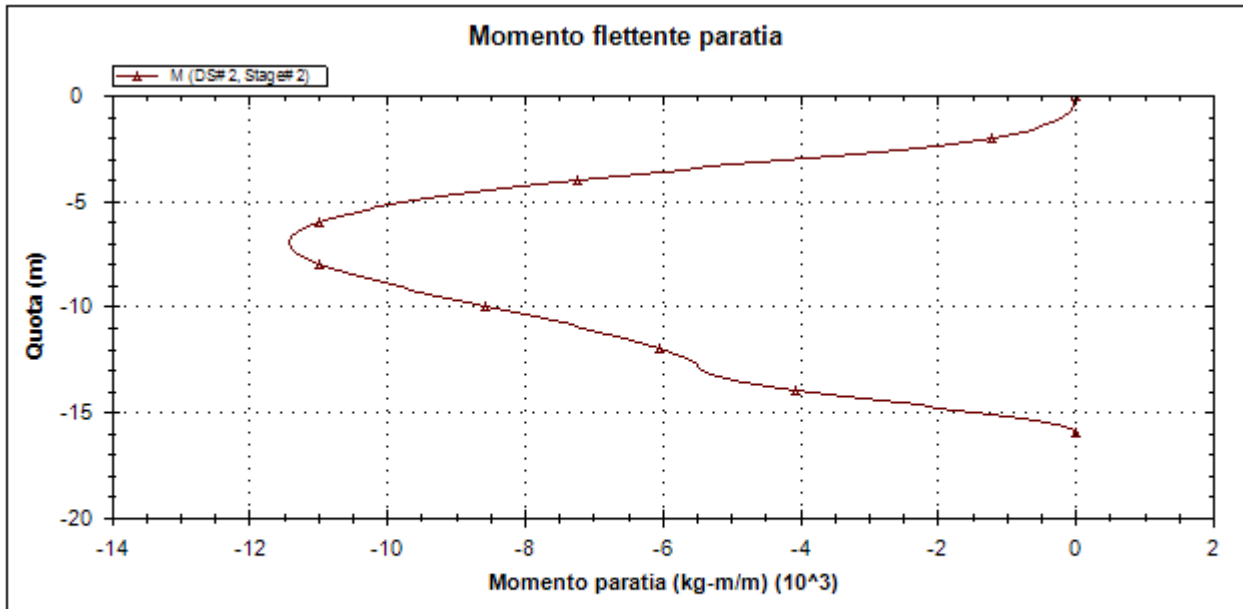
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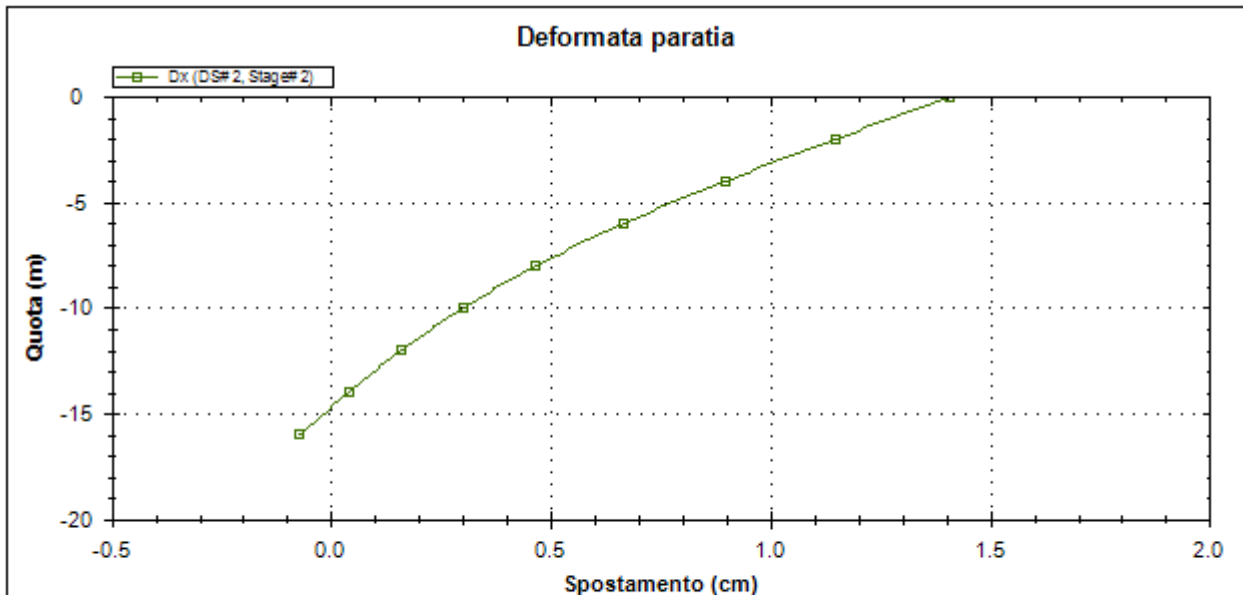
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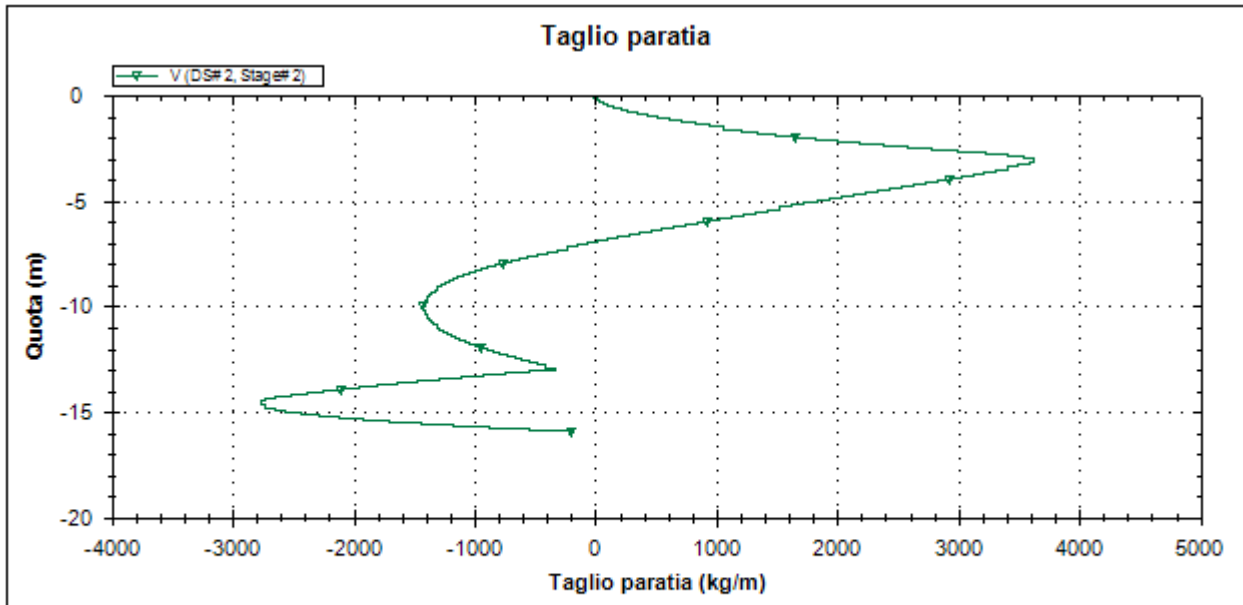
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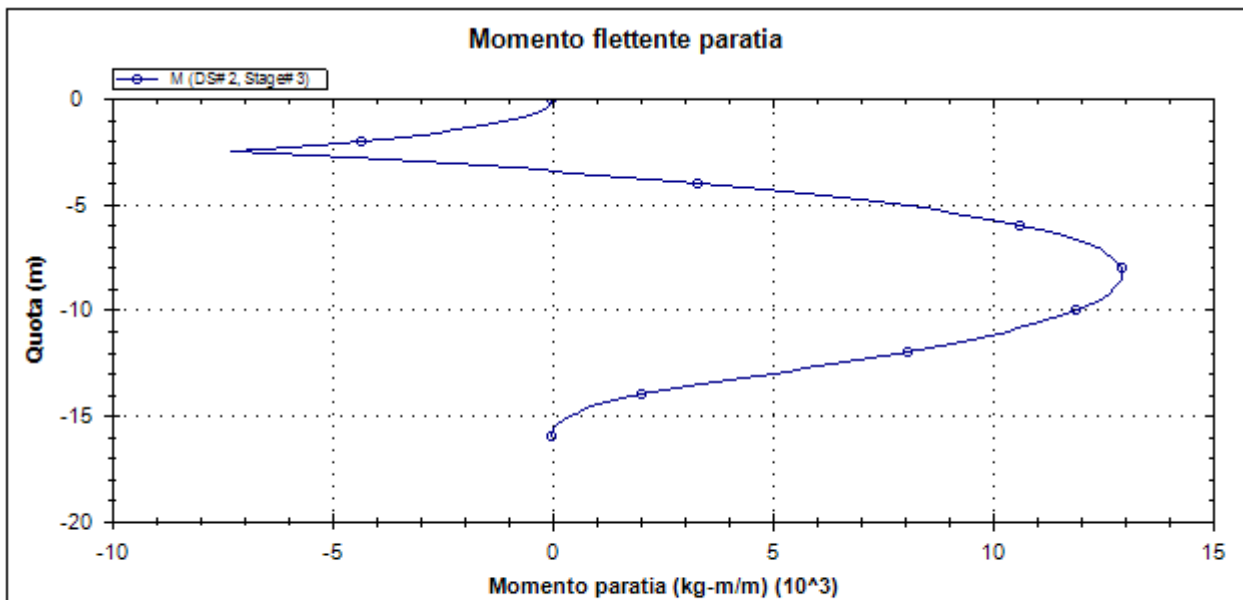
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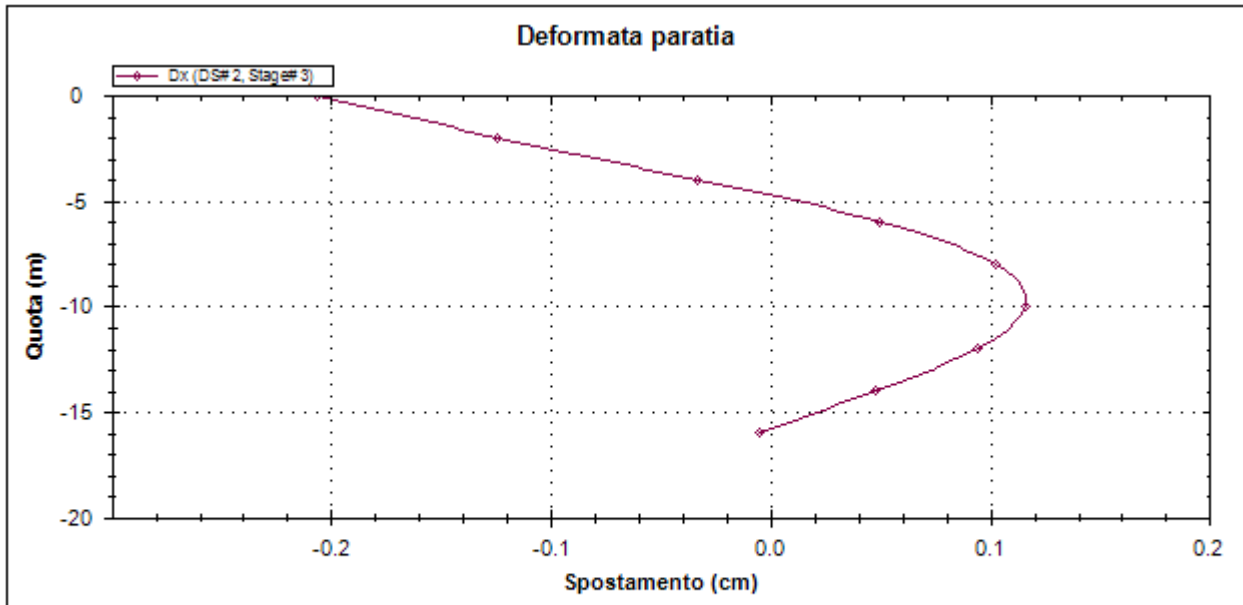
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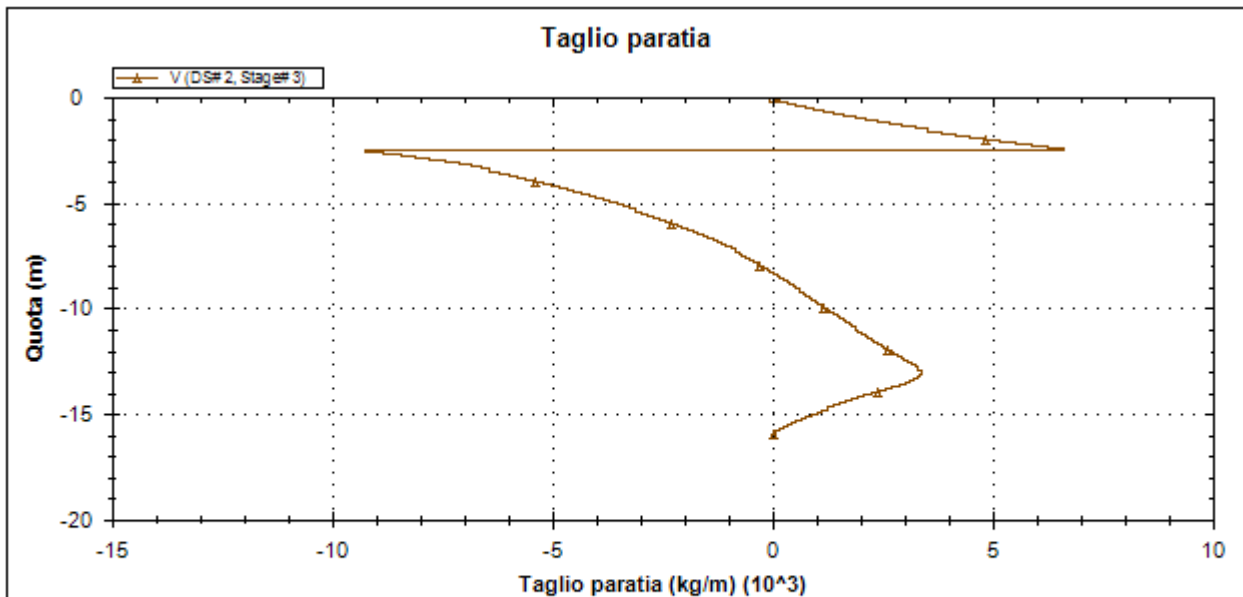
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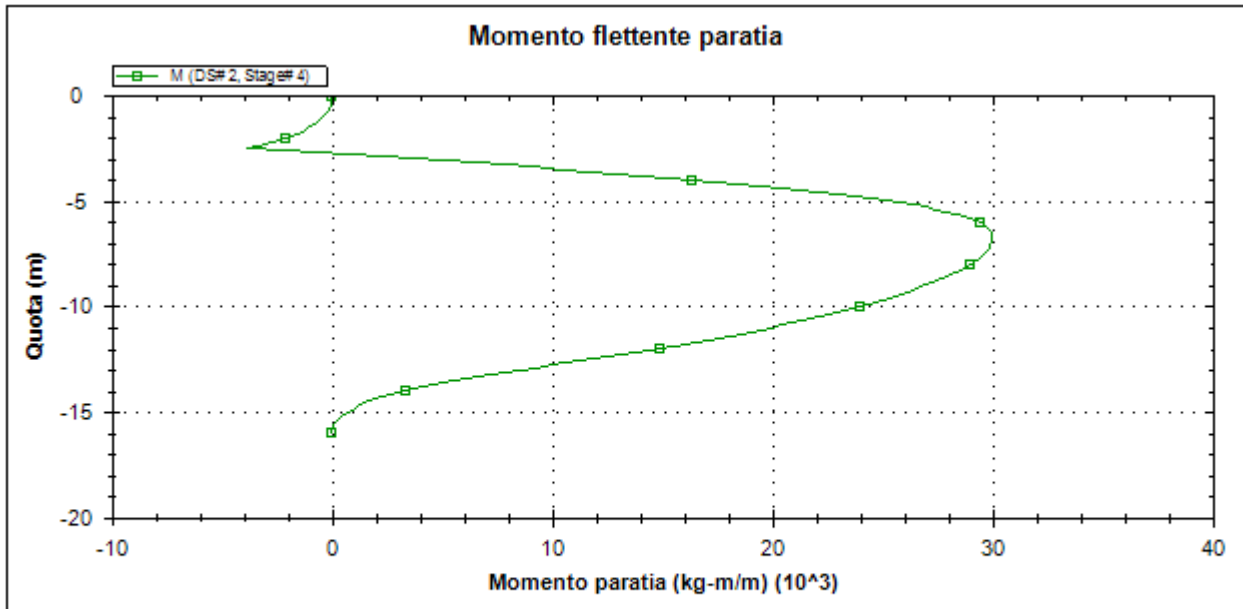
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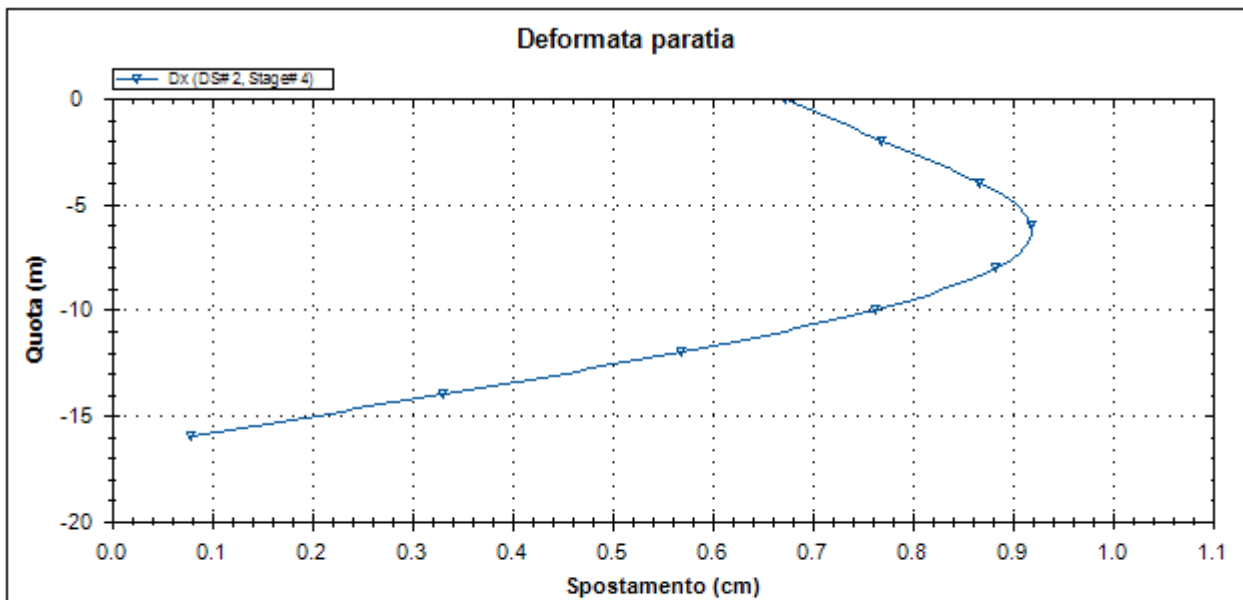
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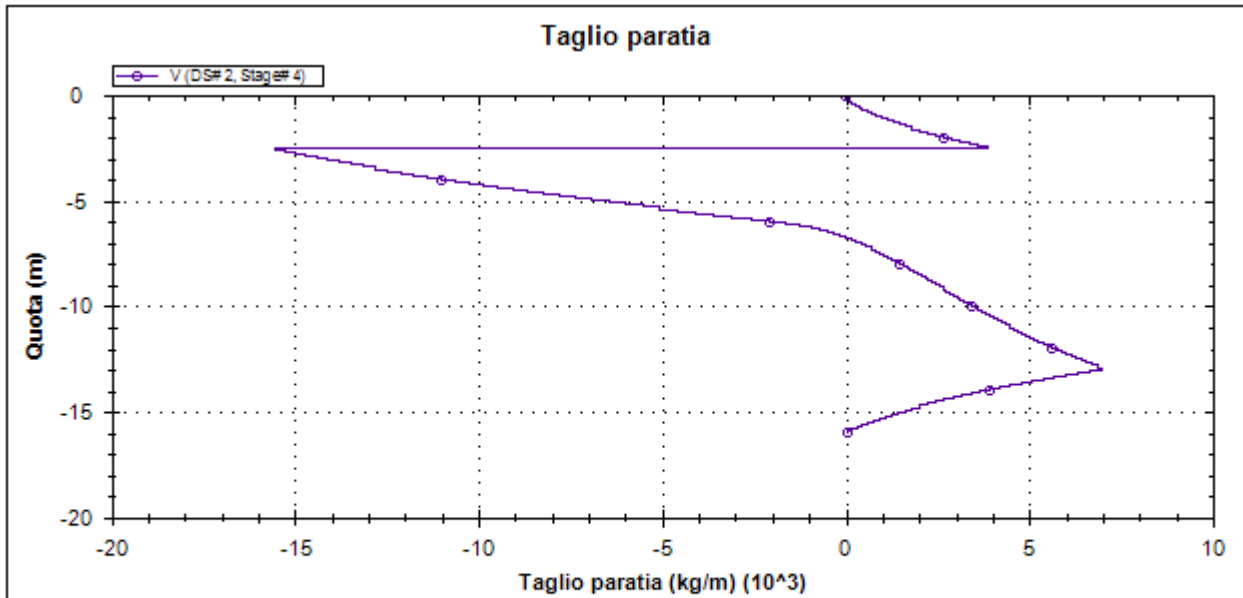
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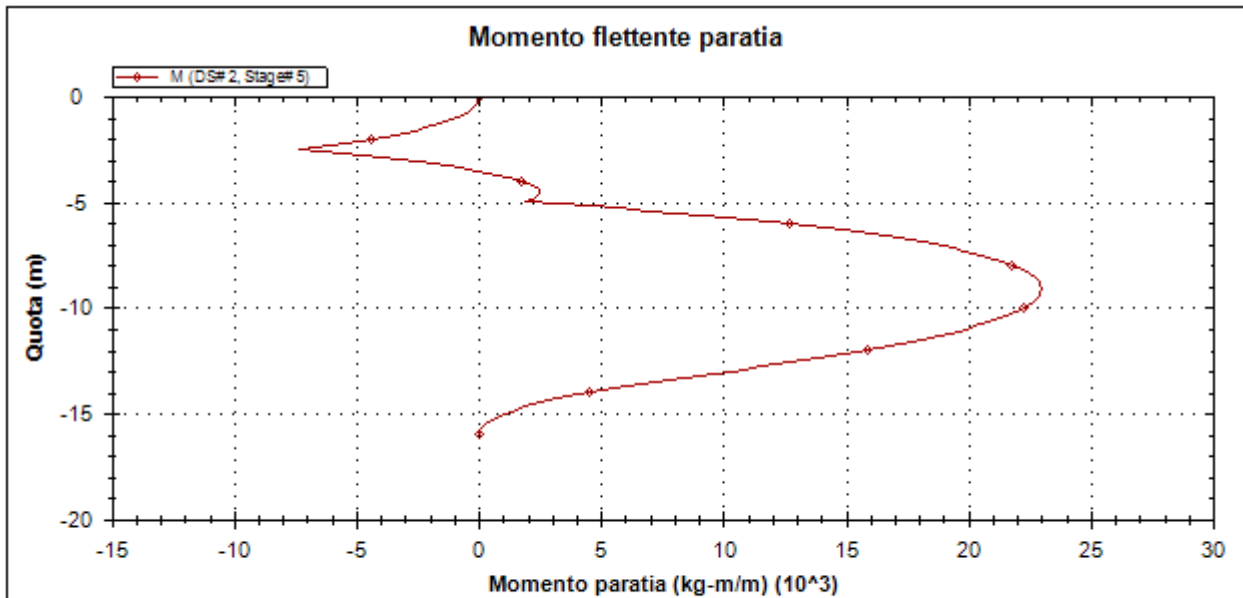
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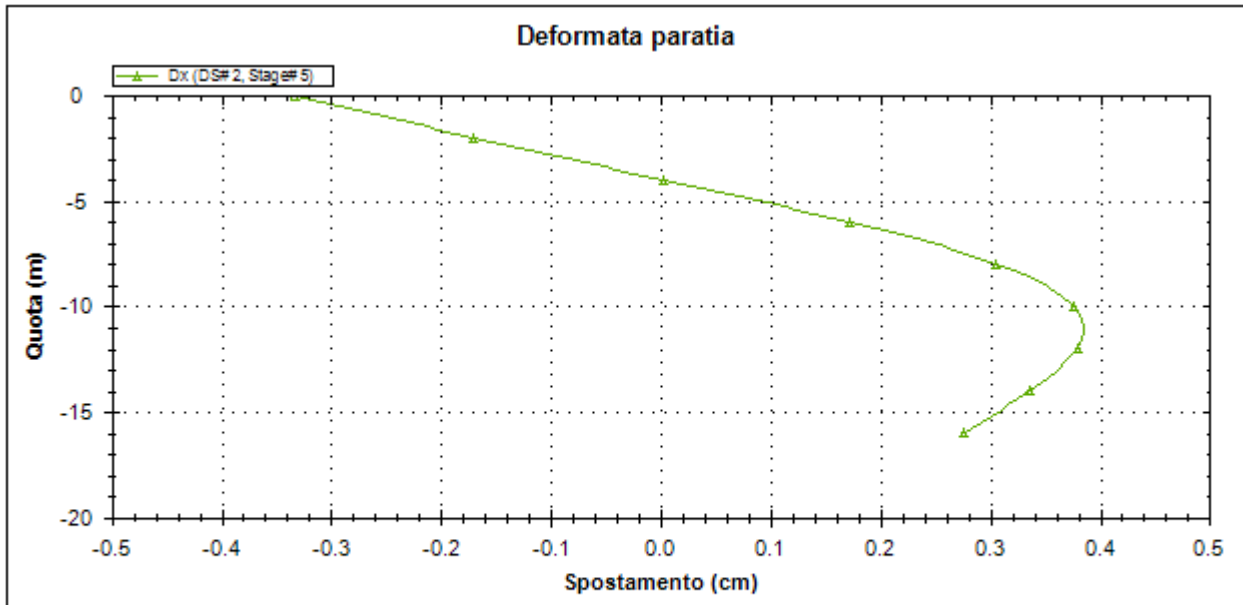
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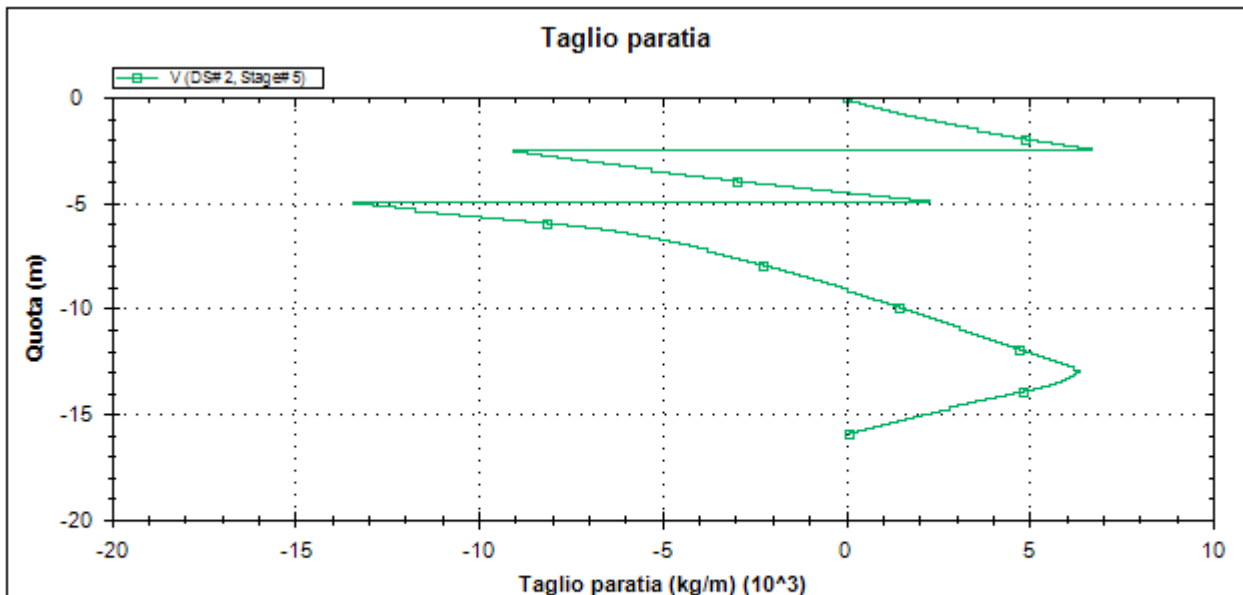
Company: My Company	DS: 2, New stage 4	CeAS srl and Deep Excavation LCC
Engineer: Engineer		Paratie Plus 2010 - DeepXcav 2010
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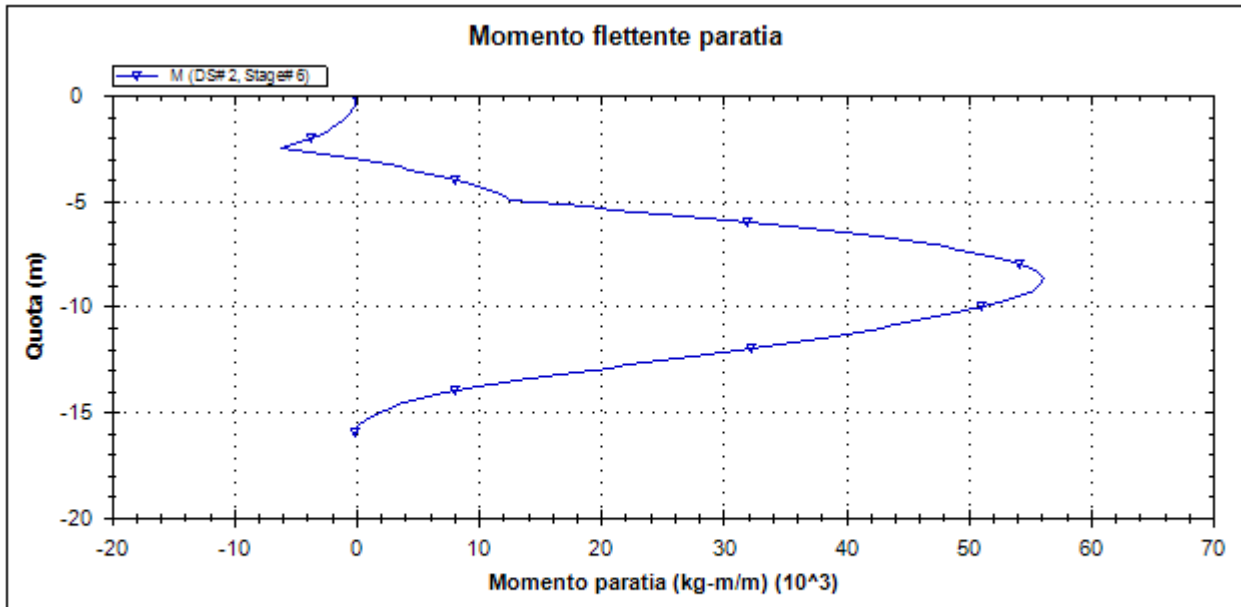
Company: My Company	DS: 2, 2 Tirante	CeAS srl and Deep Excavation LCC
Engineer: Engineer		Paratie Plus 2010 - DeepXcav 2010
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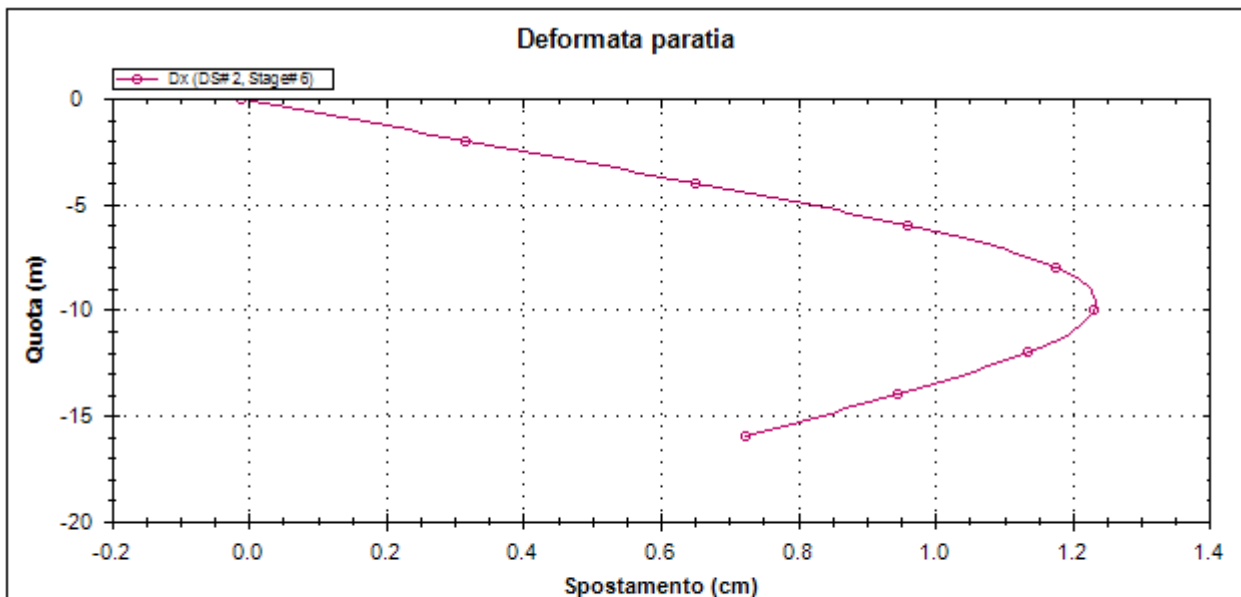
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Engineer: Engineer		Paratie Plus 2010 - DeepXcav 2010
C:\Us...rs\Filippo\Desktop\Calcoli Paratie\488 Messina\Rfi\PALI.DEEP		11/15/2010



Company: My Company	DS: 2, 2 Tirante	CeAS srl and Deep Excavation LCC
Engineer: Engineer		Paratie Plus 2010 - DeepXcav 2010
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Company: My Company	DS: 2, Fondo scavo	CeAS srl and Deep Excavation LCC
Engineer: Engineer		Paratie Plus 2010 - DeepXcav 2010
C:\Us...rs\Filippo\Desktop\Calcoli Paratie\488 Messina\Rfi\PALI.DEEP		11/15/2010



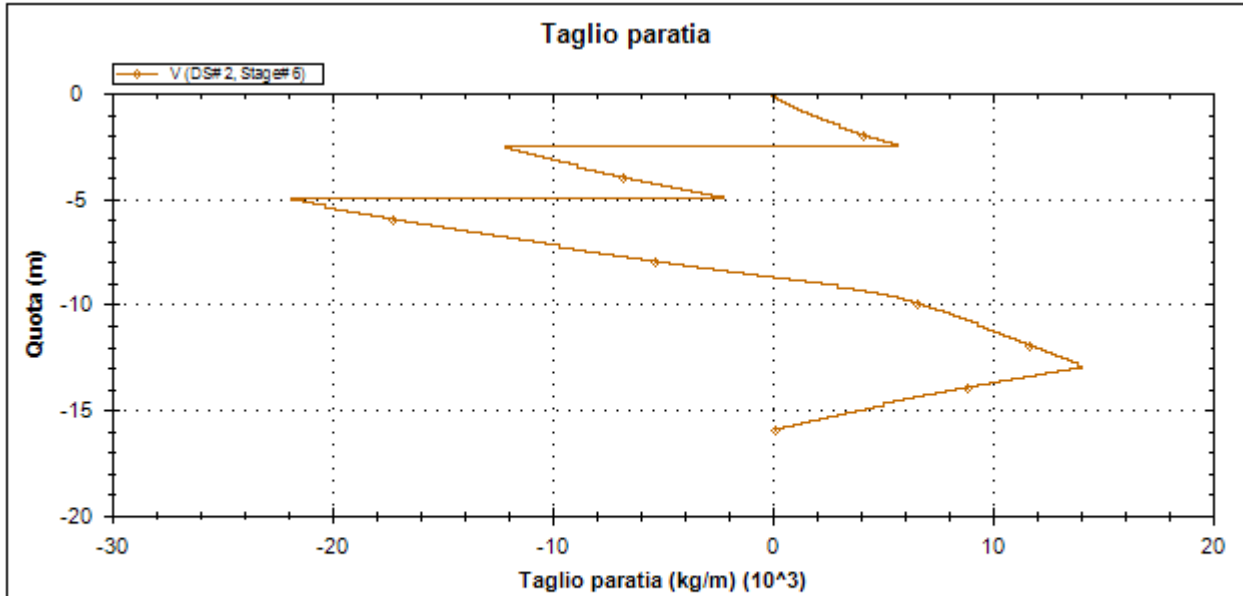
Company: My Company	DS: 2, Fondo scavo	CeAS srl and Deep Excavation LCC
Engineer: Engineer		Paratie Plus 2010 - DeepXcav 2010
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RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

Codice documento
SS0558_F0.doc

Rev
F0

Data
20/06/2011



Company: My Company	DS: 2, Fondo scavo	CeAS srl and Deep Excavation LCC
Engineer: Engineer		Paratie Plus 2010 - DeepXcav 2010
C:\Us...rs\Filippo\Desktop\Calcoli Paratie\488 Messina\Rfi\PALI.DEEP		11/15/2010

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
		RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD	<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0

Progetto: PALI RFI
Risultati per la Design Section 3: 0: DM08_ITA: EQK - Seismic

APPROCCI DI PROGETTO E FATTORI DI COMBINAZIONE

Scenari di progetto utilizzati (da Normativa o personalizzati) e relativi fattori di combinazione

Stag	Design	Design	F(tan	F	F	F	F(per	F(tem	F(per	F(tem	F	F	F	F	F	F	F	F
	Name		fr)	(c')	(Su)	(EQ)	load)	load)	sup)	sup)	(Dsta	(stab)	(Dsta	(stab)	(Dsta	(stab)	(Dsta	(stab)
0	DM08 IT	EQK -	1.25	1.25	1.4	1	1	1	1.2	1.1	1	1	1	1	1.35	0.9	1	1
1	DM08 IT	EQK -	1.25	1.25	1.4	1	1	1	1.2	1.1	1	1	1	1	1.35	0.9	1	1
2	DM08 IT	EQK -	1.25	1.25	1.4	1	1	1	1.2	1.1	1	1	1	1	1.35	0.9	1	1
3	DM08 IT	EQK -	1.25	1.25	1.4	1	1	1	1.2	1.1	1	1	1	1	1.35	0.9	1	1
4	DM08 IT	EQK -	1.25	1.25	1.4	1	1	1	1.2	1.1	1	1	1	1	1.35	0.9	1	1
5	DM08 IT	EQK -	1.25	1.25	1.4	1	1	1	1.2	1.1	1	1	1	1	1.35	0.9	1	1
6	DM08 IT	EQK -	1.25	1.25	1.4	1	1	1	1.2	1.1	1	1	1	1	1.35	0.9	1	1
7	DM08 IT	EQK -	1.25	1.25	1.4	1	1	1	1.2	1.1	1	1	1	1	1.35	0.9	1	1

Stage=Fase di scavo

Design Code=Codice di verifica

Ftan fr=fattore moltiplicatore tangente angolo di attrito

F C'=fattore moltiplicatore coesione efficace

F Su'=fattore moltiplicatore coesione non drenata

F EQ=fattore moltiplicatore azione sismica

F perm load=fattore moltiplicatore carichi permanenti

F temp load=fattore moltiplicatore carichi accidentali/variabili

F perm supp=fattore di riduzione resistenza per verifica pull out tirante

F temp supp=fattore di riduzione resistenza per verifica pull out tirante

F earth Dstab=fattore moltiplicatore per spinta attiva nel caso sfavorevole

F earth stab=fattore moltiplicatore per spinta attiva nel caso favorevole

F GWT Dstab (ground water)=fattore moltiplicatore per spinta idrostatica sfavorevole

F GWT stab (ground water)=fattore moltiplicatore per spinta idrostatica favorevole

F HYD Dstab=fattore moltiplicatore per spinta idrodinamica sfavorevole

F HYD stab=fattore moltiplicatore per spinta idrodinamica favorevole

F UPL Dstab=fattore moltiplicatore per sifonamento sfavorevole

F UPL stab=fattore moltiplicatore per sifonamento favorevole

DATI TERRENO

Name	g tot	g dry	Frict	C'	Su	FRp	FRcv	Eload	Eur	kAp	kPp	kAcv	kPcv	Vary	Spring	Color
	(daN/m3)	(daN/m3)	(deg)	(daN/	(daN/	(deg)	(deg)	(daN/m2)	(daN/m	Springs	Springs	Springs	Springs		Model	
Strato	1900	1900	35	0	N/A	N/A	N/A	200000	600000	0.27	3.69	N/A	N/A	True	Linear	
Strato	1900	1631.55	38	0	N/A	N/A	N/A	400000	120000	0.24	4.2	N/A	N/A	True	Linear	

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011

gtot=peso specifico /totale terreno
gdry=peso secco del terreno
Frict=angolo di attrito di calcolo
C'=coesione efficace
Su = Coesione non drenata, parametro attivo per terreni tipo CLAY in condizioni NON drenate
Dilat=Dilatanza terreno (parametro valido solo in analisi non lineare)
Evc=modulo a compressione vergine molla equivalente terreno
Eur=modulo di scarico/ricarico (fase elastica) molla equivalente terreno
Kap= coefficiente di spinta attiva di picco
Kpp= coefficiente di spinta passiva di picco
Kacv= coefficiente di spinta attiva di picco
Kpcv= coefficiente di spinta passiva di picco
Spring models= modalit  di definizione dei moduli di rigidezza molle terreno (LIN, EXP, SIMC)
LIN= Lineare-Elastico-Perfettamente plastico
EXP: esponenziale, SUB: Modulo di reazione del sottosuolo
SIMC= Modo semplificato per argille

STRATIGRAFIA TERRENI

Top Elev= quota superiore strato
Soil type=nome del terreno
OCR=rappporto di sovraconsolidazione
K0=coefficiente di spinta a riposo

Name: Boring 1, pos: (-8, 0)

Top elev.	Soil type	OCR	Ko
0	Strato1	1	0.43
-13	Strato2	1	0.38

DATI GENERALI RELATIVI A MATERIALI E PROPRIETA MECCANICHE ELEMENTI STRUTTURALI

Acciaio

Name	Strength Fy	Fu	Elastic E	Density g
	(daN/cm ²)	(daN/cm ²)	(daN/cm ²)	(daN/m ³)
S355	3620	5200.6	2100615.4	7851.8148

Calcestruzzo

Name	Strength Fc'	Elastic E	Density g	Tension Strength Ft
	(daN/cm ²)	(daN/cm ²)	(daN/m ³)	(daN/cm ²)
C25/30	254.9	320965.9	2549.291	10

Barre in acciaio

Name	Strength Fy	Elastic E
	(daN/cm ²)	(daN/cm ²)
S1862 (Strands)	18987.1	2141404
B450C	4588.7	2141404

Legno

Name	Ultimate Bending Srtength	Ultimate Tensile Strength	Ultimate Shear Strength	Density g	Elastic E
	(daN/cm ²)	(daN/cm ²)	(daN/cm ²)	(daN/m ³)	(daN/cm ²)
Regular grade	70.4	70.4	41.8	801.2522	56288.3

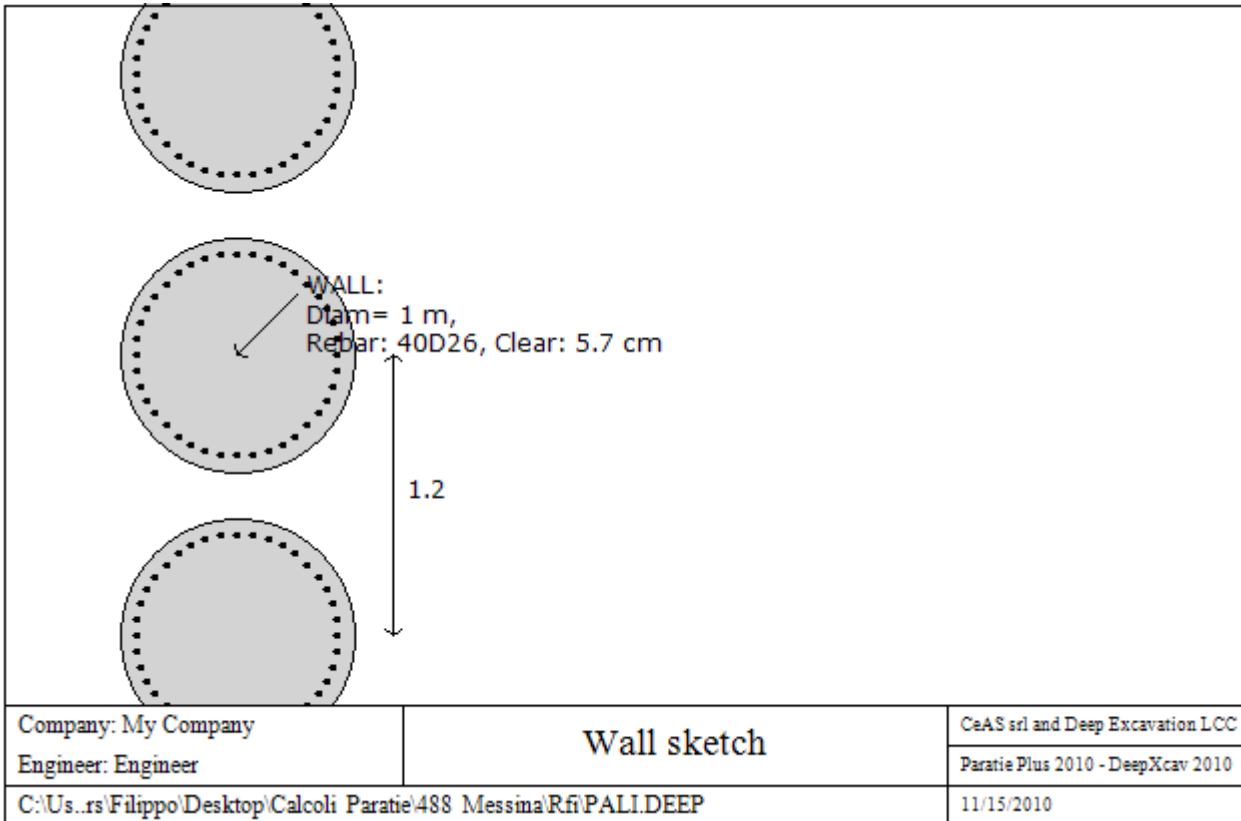
		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011

STEEL=acciaio
Name=nome materiale
strength $f_y=f_yk$ =res caratteristica acciaio
Fu=fuk=resistenza ultima
Elastic E=modulo elastico
Density g=peso specifico
CONCRETE=calcestruzzo
Name=nome materiale
 $f_c=f_{ck}$ =resistenza cilindrica a compressione caratteristica cls
Elastic E=modulo elastico
Density g=peso specifico
Tension strength= $f_t=f_{tk}$ =resistenza a trazione caratteristica
STEEL REBAR
Name=nome materiale
strength $f_y=f_yk$ =resistenza caratteristica acciaio
Elastic E=modulo elastico
WOOD=legno
Name=nome materiale
Ultimate bending strength $F_b=f_{bk}$ =resistenza caratteristica a flessione
Ultimate tensile strength $F_{tu}=f_{tuk}$ =res caratt. parallela alle fibre
Ultimate shear strength $F_{vu}=f_{vuk}$ =res. caratt. a taglio
Density g=peso specifico
Elastic E=modulo elastico

DATI PARATIE

Sezione paratia0: Berlinese Sx

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO	
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD	<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011



Wall uses wall section0: PALI 1000

Tipo paratia: Pali tangenti: pali in calcestruzzo armato

Quota sommita' paratia: 0 m Quota piede paratia: -16 m

Dimensione fuori piano paratia: 1.2 Spessore paratia = 1

Ampiezza zona spinta passiva al di sotto del piano di scavo: 1 Ampiezza zona spinta attiva al di sotto del piano di scavo: 1

fc' cls = 254.9 Fy barre = 4588.7 Ecls = 320965.9 FcT calcestruzzo a trazione = 10% di Fc'

fy profilati in acciaio = 3620 Eacciaio = 2100615.4

Attrito paratia: % attrito terreno = 50%

Le capacita' paratie in acciaio sono calcolate con NTC 2008

Le capacita' paratie in calcestruzzo sono calcolate con ACI 318-2002.

Nota: con la capacita' ultima si dovrebbe adottare un fattore di sicurezza strutturale.

Proprieta' paratie di pali tangenti

Concrete section type: Rectangular

Section dimensions

D = 100 m B = 100 m A = 7853.98163397448 cm² Ixx = 4908738.52123405 cm⁴

Longitudinal reinforcement

Top rebars: N = 40 bars #D26 = AsTop 212.36 cm², Ctop = 7 m

Bottom rebars: N = 40 bars #D25 = AsBot NaN cm², Cbot = 7 m

Shear reinforcements

Bar #D10 = As 0.785 cm², sV = 12 m, sH = 25 m

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO					
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<table border="1" style="width: 100%; border-collapse: collapse;"> <thead> <tr> <th style="text-align: left;"><i>Rev</i></th> <th style="text-align: left;"><i>Data</i></th> </tr> </thead> <tbody> <tr> <td style="text-align: center;">F0</td> <td style="text-align: center;">20/06/2011</td> </tr> </tbody> </table>	<i>Rev</i>	<i>Data</i>	F0	20/06/2011
<i>Rev</i>	<i>Data</i>						
F0	20/06/2011						

DATI GENERALI PARATIA

Hor wall spacing=interasse tra pannelli
passive width below exc=larghezza di riferimento per calcolo zona passiva per analisi classica
concrete $f'c=fck$ =res cilindrica caratteristica cls
Rebar $f_y=fyk$ =res caratteristica acciaio armature
Econc=modulo elastico cls
Concrete tension $fct=fctk$ =resistenza caratteristica a trazione cls
Steel members $f_y=fyk$ =res caratteristica acciaio
Esteel=modulo elastico acciaio

DATI TABELLATI (si omette la spiegazione dei parametri già descritti in precedenza)

1) Diaphragm wall=sezione rettangolare in CA

N/A= il valore non è disponibile in quanto non correlato al tipo di sezione in uso

$F_y=fyk$

$F'c=fck$

D=altezza paratia

B=base paratia

tf=spessore

2) Steel sheet pile=palancolata

DES=tipo di palancolata

Shape=forma

W=peso per unità di lunghezza

A=area

h=altezza

t=spessore lamiera orizzontale

b=base singolo elemento a Z o U

s=spessore lati obliqui

I_{xx} =inerzia asse principale palancolata (per unità di lunghezza)

S_{xx} =modulo di resistenza asse principale palancolata (per unità di lunghezza)

3) Secant pile wall (pali allineati e sovrapposti), Tangent pile wall=pali allineati (Berlinesi, micropali), soldier pile (pali in acciaio con collegamento in cls), soldier pile and timber lagging (pali in acciaio con collegamento con elementi in legno)

W=peso per unità di lunghezza

A=area

D=diametro

tw o tp=spessore dell'anima (sezione a l) o del tubo (sezione circolare)

bf=larghezza della sezione

tf=spessore dell'ala

k=altezza flangia + altezza raccordo

I_{xx} =inerzia rispetto asse orizzontale (per unità di lunghezza)

S_{xx} =modulo di resistenza rispetto asse orizzontale (per unità di lunghezza)

r_x =raggio giratore d'inerzia lungo x

I_{yy} =inerzia rispetto asse verticale (per unità di lunghezza)

S_{yy} =modulo di resistenza rispetto asse verticale (per unità di lunghezza)

r_y =raggio giratore d'inerzia lungo y

Cw=costante di ingobbamento

$f_y=fyk$

DATI VINCOLI, TIRANTI, PUNTONI, ECC

Support 0: type = tieback

X = 1 m, Z = -2.5 m, S = 1.2 m

Lfree = 7.782 m, Lfix = 7.5 m, Rfix = 90 %

Walls: Berlinese Sx

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011

Stage No	Active	Prestress	Slab live load	User add. strain
	Si'/No	(daN)	(daN/m2)	+expansion
0	No	22500	-	-
1	No	22500	-	-
2	No	22500	-	-
3	Si'	22500	-	-
4	Si'	22500	-	-
5	Si'	22500	-	-
6	Si'	22500	-	-
7	Si'	22500	-	-

Support 1: type = tieback

X = 1 m, Z = -5 m, S = 1.2 m

Lfree = 6.684 m, Lfix = 5 m, Rfix = 80 %

Walls: Berlinese Sx

Stage No	Active	Prestress	Slab live load	User add. strain
	Si'/No	(daN)	(daN/m2)	+expansion
0	No	22500	-	-
1	No	22500	-	-
2	No	22500	-	-
3	No	22500	-	-
4	No	22500	-	-
5	Si'	22500	-	-
6	Si'	22500	-	-
7	Si'	22500	-	-

Support type= tipo di vincolo

Tieback=tirante

Strut=puntone

Raker=Sbadacchio

LEGENDA PER TIRANTI

Dati generali

Z=quota vincolo

S=interasse in direzione orizzontale

Lfree=lunghezza tratto elastico

Lfix=lunghezza tratto rigido

Rfix=% sfruttamento tratto rigido

Stage No=numero step di scavo

Active=stato tirante (YES=attivo)

Post stress= precarico tirante (carico moltiplicato per interasse)

Walls= indica il nome della paratia alla quale il vincolo è applicato

Nel caso di solette indica il punto di partenza e cioè la paratia di sinistra

PARAMETRI DI CALCOLO PER SINGOLA FASE

Summary of stage assumptions

Name	Analysis	Drive	ka-Mult	Htr T/B	Resist	Res	Contlev	Support	Axial	Used	Min	Toe	Toe
	Method	Press		(%)	Press	Mult	Method	Model	Incl	FSwall	FDtoe	FSrot	FSpas
Stage 0	Springs-Up	Ka	N/A	N/A	Kp+ d	N/A		Fixed	N/A	1	0	0	0

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RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011

Stage 1	Springs-Up	Ka	N/A	N/A	Kp+ d	N/A		Fixed	N/A	1	0	0	0
Stage 2	Springs-Up	Ka	N/A	N/A	Kp+ d	N/A		Fixed	N/A	1	0	0	0
Stage 3	Springs-Up	Ka	N/A	N/A	Kp+ d	N/A		Fixed	N/A	1	0	0	0
Stage 4	Springs-Up	Ka	N/A	N/A	Kp+ d	N/A		Fixed	N/A	1	0	0	0
Stage 5	Springs-Up	Ka	N/A	N/A	Kp+ d	N/A		Fixed	N/A	1	0	0	0
Stage 6	Springs-Up	Ka	N/A	N/A	Kp+ d	N/A		Fixed	N/A	1	0	0	0
Stage 7	Springs-Up	Ka	N/A	N/A	Kp+ d	N/A		Fixed	N/A	1	0	0	0

Name=nome fase

Analysis method=metodo di calcolo

COnventional=analisi all'equilibriolimito

springs UP=analisi non lineare (schema a molle elasto plastiche)

DR=analisi per terreni tipo argilla in condizione drenata

U=analisi per terreni tipo argilla in condizione NON drenata

Up=analisi non drenata solo per i terreni selezionati

Drive press=Ka=spinta terreno attiva

ka mult=eventuale moltiplicatore Ka

Htr T/B (%)=schema pressione attiva di tipo trapezoidale

Resit press=Kp=spinta terreno passiva

Res Mult=eventuale moltiplicatore Kp

COntle Method=

Support Model=tipologia vincoli fissi (fixed=fissi)

Axial Incl=se azione assiale inclusa

Used FS wall=coeff di riduzione dominio MN

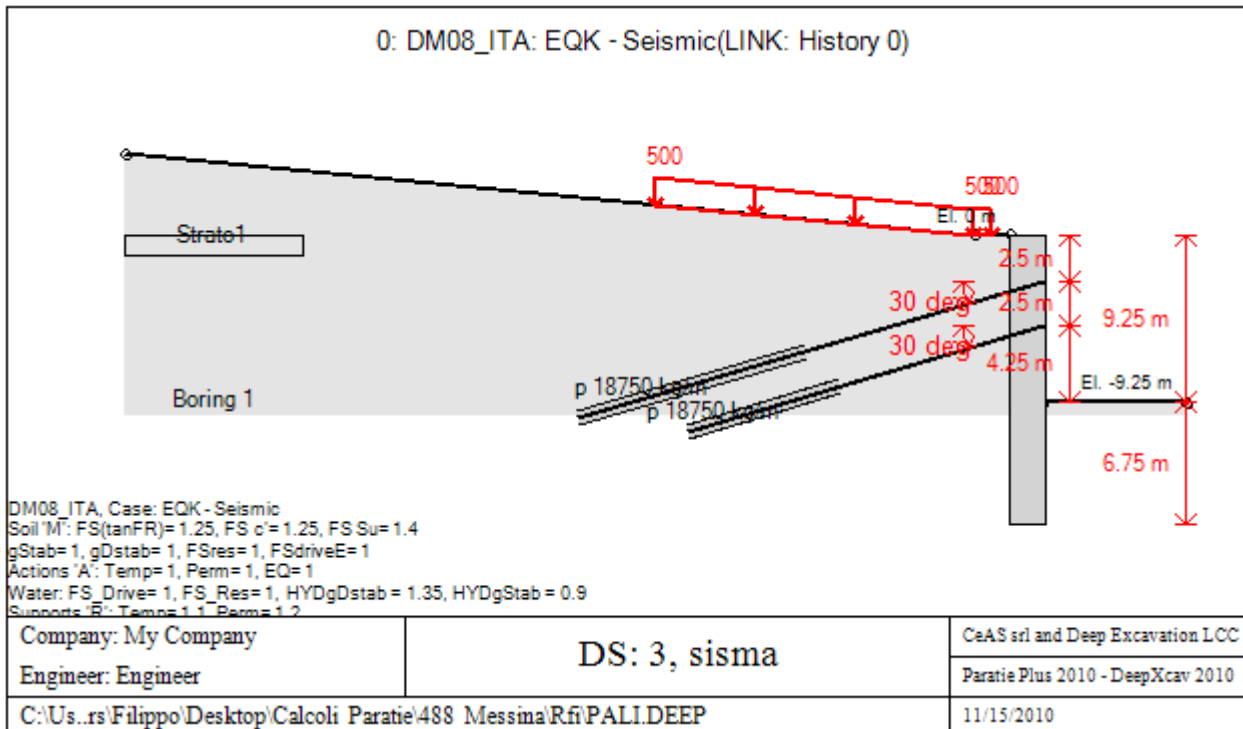
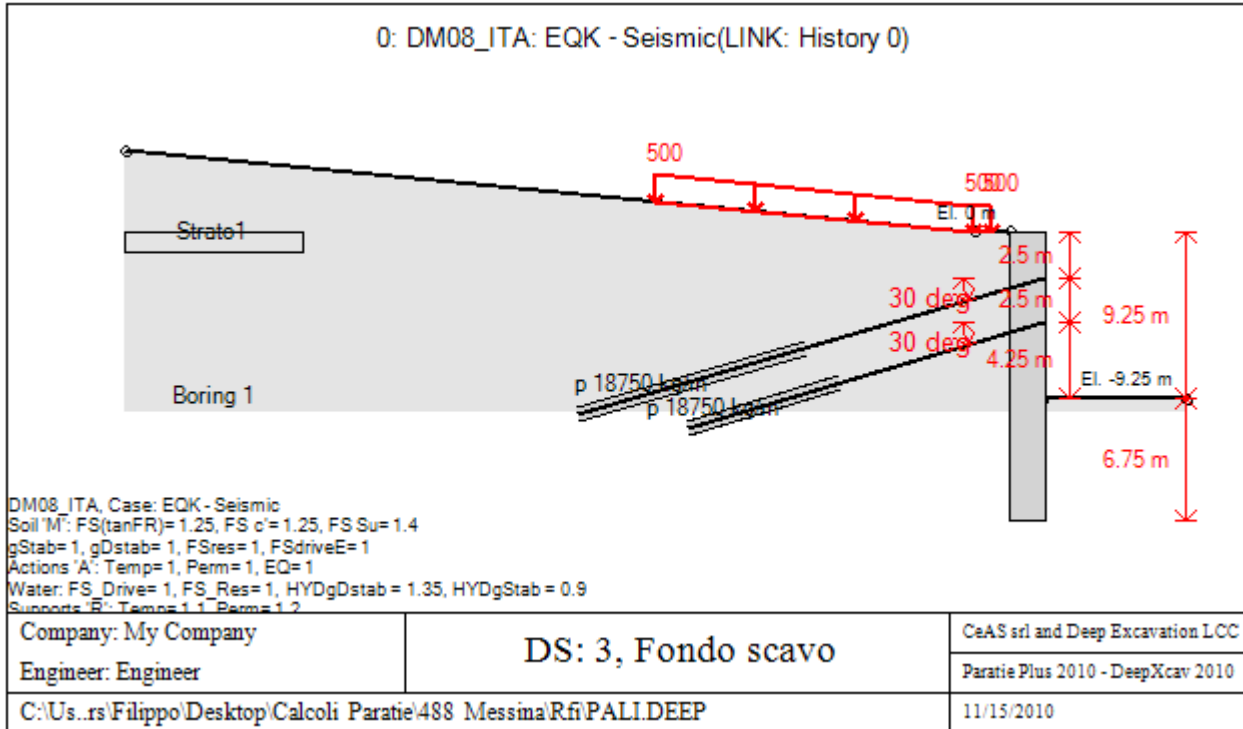
Min FD TOe=sicurezza minima per infissione (analisi classica)

Toe FS rot=sicurezza a rotazione (analisi classica)

Toe FSpas=sicurezza sulle pressioni agenti/resistenti (analisi classica)

GRAFICI FASI DI SCAVO

Di seguito si riportano gli schemi grafici delle fasi di scavo principali.



Stabilita' del piede

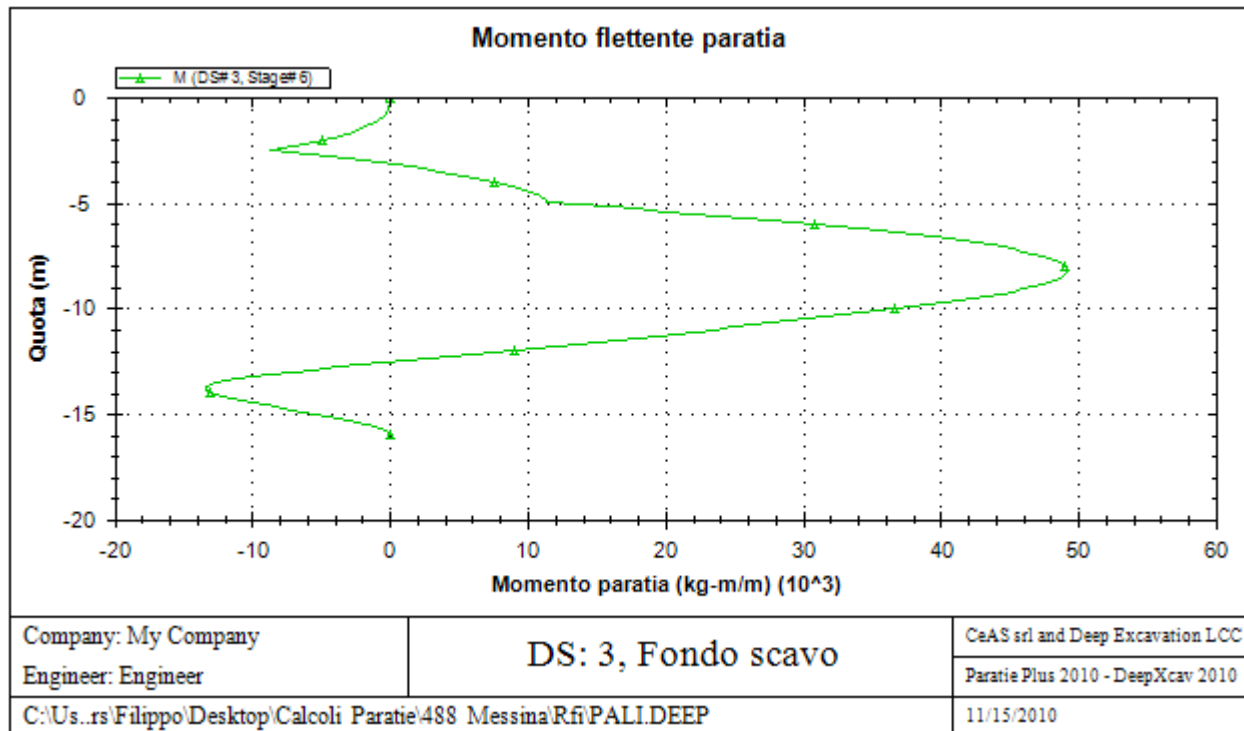
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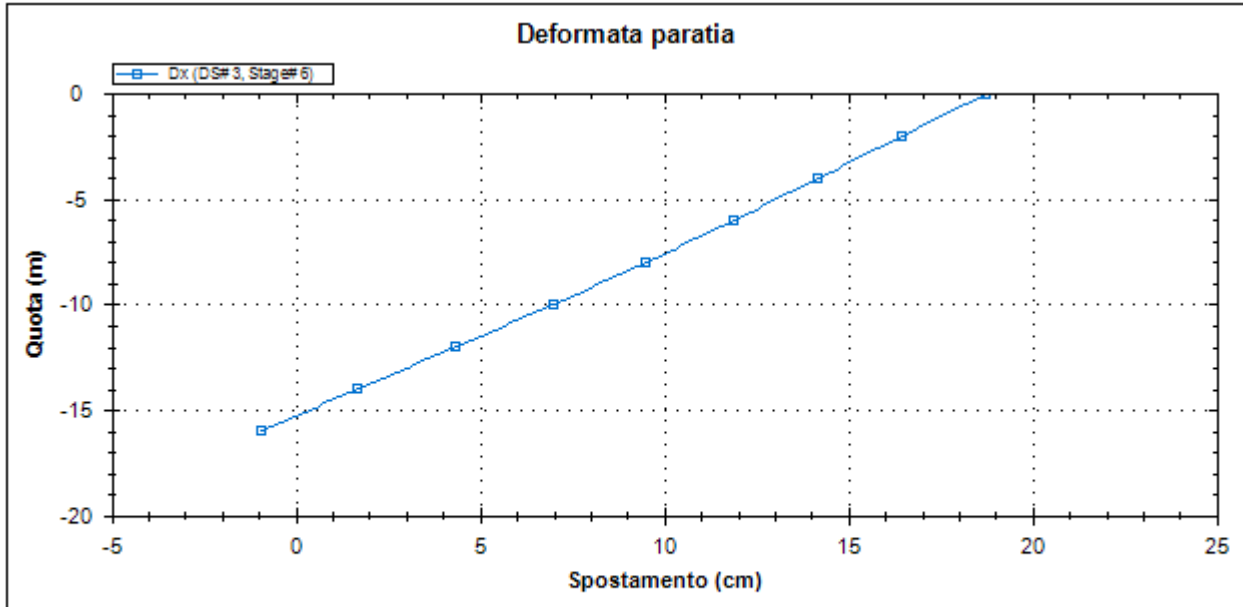
Embedment FS vs Stage

	Min Toe FS	FS1 Passive	FS2 Rotation	FS3 Length (from FS1,	FS4 Mobilized	FS5 Actual Drive Thrust /
Stage #0	N/A	N/A	N/A	N/A	3.443	1.241
Stage #1	N/A	N/A	N/A	N/A	5.858	2.134
Stage #2	N/A	N/A	N/A	N/A	4.543	1.869
Stage #3	N/A	N/A	N/A	N/A	4.675	2.024
Stage #4	N/A	N/A	N/A	N/A	3.491	1.691
Stage #5	N/A	N/A	N/A	N/A	3.578	1.818
Stage #6	N/A	N/A </td <td>N/A</td> <td>N/A</td> <td>2.21</td> <td>1.549</td>	N/A	N/A	2.21	1.549
Stage #7	N/A	N/A	N/A	N/A	2.21	1.549

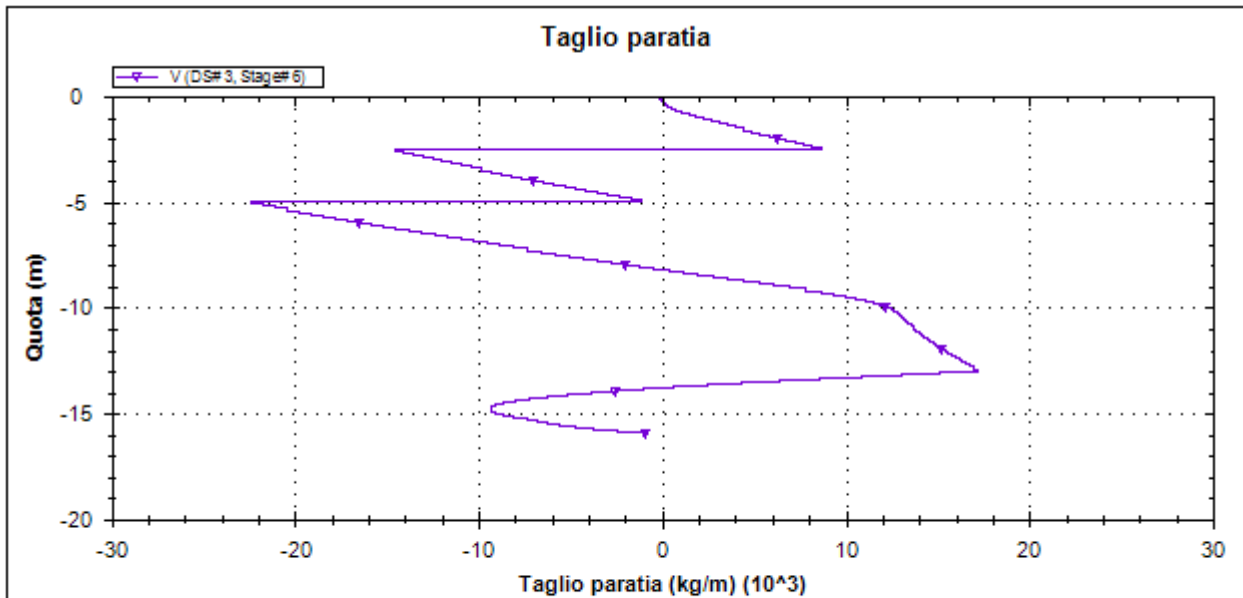
GRAFICI FASI DI SCAVO

Di seguito si riportano gli schemi grafici delle fasi di scavo principali.





Company: My Company Engineer: Engineer	DS: 3, Fondo scavo	CeAS srl and Deep Excavation LCC Paratie Plus 2010 - DeepXcav 2010
C:\Us...rs\Filippo\Desktop\Calcoli Paratie\488 Messina\Rfi\PALI.DEEP		11/15/2010



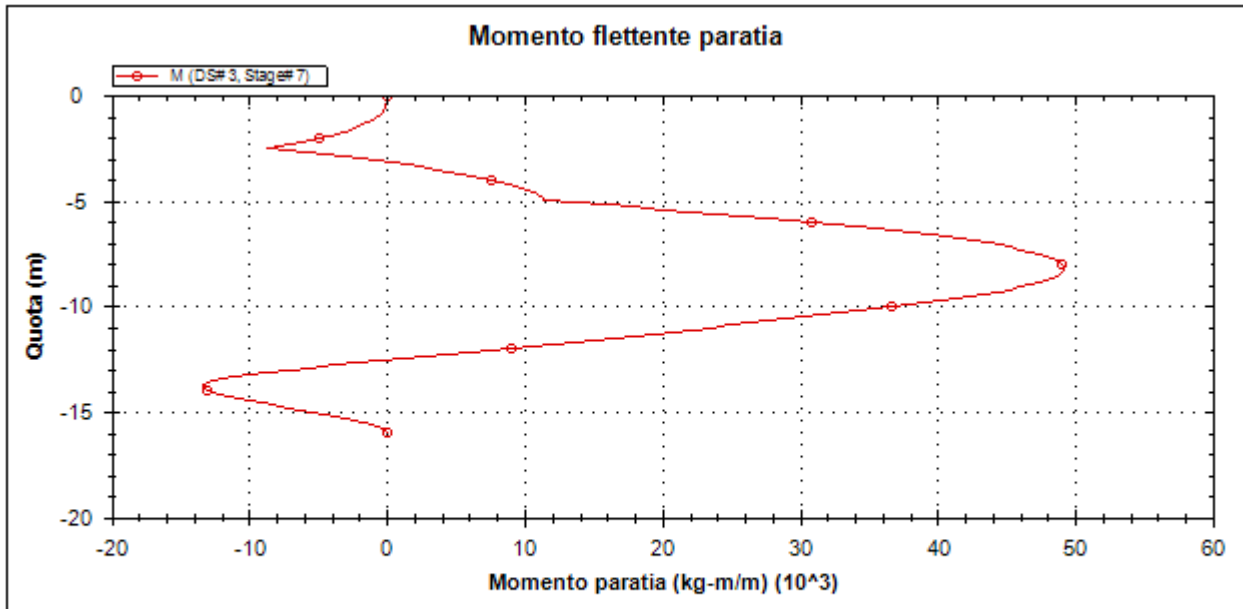
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C:\Us...rs\Filippo\Desktop\Calcoli Paratie\488 Messina\Rfi\PALI.DEEP		11/15/2010

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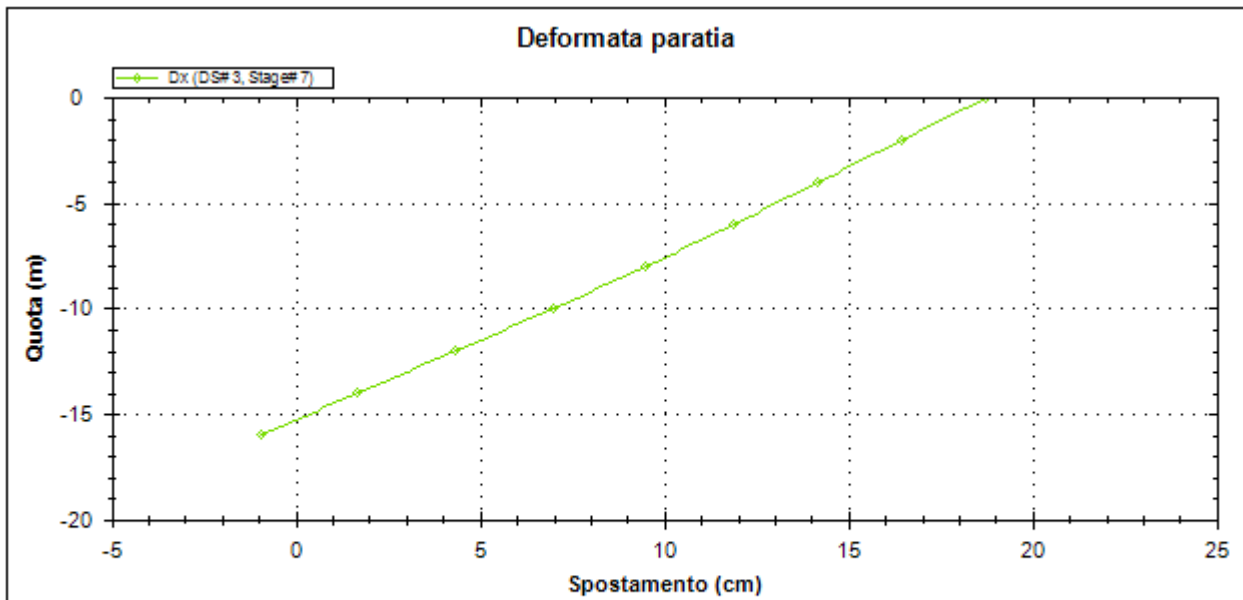
Codice documento
SS0558_F0.doc

Rev
F0

Data
20/06/2011



Company: My Company	DS: 3, sisma	CeAS srl and Deep Excavation LCC
Engineer: Engineer		Paratie Plus 2010 - DeepXcav 2010
C:\Us...rs\Filippo\Desktop\Calcoli Paratie\488 Messina\Rfi\PALI.DEEP		11/15/2010



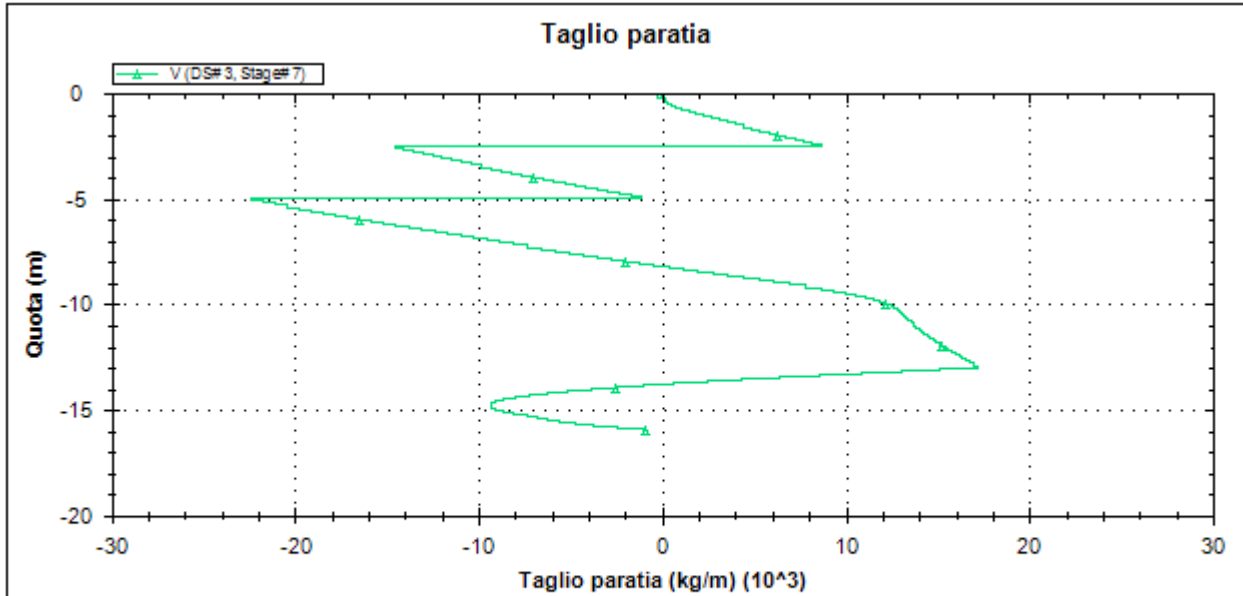
Company: My Company	DS: 3, sisma	CeAS srl and Deep Excavation LCC
Engineer: Engineer		Paratie Plus 2010 - DeepXcav 2010
C:\Us...rs\Filippo\Desktop\Calcoli Paratie\488 Messina\Rfi\PALI.DEEP		11/15/2010

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD



Codice documento
SS0558_F0.doc

Rev
F0

Data
20/06/2011



Company: My Company	DS: 3, sisma	CeAS srl and Deep Excavation LCC
Engineer: Engineer		Paratie Plus 2010 - DeepXcav 2010
C:\Us...rs\Filippo\Desktop\Calcoli Paratie\488 Messina\Rfi\PALI.DEEP		11/15/2010

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011

9.2.1 VERIFICHE

Viene di seguito riportato un tabulato riassuntivo delle sollecitazioni calcolate.

	0: DM08_ITA: EQK - Seismic	0: DM08_ITA: Comb. 2: A2+M2+R1	0: DM08_ITA: Comb. 1: A1+M1+R1	Risultati analisi
	Calculation successful	Calculation successful	Calculation successful	Spostamento paratia (cm)
	20.54	1.41	1.01	
	1.36	1.08	1.01	Cedimenti (cm)
	49231	56106	77175.8	Momento paratia (daN-m/m)
	59077.2	67327.2	92610.96	Momento paratia (daN-m)
	22353	21801	28944.5	Taglio paratia (daN/m)
	26823.6	26161.2	34733.4	Taglio paratia (daN)
	0.203	0.231	0.318	TSF Comb.paratia
	0.203	0.231	0.318	TSF M+N paratia
	0.655	0.638	0.848	TSF V paratia
	27411	23128	29569.8	Max. reazione vincoli (daN/m)
	32893.2	27753.6	35483.76	Max. reazione vincoli (daN)
	0.475	0.432	0.513	Verifica vincoli
	0.475	0.401	0.513	TSF vincoli
	0.472	0.432	0.426	TSF sfilamento tirante
	3.22	3.22	4.024	FS fondo scavo
	2.21	2.979	4.987	FS % passiva mobilitata (analisi NL)
	1.241	1.184	1.453	Vera/Attiva (analisi NL)

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO	
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD	<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011

Si procede quindi andando a verificare i pali nei confronti delle massime sollecitazioni flessionali e taglianti.

VERIFICA A FLESSIONE

$$M_{sd} = 926 \text{ KNm}$$

Flessione:

SEZIONE	di diametro (cm)	100
ARMATURA	ripartita	24 ϕ 24
INDICI DI RESISTENZA	Mrd =	1.597 kNm
	IR =	1,72

VERIFICA A TAGLIO (IN ESTREMITA')

ARMATURA	ripartita	24 ϕ 24
----------	-----------	--------------

$$V_{sd} = 347 \text{ kN}$$

RISULTATI VERIFICA A TAGLIO	
Verifica delle bielle compresse	
Taglio resistente ultimo (VRcd):	315813.719
ctg(Theta):	1.00
Indice di resistenza:	0.08
Verifica con armatura trasversale	
Taglio attribuito all'armatura (VRsd):	13200.000
Armatura trasversale per unita' di lunghezza (Asw, cm ² /m):	3.88
Staffe a 2 braccia:	ϕ 8/25.9cm

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
		RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD	Codice documento SS0558_F0.doc	Rev F0

9.3 BERLINESI DUE ORDINI – RISVOLTO PERPENDICOLARE ALLO SCATOLARE

Progetto: PALI RFI
Risultati per la Design Section 1: 0: DM08_ITA: Comb. 1: A1+M1+R1

APPROCCI DI PROGETTO E FATTORI DI COMBINAZIONE

Scenari di progetto utilizzati (da Normativa o personalizzati) e relativi fattori di combinazione

Stage	Design Code	Design Case	F(tan fr)	F (c')	F (Su)	F (EQ)	F(perm load)	F(temp load)	F(perm sup)	F(temp sup)	F Earth (Dstab)	F Earth (stab)	F GWT (Dstab)	F GWT (stab)	F HYD (Dstab)	F HYD (stab)	F UPL (Dstab)	F UPL (stab)
0	DM08_ITA	1: A1+M1+R1	1	1	1	0	1.3	1.5	1.2	1.1	1.3	1	1.3	1	1.35	0.9	1	1
1	DM08_ITA	1: A1+M1+R1	1	1	1	0	1.3	1.5	1.2	1.1	1.3	1	1.3	1	1.35	0.9	1	1
2	DM08_ITA	1: A1+M1+R1	1	1	1	0	1.3	1.5	1.2	1.1	1.3	1	1.3	1	1.35	0.9	1	1
3	DM08_ITA	1: A1+M1+R1	1	1	1	0	1.3	1.5	1.2	1.1	1.3	1	1.3	1	1.35	0.9	1	1
4	DM08_ITA	1: A1+M1+R1	1	1	1	0	1.3	1.5	1.2	1.1	1.3	1	1.3	1	1.35	0.9	1	1
5	DM08_ITA	1: A1+M1+R1	1	1	1	0	1.3	1.5	1.2	1.1	1.3	1	1.3	1	1.35	0.9	1	1
6	DM08_ITA	1: A1+M1+R1	1	1	1	0	1.3	1.5	1.2	1.1	1.3	1	1.3	1	1.35	0.9	1	1
7	DM08_ITA	1: A1+M1+R1	1	1	1	0	1.3	1.5	1.2	1.1	1.3	1	1.3	1	1.35	0.9	1	1

Stage=Fase di scavo

Design Code=Codice di verifica

Ftan fr=fattore moltiplicatore tangente angolo di attrito

F C'=fattore moltiplicatore coesione efficace

F Su'=fattore moltiplicatore coesione non drenata

F EQ=fattore moltiplicatore reazione sismica

F perm load=fattore moltiplicatore carichi permanenti

F temp load=fattore moltiplicatore carichi accidentali/variabili

F perm supp=fattore di riduzione resistenza per verifica pull out tirante

F temp supp=fattore di riduzione resistenza per verifica pull out tirante

F earth Dstab=fattore moltiplicatore per spinta attiva nel caso sfavorevole

F earth stab=fattore moltiplicatore per spinta attiva nel caso favorevole

F GWT Dstab (ground water)=fattore moltiplicatore per spinta idrostatica sfavorevole

F GWT stab (ground water)=fattore moltiplicatore per spinta idrostatica favorevole

F HYD Dstab=fattore moltiplicatore per spinta idrodinamica sfavorevole

F HYD stab=fattore moltiplicatore per spinta idrodinamica favorevole

F UPL Dstab=fattore moltiplicatore per sifonamento sfavorevole

F UPL stab=fattore moltiplicatore per sifonamento favorevole

DATI TERRENO

Name	g tot (daN/m3)	g dry (daN/m3)	Frict (deg)	C' (daN/m2)	Su (daN/m2)	FRp (deg)	FRcv (deg)	Eload (daN/m2)	Eur (daN/m2)	kAp Springs	kPp Springs	kAcv Springs	kPcv Springs	Vary	Spring Model	Color
Strato1	1900	1900	35	0	N/A	N/A	N/A	200000	600000	0.27	3.69	N/A	N/A	True	Linear	
Strato2	1900	1631.55	38	0	N/A	N/A	N/A	4000000	12000000	0.24	4.2	N/A	N/A	True	Linear	

gtot=peso specifico /totale terreno

gdry=peso secco del terreno

Frict=angolo di attrito di calcolo

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011

C'=coesione efficace

Su = Coesione non drenata, parametro attivo per terreni tipo CLAY in condizioni NON drenate

Dilat=Dilatanza terreno (parametro valido solo in analisi non lineare)

Evc=modulo a compressione vergine molla equivalente terreno

Eur=modulo di scarico/ricarico (fase elastica) molla equivalente terreno

Kap= coefficiente di spinta attiva di picco

Kpp= coefficiente di spinta passiva di picco

Kacv= coefficiente di spinta attiva di picco

Kpcv= coefficiente di spinta passiva di picco

Spring models= modalità di definizione dei moduli di rigidità molle terreno (LIN, EXP, SIMC)

LIN= Lineare-Elastico-Perfettamente plastico

EXP: esponenziale, SUB: Modulo di reazione del sottosuolo

SIMC= Modo semplificato per argille

STRATIGRAFIA TERRENI

Top Elev= quota superiore strato
Soil type=nome del terreno
OCR=rappporto di sovraconsolidazione
K0=coefficiente di spinta a riposo
Nome: Boring 1, pos: (-8, 0)

Top elev.	Soil type	OCR	Ko
0	Strato1	1	0.43
-13	Strato2	1	0.38

DATI GENERALI RELATIVI A MATERIALI E PROPRIETA MECCANICHE ELEMENTI STRUTTURALI

Acciaio

Name	Strength Fy (daN/cm ²)	Fu (daN/cm ²)	Elastic E (daN/cm ²)	Density g (daN/m ³)
S355	3620	5200.6	2100615.4	7851.8148

Calcestruzzo

Name	Strength Fc' (daN/cm ²)	Elastic E (daN/cm ²)	Density g (daN/m ³)	Tension Strength Ft (daN/cm ²)
C25/30	254.9	320965.9	2549.291	10

Barre in acciaio

Name	Strength Fy (daN/cm ²)	Elastic E (daN/cm ²)
S1862 (Strands)	18987.1	2141404
B450C	4588.7	2141404

Legno

Name	Ultimate Bending Strength Fbu (daN/cm ²)	Ultimate Tensile Strength Ft (daN/cm ²)	Ultimate Shear Strength Fvu (daN/cm ²)	Density g (daN/m ³)	Elastic E (daN/cm ²)
Regular grade	70.4	70.4	41.8	801.2522	56288.3

STEEL=acciaio

Name=nome materiale

strength fy=fyk=res caratteristica acciaio

Fu=fuk=resistenza ultima

Elastic E=modulo elastico

Density g=peso specifico

CONCRETE=calcestruzzo

Name=nome materiale

f'c=fck=resistenza cilindrica a compressione caratteristica cls

Elastic E=modulo elastico

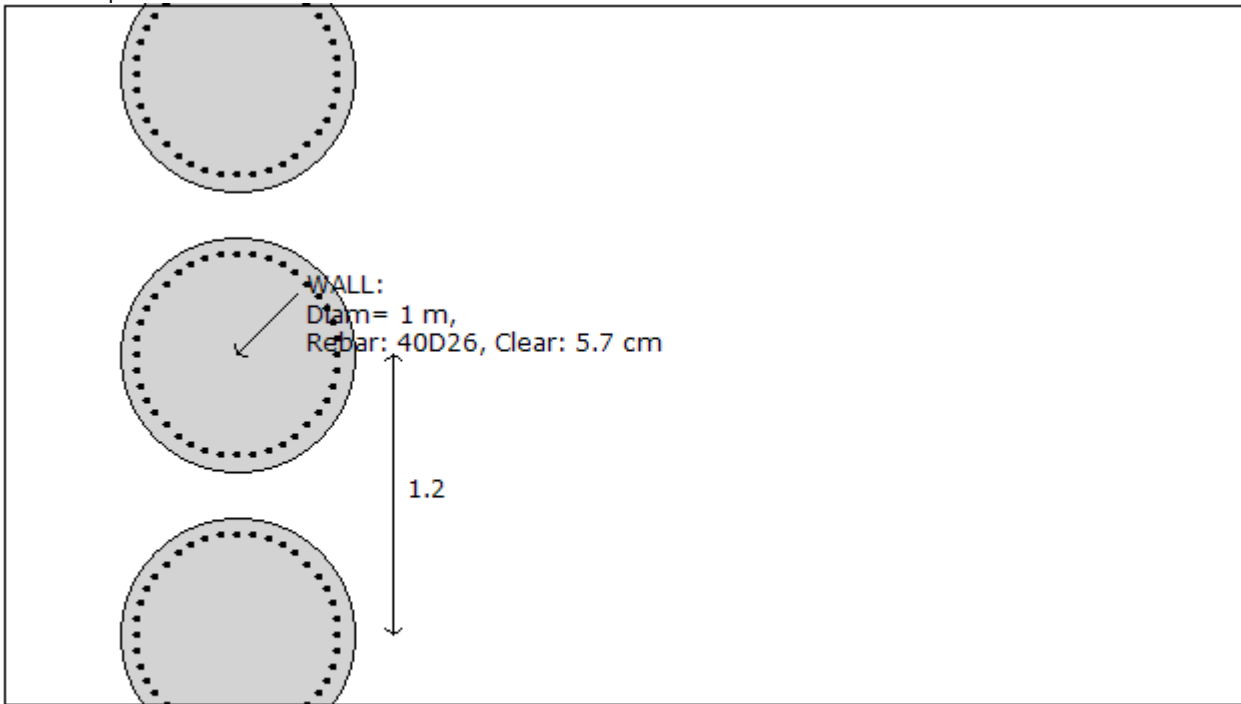
Density g=peso specifico

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO					
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<table border="1" style="width: 100%;"> <tr> <td style="width: 50%;"><i>Rev</i></td> <td style="width: 50%;"><i>Data</i></td> </tr> <tr> <td>F0</td> <td>20/06/2011</td> </tr> </table>	<i>Rev</i>	<i>Data</i>	F0	20/06/2011
<i>Rev</i>	<i>Data</i>						
F0	20/06/2011						

Tension strength= $f_t=f_{tk}$ =resistenza a trazione caratteristica
STEEL REBAR
Name=nome materiale
strength $f_y=f_{yk}$ =resistenza caratteristica acciaio
Elastic E =modulo elastico
WOOD=legno
Name=nome materiale
Ultimate bending strength $F_b=f_{bk}$ =resistenza caratteristica a flessione
Ultimate tensile strength $F_{tu}=f_{tuk}$ =res. caratt. parallela alle fibre
Ultimate shear strength $F_{vu}=f_{vuk}$ =res. caratt. a taglio
Density g =peso specifico
Elastic E =modulo elastico

PROPRIETA' SEZIONI TRAVI DI RIPARTIZIONE

Sezioni paratia0: Berlinese Sx



Societa': My Company	Wall sketch	CeAS srl and Deep Excavation LCC
Progettista: Engineer		Paratie Plus 2011 - DeepXcav 2011
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Sezioni paratia0: PALI 1000
Tipo paratia: Pali tangenti: pali in calcestruzzo armato
Quota sommita' paratia: 0 m Quota piede paratia: -16 m
Dimensione fuori piano paratia: 1.2 Spessore paratia = 1
Ampiezza zona spinta passiva al di sotto del piano di scavo: 1 Ampiezza zona spinta attiva al di sotto del piano di scavo: 1
 $f_c'_{cls} = 254.9$ $F_y \text{ barre} = 4588.7$ $E_{cls} = 320965.9$ $F_cT \text{ calcestruzzo a trazione} = 10\% \text{ di } F_c'$
 $f_y \text{ profilati in acciaio} = 3620$ $E_{acciaio} = 2100615.4$
Attrito paratia: % attrito terreno = 50%
Le capacita' paratie in acciaio sono calcolate con NTC 2008
Le capacita' paratie in calcestruzzo sono calcolate con ACI 318-2002.
Nota: con la capacita' ultima si dovrebbe adottare un fattore di sicurezza strutturale.
Proprieta' paratie di pali tangenti
Tipo di sezione di calcestruzzo: Rettangolare
Dimensioni della sezione

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011

D = 100 m B = 100 m A = 7853.98163397448 cm² I_{xx} = 4908738.52123405 cm⁴

Armatura longitudinale

Barre cima: N = 40 barre #D26 = A_{sTop} 212.36 cm², C_{top} = 7 m

Barre fondo: N = 40 barre #D25 = A_{sBot} NaN cm², C_{bot} = 7 m

Armatura a taglio

Bar #D10 = A_s 0.785 cm², s_V = 12 m, s_H = 25 m

PROPRIETA' GENERALI

Le travi di ripartizione sono utilizzate sui supporti come elementi strutturali ma non vengono inclusi nel calcolo della rigidezza della paratia.

f'_c=f_{ck}= resistenza cilindrica del calcestruzzo

f_{yk}=f_y= resistenza caratteristica acciaio

f_y= resistenza caratteristica barre di armatura

TABELLA DEI PARAMETRI (parametri principali)

1) Tutte le travi di ripartizione in calcestruzzo hanno sezione rettangolare

N/A= dato non disponibile

F_y=f_{yk}

F'_c=f_{ck}

D= altezza della trave

B= larghezza della trave

2) Proprieta' della trave in acciaio

W= peso per unita' di lunghezza

A= area

D= diametro

t_w= spessore anima

t_p= spessore tubo

b_f= larghezza ala

t_f= spessore ala

k= spessore flangia

I_{xx}= modulo di inerzia asse forte (per unita' di lunghezza)

S_{xx}= momento statico asse forte (per unita' di lunghezza)

r_x= raggio giratore di inerzia - asse X

r_y= raggio giratore di inerzia - asse Y

I_{yy}= modulo di inerzia asse debole (per unita' di lunghezza)

S_{yy}= momento statico asse debole (per unita' di lunghezza)

r_T= raggio giratore per la torsione

C_w= costante di ingobbimento

DATI VINCOLI, TIRANTI, PUNTONI, ECC

Vincolo 0: Tipo = Tirante

X = 1 m, Z = -3 m, S = 2.4 m

L_{free} = 14.00 m, L_{fix} = 15 m

Paratia:Berlinese Sx

Stage No	Active	Prestress (daN)	Slab live load (daN/m ²)	User add. strain +expansion
0	No	-	-	-
1	No	-	-	-
2	No	-	-	-
3	Si'	45000	-	-
4	Si'	45000	-	-
5	Si'	45000	-	-
6	Si'	45000	-	-
7	Si'	45000	-	-

Vincolo 1: Tipo = Tirante

X = 1 m, Z = -5.5 m, S = 2.4 m

L_{free} = 10.00 m, L_{fix} = 10 m

Paratia:Berlinese Sx

Stage No	Active	Prestress	Slab live load	User add. strain
----------	--------	-----------	----------------	------------------

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
		RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD	<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0

	Si'/No	(daN)	(daN/m2)	+expansion
0	No	-	-	-
1	No	-	-	-
2	No	-	-	-
3	No	-	-	-
4	No	-	-	-
5	Si'	45000	-	-
6	Si'	45000	-	-
7	Si'	45000	-	-

Support type= tipo di vincolo

Tieback=tirante

Strut=puntone

Raker=Sbadacchio

LEGENDA PER TIRANTI

Dati generali

Z=quota vincolo

S=interasse in direzione orizzontale

Lfree=lunghezza tratto elastico

Lfix=lunghezza tratto rigido

Rfix=% sfruttamento tratto rigido

Stage No=numero step di scavo

Active=stato tirante (YES=attivo)

Post stress= precarico tirante (carico moltiplicato per interasse)

Walls= indica il nome della paratia alla quale il vincolo è applicato

Nel caso di solette indica il punto di partenza e cioè la paratia di sinistra

PARAMETRI DI CALCOLO PER SINGOLA FASE

Sommario delle assunzioni dell'ultima fase

Name	Analysis	Drive	ka-Mult	Htr T/B	Resist	Res	Contlever	Support	Axial	Used	Min Toe	Toe	Toe
	Method	Press		(%)	Press	Mult	Method	Model	Incl	FSwall	FDtoe	FSrot	FSpas
Stage 0	Conventional-Up	Ka	N/A	N/A	Kp+ d	N/A	Free Earth	Fixed	N/A	1	17.995	17.995	19.683
Stage 1	Conventional-Up	Ka	N/A	N/A	Kp+ d	N/A	Free Earth	Fixed	N/A	1	14.49	14.49	17.382
Stage 2	Conventional-Up	Ka	N/A	N/A	Kp+ d	N/A	Free Earth	Fixed	N/A	1	4.714	7.971	11.809
Stage 3	Conventional-Up	Ka	N/A	N/A	Kp+ d	N/A	Free Earth	Fixed	N/A	1	15.131	15.131	N/A
Stage 4	Conventional-Up	Ka	N/A	N/A	Kp+ d	N/A	Free Earth	Fixed	N/A	1	6.25	9.797	N/A
Stage 5	Conventional-Up	Ka	N/A	N/A	Kp+ d	N/A	Free Earth	Fixed	N/A	1	9.091	10.72	248.027
Stage 6	Conventional-Up	Ka	N/A	N/A	Kp+ d	N/A	Free Earth	Fixed	N/A	1	4.429	7.096	42.214
Stage 7	Conventional-Up	Ka	N/A	N/A	Kp+ d	N/A	Free Earth	Fixed	N/A	1	4.189	7.084	42.081

Name=nome fase

Analysis method=metodo di calcolo

COventional=analisi all'equilibriolimit

springs UP=analisi non lineare (schema a molle elasto plastiche)

DR=analisi per terreni tipo argilla in condizione drenata

U=analisi per terreni tipo argilla in condizione NON drenata

Up=analisi non drenata solo per i terreni selezionati

Drive press=Ka=spinta terreno attiva

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011

ka mult=eventuale moltiplicatore Ka
Htr T/B (%)=schema pressione attiva di tipo trapezoidale
Resit press=Kp=spinta terreno passiva
Res Mult=eventuale moltiplicatore Kp
COntle Method=
Support Model=tipologia vincoli fissi (fixed=fissi)
Axial Incl=se azione assiale inclusa
Used FS wall=coeff di riduzione dominio MN
Min FD TOe=sicurezza minima per infissione (analisi classica)
Toe FS rot=sicurezza a rotazione (analisi classica)
Toe FSpas=sicurezza sulle pressioni agenti/resistenti (analisi classica)

GRAFICI FASI DI SCAVO

Di seguito si riportano gli schemi grafici delle fasi di scavo principali.

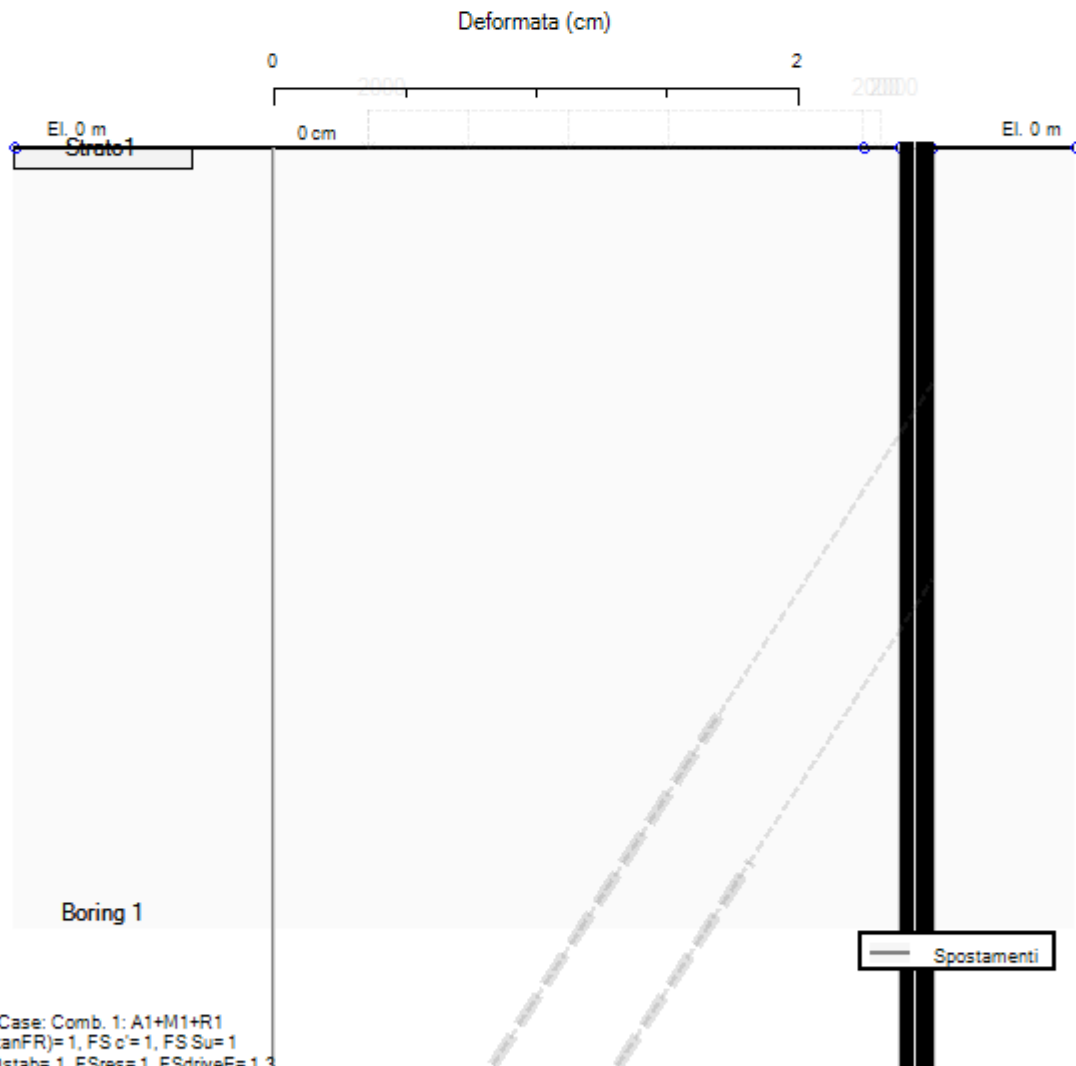
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

Codice documento
SS0558_F0.doc

Rev
F0

Data
20/06/2011

0: DM08_ITA: Comb. 1: A1+M1+R1(LINK: History 0)



DM08_ITA, Case: Comb. 1: A1+M1+R1
Soil 'M': FS(tanFR)=1, FS c'=1, FS Su=1
nStabs=1 nDistabs=1 ESres=1 ESdriveF=1.3

Societa': My Company

Progettista: Engineer

DS: 1, 0

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3/7/2011

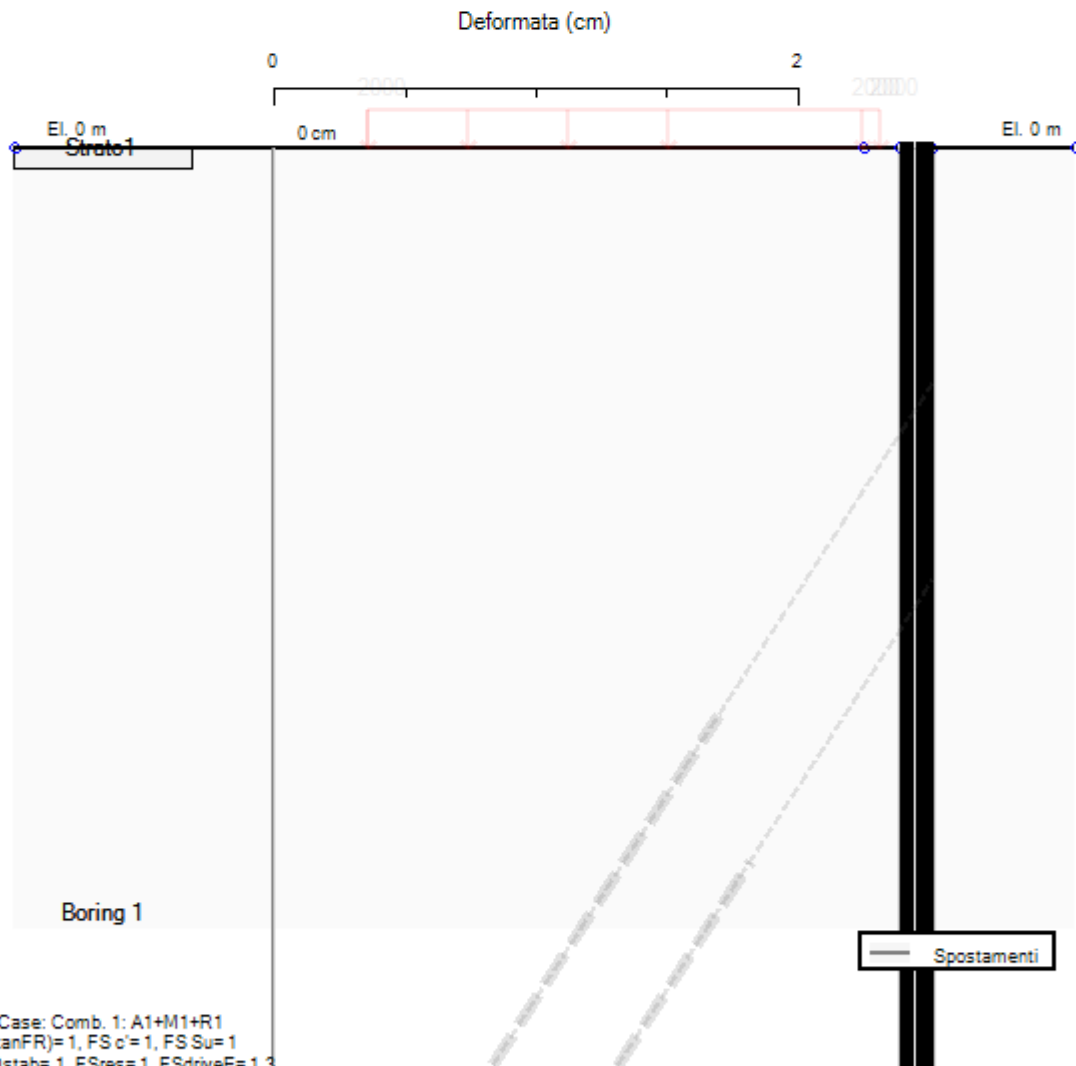
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Codice documento
SS0558_F0.doc

Rev
F0

Data
20/06/2011

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DM08_ITA, Case: Comb. 1: A1+M1+R1
Soil 'M': FS(tanFR)= 1, FS c'= 1, FS Su= 1
nStabs 1 nDistabs 1 ESres=1 ESdriveF= 1.3

Societa': My Company

Progettista: Engineer

DS: 1, Condizione geostatica

CeAS srl and Deep Excavation LCC

Paratie Plus 2011 - DeepXcav 2011

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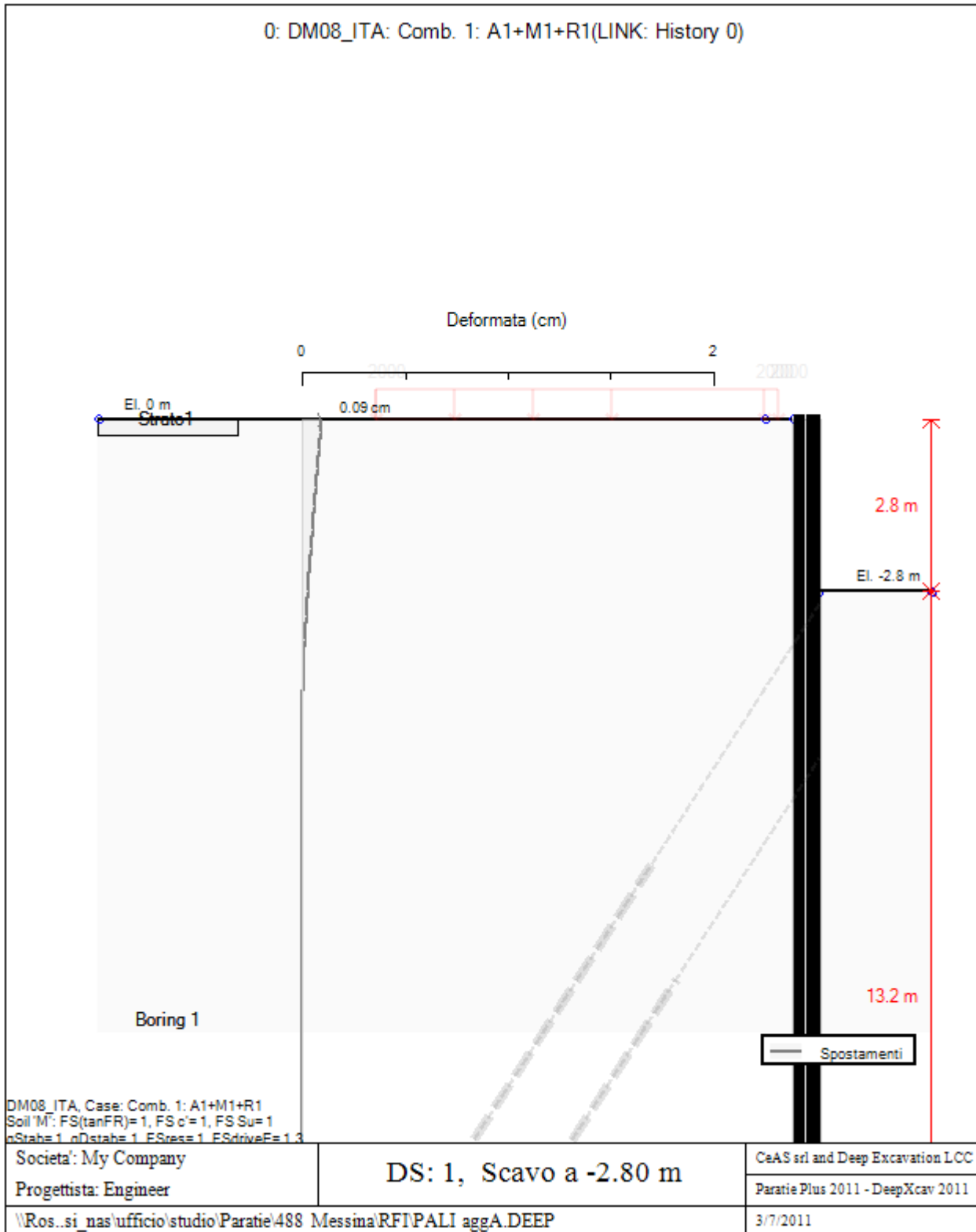
3/7/2011

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

Codice documento
SS0558_F0.doc

Rev
F0

Data
20/06/2011



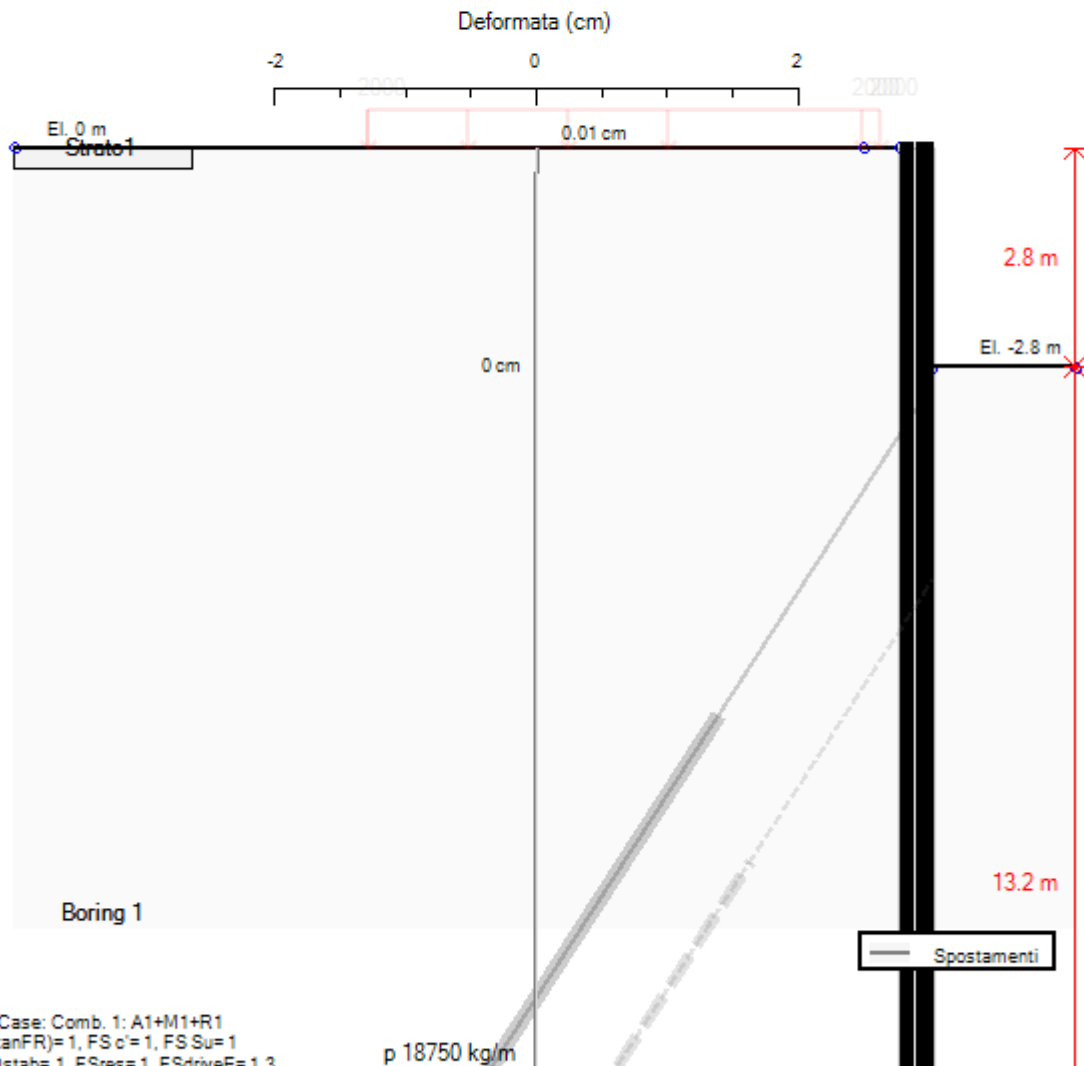
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

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0: DM08_ITA: Comb. 1: A1+M1+R1(LINK: History 0)



DM08_ITA, Case: Comb. 1: A1+M1+R1
Soil 'M': FS(tanFR)=1, FS c'=1, FS Su=1
pStabs_1 nDistabs_1 ESres=1 ESdriveF=1.3

Società: My Company
Progettista: Engineer

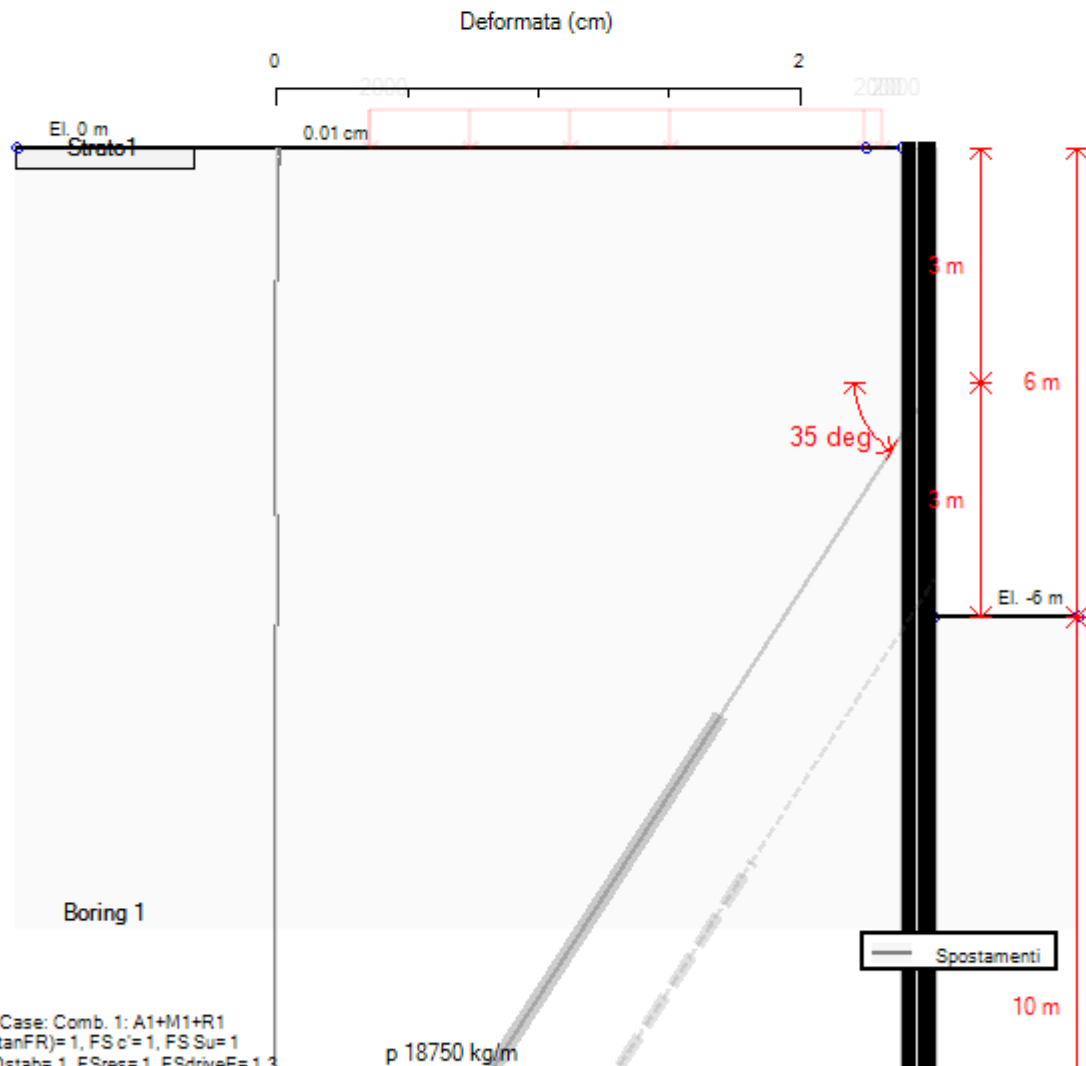
DS: 1, 1 Tirante

CeAS srl and Deep Excavation LCC
Paratie Plus 2011 - DeepXcav 2011

\\Ros..sj_nas\ufficio\studio\Paratie\488 Messina\RFI\PALI aggA.DEEP

3/7/2011

0: DM08_ITA: Comb. 1: A1+M1+R1(LINK: History 0)



DM08_ITA, Case: Comb. 1: A1+M1+R1
Soil 'M': FS(tanFR)=1, FS c'=1, FS Su=1
pStabs 1 nDistabs 1 ESres=1 ESdriveF=1.3

p 18750 kg/m

Spostamenti

10 m

Società: My Company

Progettista: Engineer

DS: 1, New stage 4

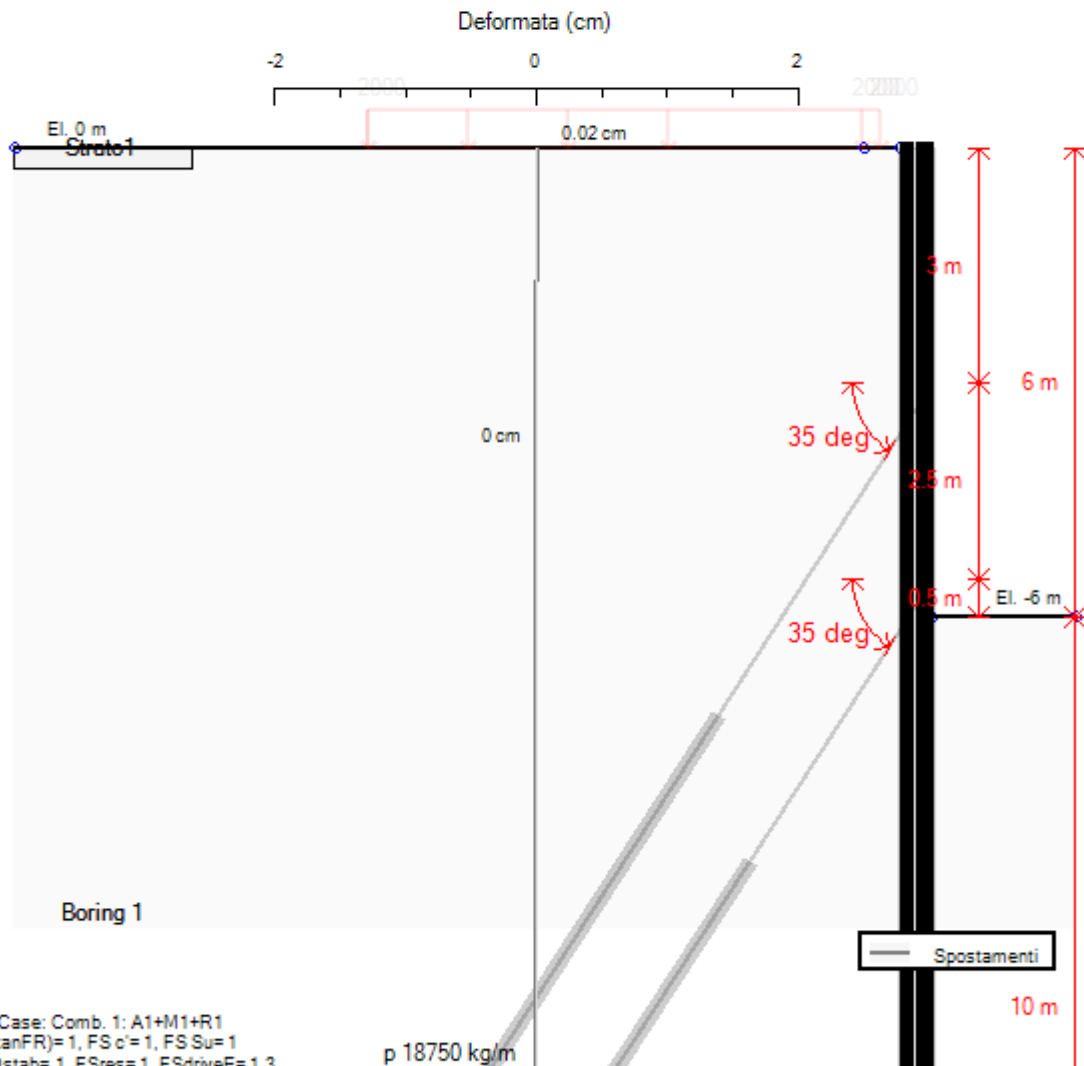
CeAS srl and Deep Excavation LCC

Paratie Plus 2011 - DeepXcav 2011

\\Ros..sj_nas\ufficio\studio\Paratie\488 Messina\RFI\PALI aggA.DEEP

3/7/2011

0: DM08_ITA: Comb. 1: A1+M1+R1(LINK: History 0)



DM08_ITA, Case: Comb. 1: A1+M1+R1
Soil 'M': FS(tanFR)=1, FS c'=1, FS Su=1
pStabs 1 nDistabs 1 ESres=1 ESdriveF=1.3

Societa': My Company

Progettista: Engineer

DS: 1, 2 Tirante

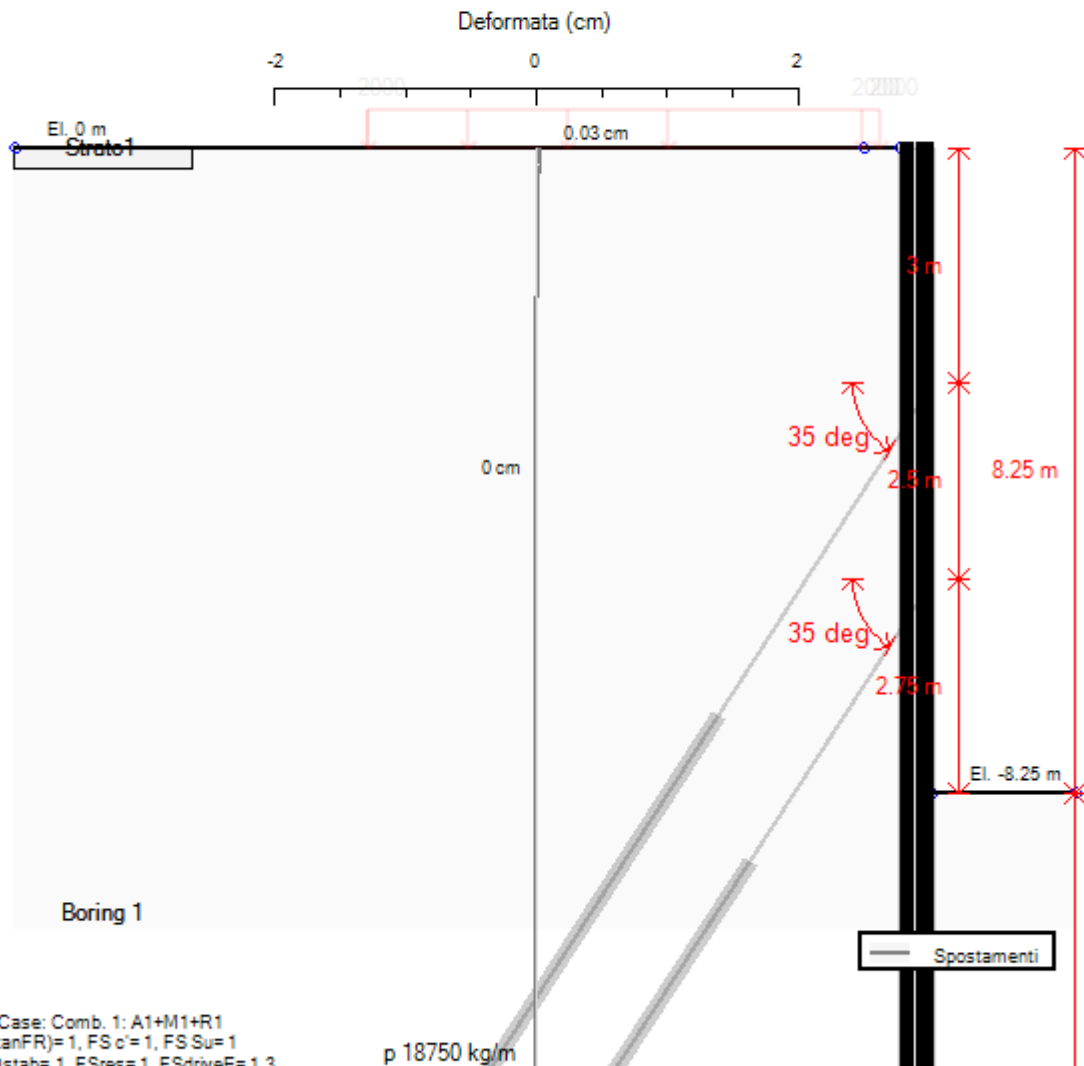
CeAS srl and Deep Excavation LCC

Paratie Plus 2011 - DeepXcav 2011

\\Ros..sj_nas\ufficio\studio\Paratie\488 Messina\RFI\PALI aggA.DEEP

3/7/2011

0: DM08_ITA: Comb. 1: A1+M1+R1(LINK: History 0)



DM08_ITA, Case: Comb. 1: A1+M1+R1
Soil 'M': FS(tanFR)=1, FS c'=1, FS Su=1
nStabs=1, nDistabs=1, ESres=1, ESdriveF=1.3

Societa': My Company
Progettista: Engineer

DS: 1, Fondo scavo

CeAS srl and Deep Excavation LCC

Paratie Plus 2011 - DeepXcav 2011

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3/7/2011

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011

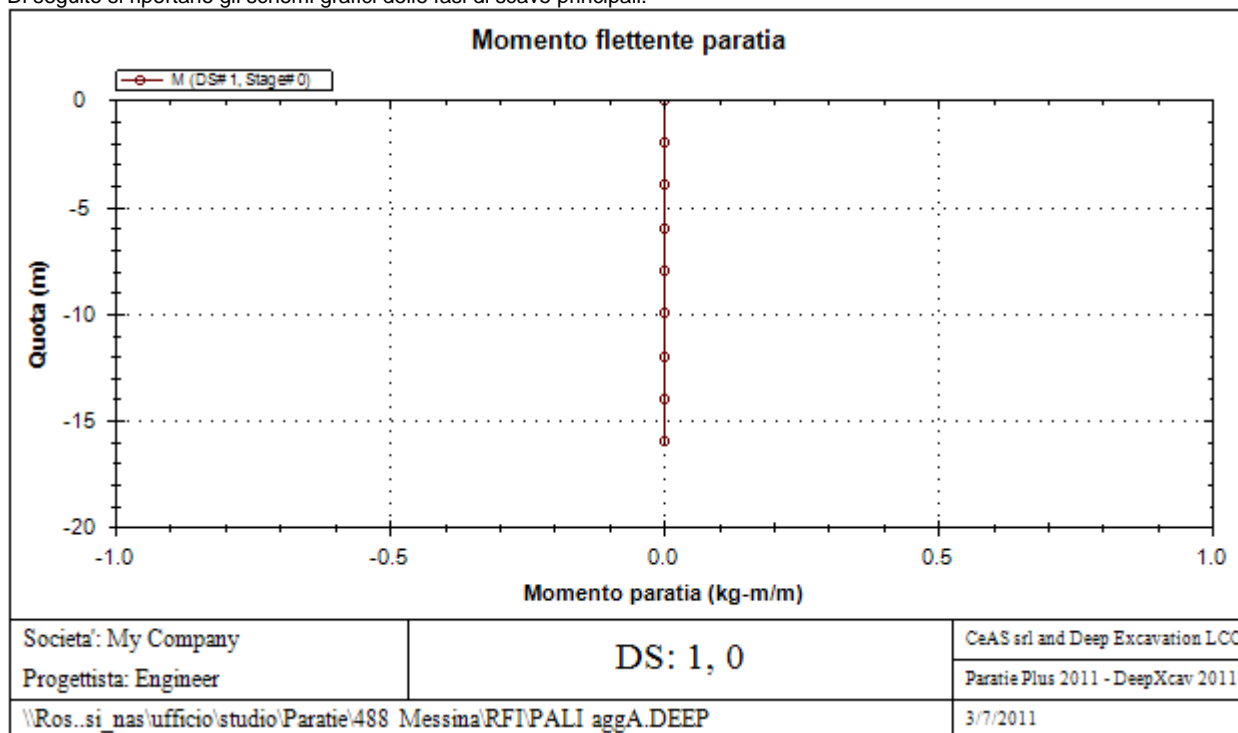
Stabilita' del piede

FS infissione per fase

	FS minimo al piede	FS Passivo	FS Rotazione	FS Lunghezza	FS Pass. mobilizzato	FS Forza attiva / attiva teorica
Stage #0	17.995	19.683	17.995	160	N/A	N/A
Stage #1	14.49	17.382	14.49	160	N/A	N/A
Stage #2	4.714	11.809	7.971	4.714	N/A	N/A
Stage #3	15.131	N/A	15.131	15.131	N/A	N/A
Stage #4	6.25	N/A	9.797	6.25	N/A	N/A
Stage #5	9.091	248.027	10.72	9.091	N/A	N/A
Stage #6	4.429	42.214	7.096	4.429	N/A	N/A
Stage #7	4.189	42.081	7.084	4.189	N/A	N/A

GRAFICI FASI DI SCAVO

Di seguito si riportano gli schemi grafici delle fasi di scavo principali.

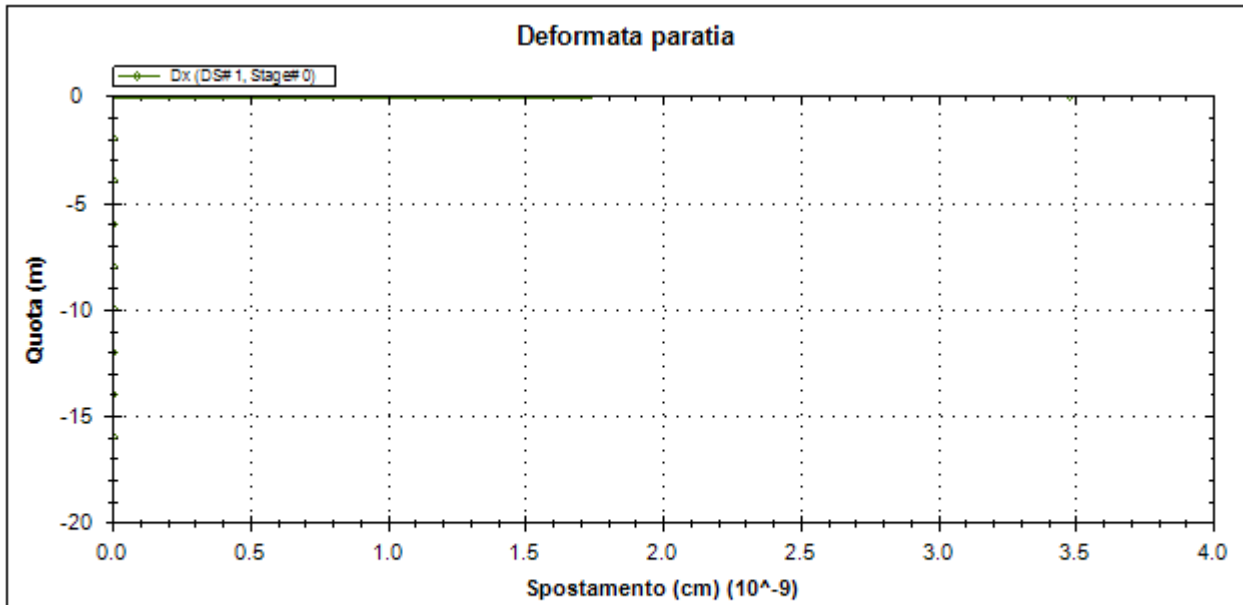


RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

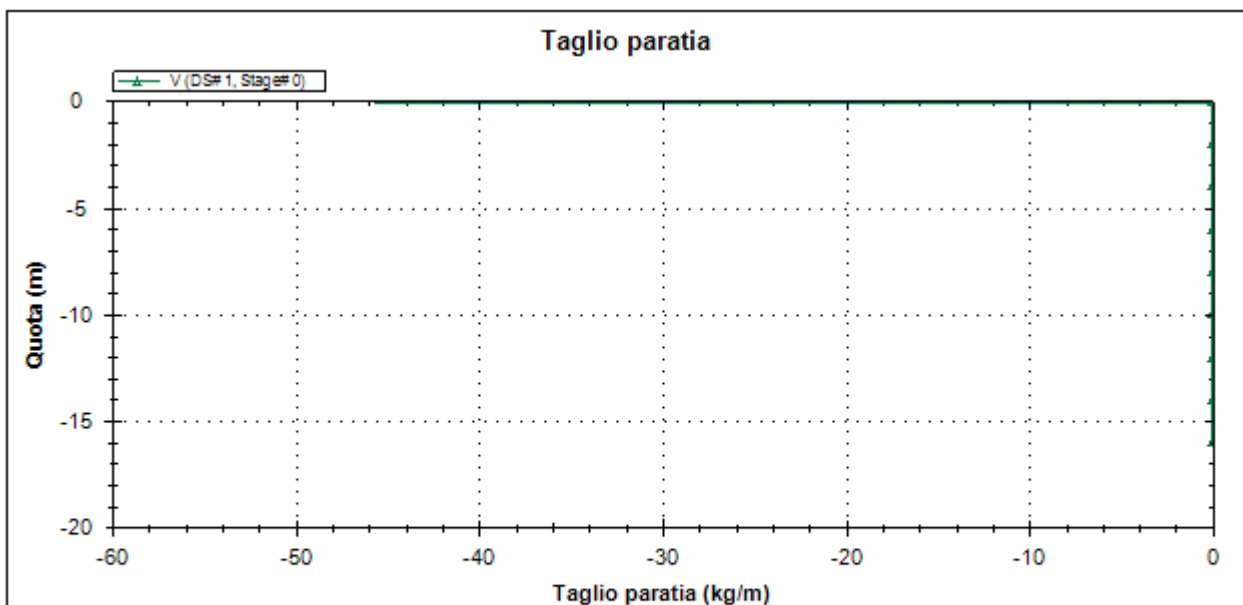
Codice documento
SS0558_F0.doc

Rev
F0

Data
20/06/2011



Societa': My Company	DS: 1, 0	CeAS srl and Deep Excavation LCC
Progettista: Engineer		Paratie Plus 2011 - DeepXcav 2011
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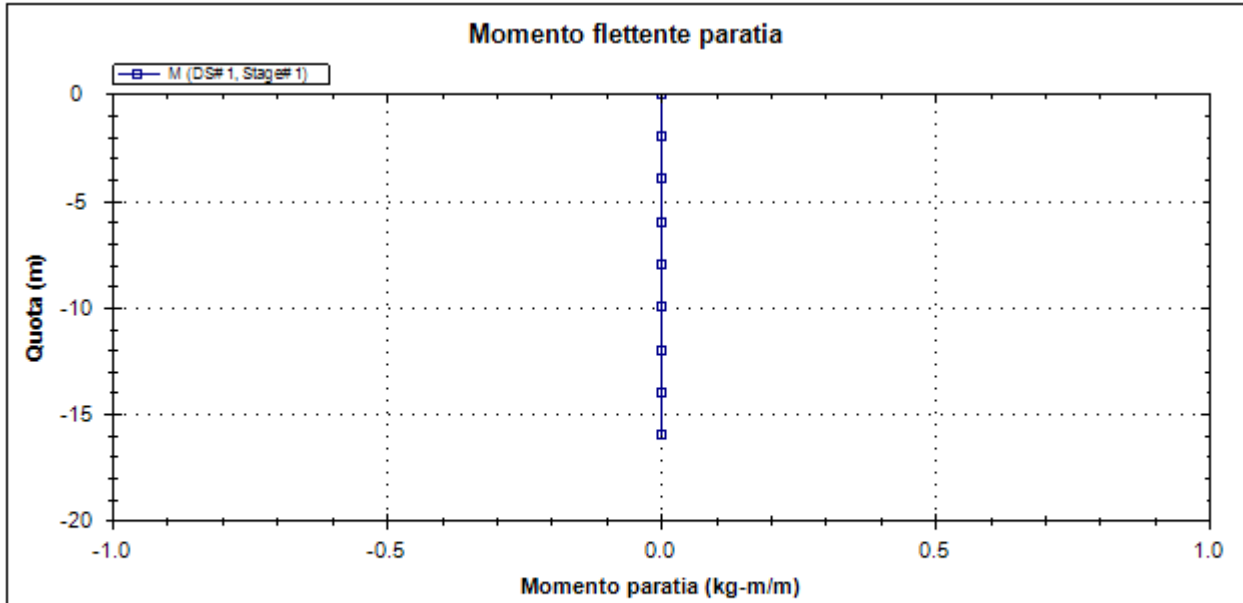
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Progettista: Engineer		Paratie Plus 2011 - DeepXcav 2011
\\Ros...si_nas\ufficio\studio\Paratie\488 Messina\RFI\PALI aggA.DEEP		3/7/2011

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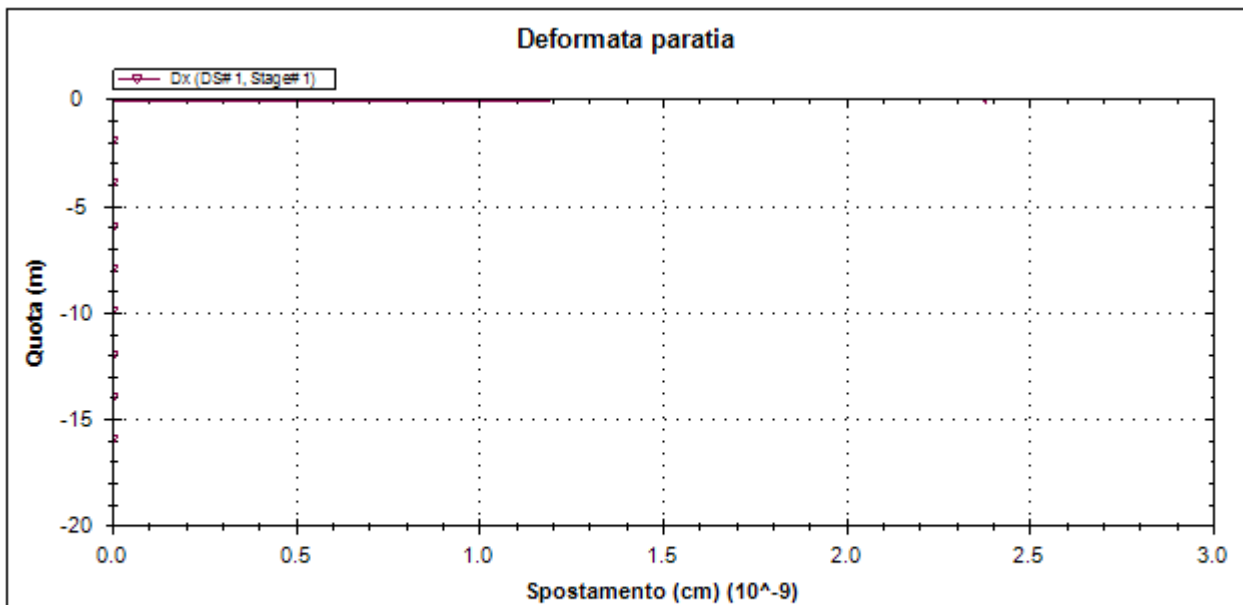
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SS0558_F0.doc

Rev
F0

Data
20/06/2011



Società: My Company Progettista: Engineer	DS: 1, Condizione geostatica	CeAS srl and Deep Excavation LCC Paratie Plus 2011 - DeepXcav 2011
\\Ros...si_nas\ufficio\studio\Paratie\488 Messina\RFI\PALI aggA.DEEP		3/7/2011



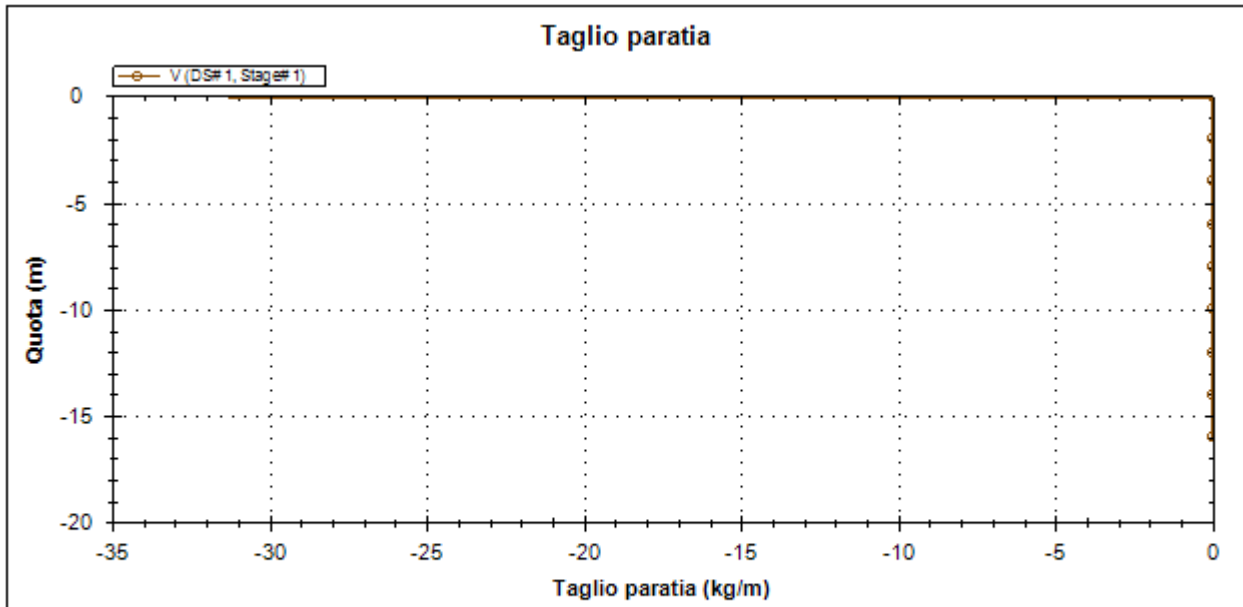
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\\Ros...si_nas\ufficio\studio\Paratie\488 Messina\RFI\PALI aggA.DEEP		3/7/2011

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

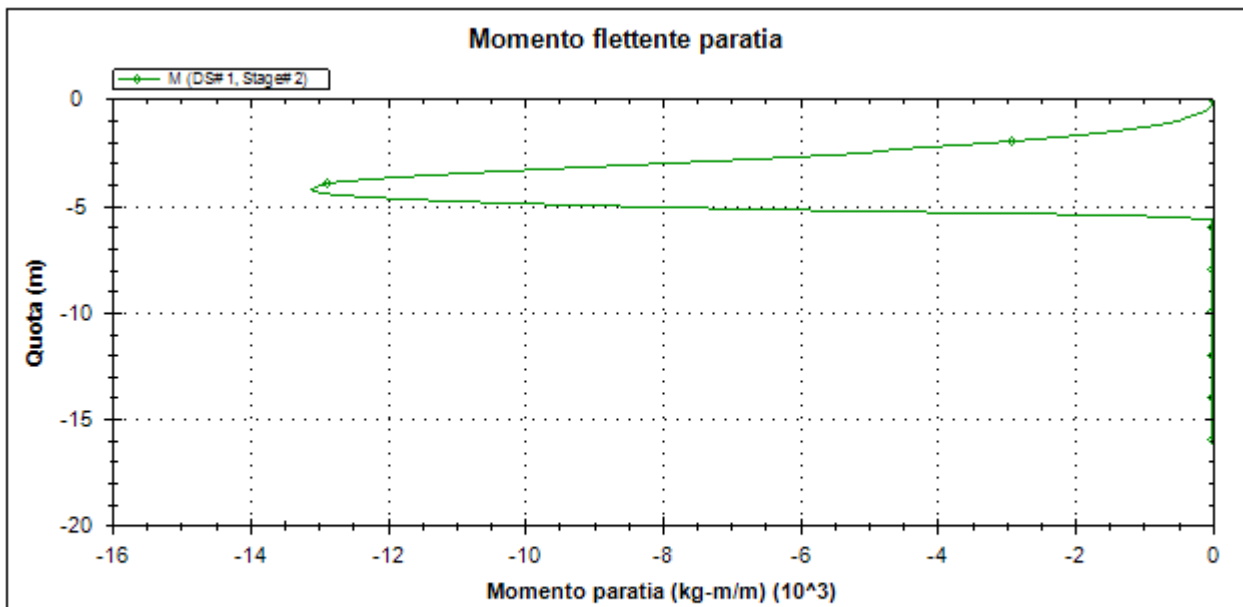
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SS0558_F0.doc

Rev
F0

Data
20/06/2011



Societa': My Company Progettista: Engineer	DS: 1, Condizione geostatica	CeAS srl and Deep Excavation LCC Paratie Plus 2011 - DeepXcav 2011
\\Ros...si_nas\ufficio\studio\Paratie\488 Messina\RFI\PALI aggA.DEEP		3/7/2011



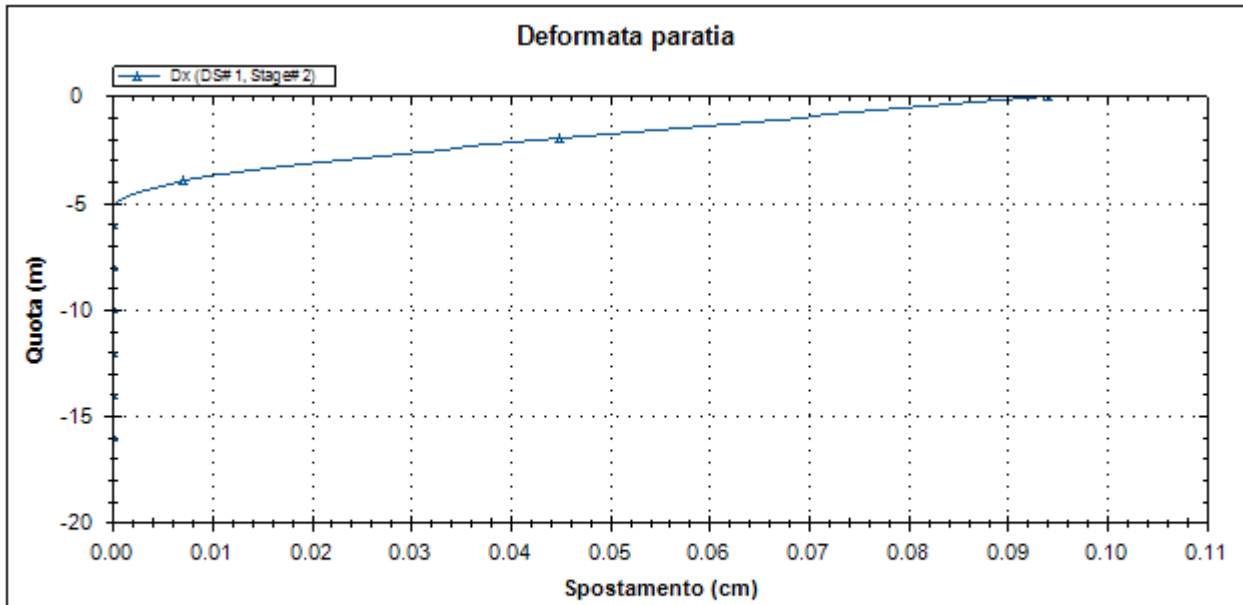
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\\Ros...si_nas\ufficio\studio\Paratie\488 Messina\RFI\PALI aggA.DEEP		3/7/2011

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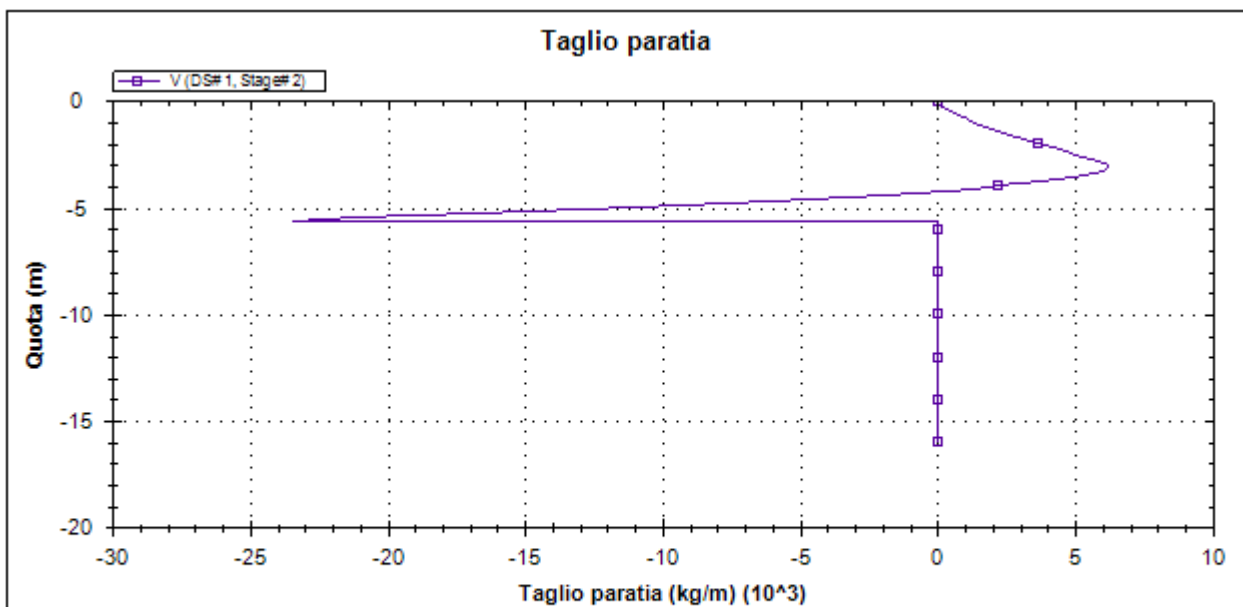
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SS0558_F0.doc

Rev
F0

Data
20/06/2011



Società: My Company Progettista: Engineer	DS: 1, Scavo a -2.80 m	CeAS srl and Deep Excavation LCC Paratie Plus 2011 - DeepXcav 2011
\\Ros...si_nas\ufficio\studio\Paratie\488 Messina\RFI\PALI aggA.DEEP		3/7/2011



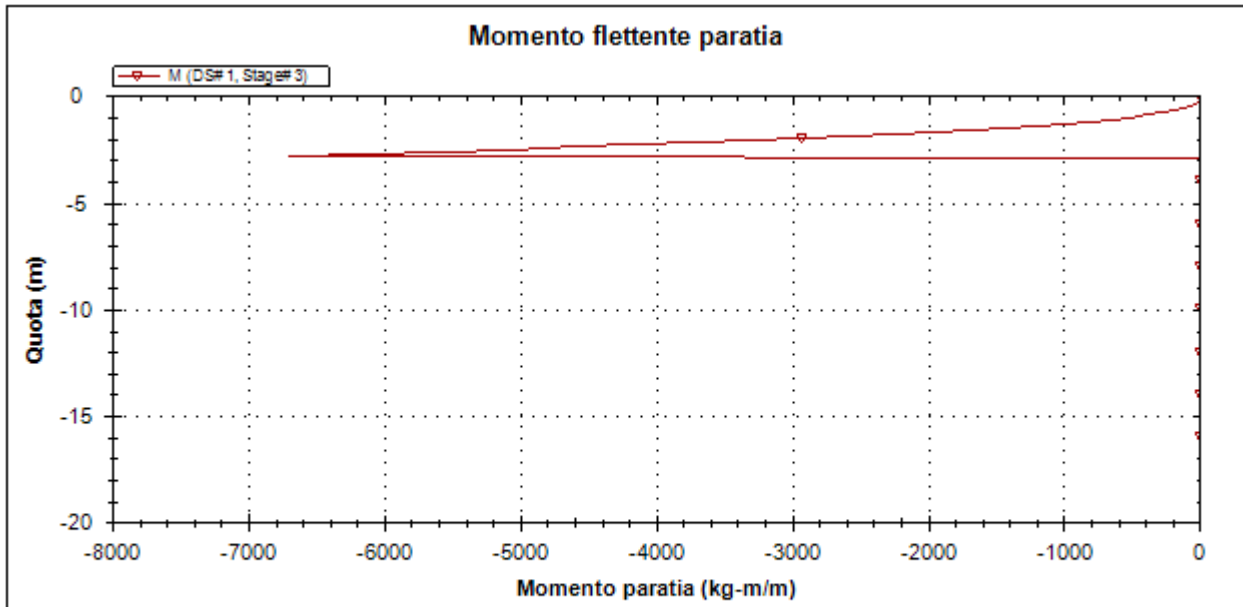
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RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

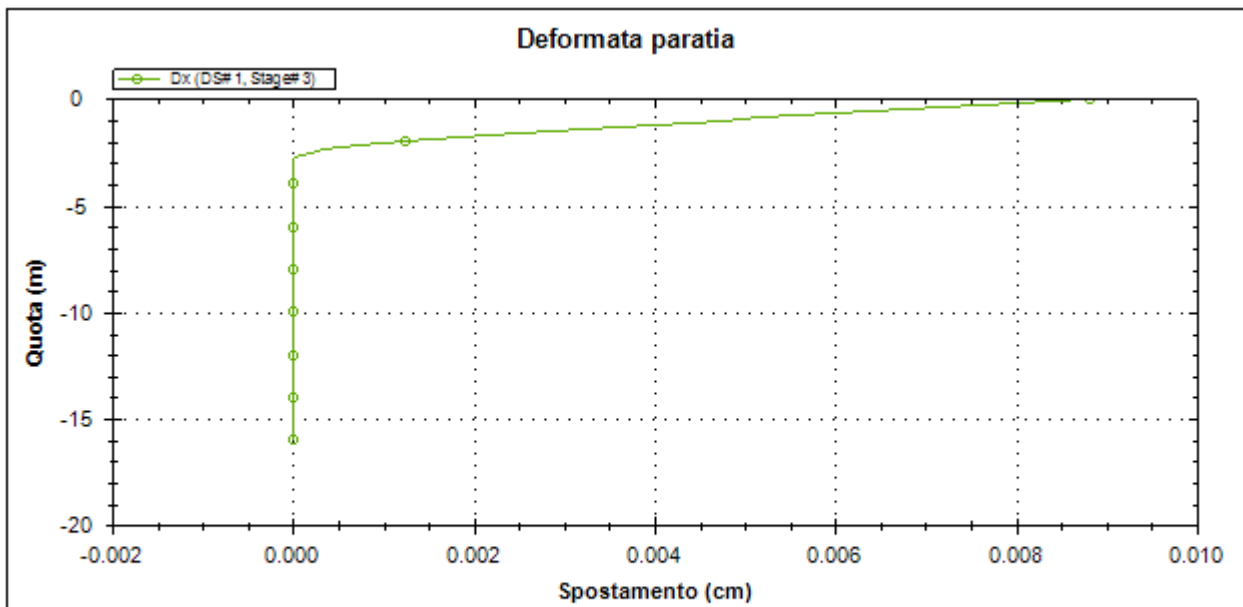
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SS0558_F0.doc

Rev
F0

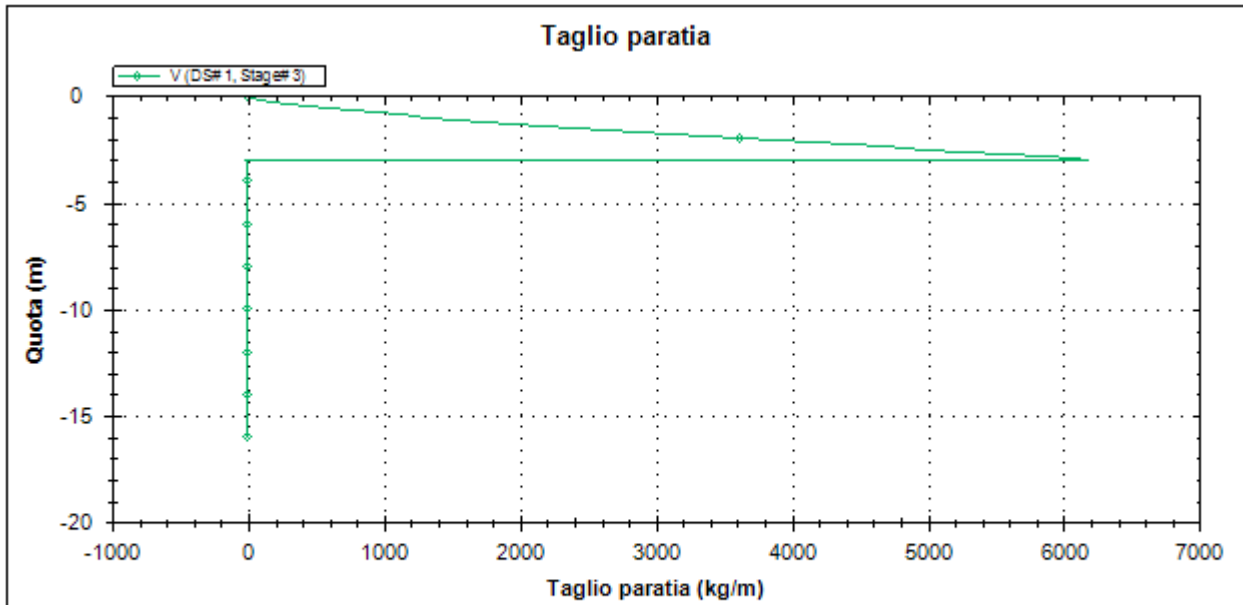
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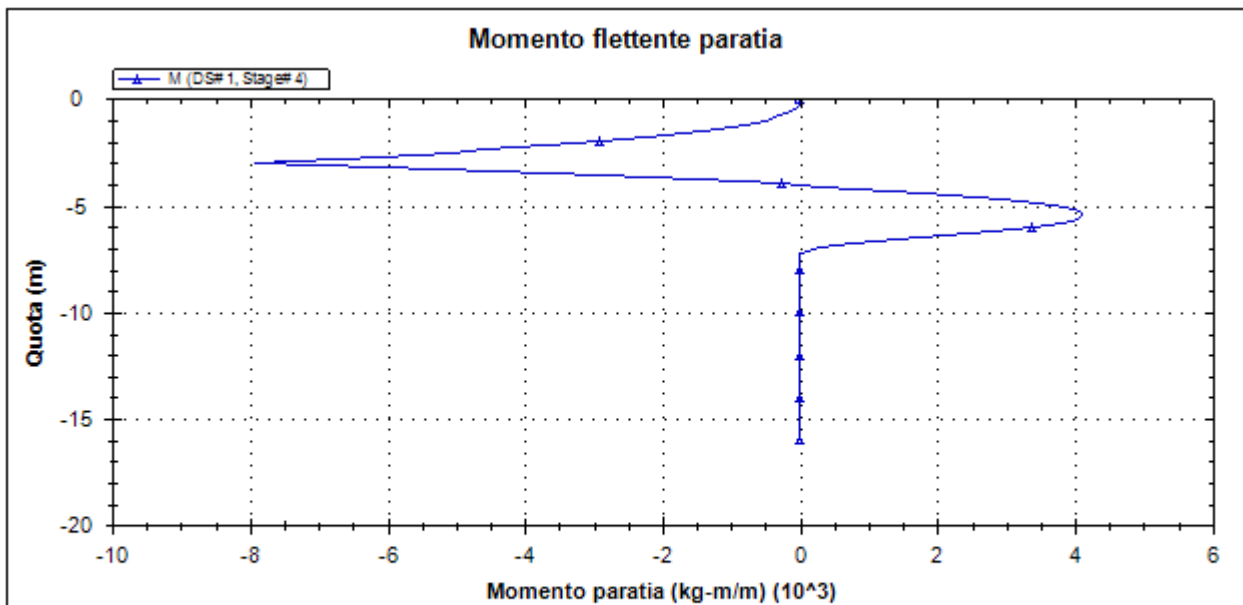
Società: My Company Progettista: Engineer	DS: 1, 1 Tirante	CeAS srl and Deep Excavation LCC Paratie Plus 2011 - DeepXcav 2011
\\Ros...si_nas\ufficio\studio\Paratie\488 Messina\RFI\PALI aggA.DEEP		3/7/2011



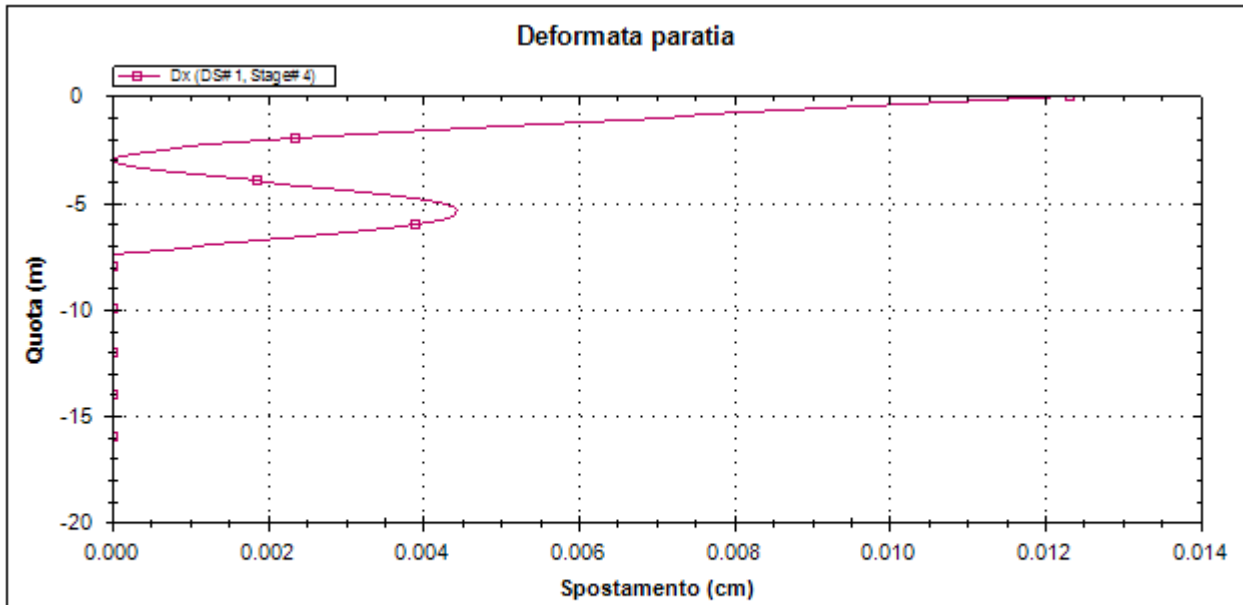
Società: My Company Progettista: Engineer	DS: 1, 1 Tirante	CeAS srl and Deep Excavation LCC Paratie Plus 2011 - DeepXcav 2011
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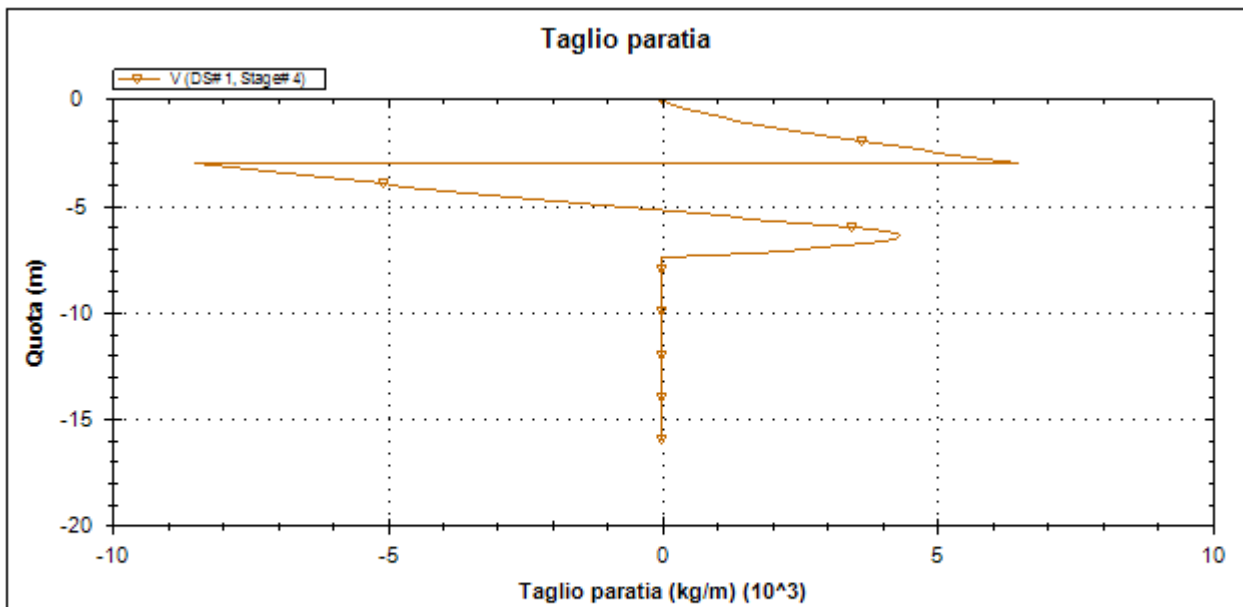
Società: My Company	DS: 1, 1 Tirante	CeAS srl and Deep Excavation LCC
Progettista: Engineer		Paratie Plus 2011 - DeepXcav 2011
\\Ros...si_nas\ufficio\studio\Paratie\488 Messina\RFI\PALI aggA.DEEP		3/7/2011



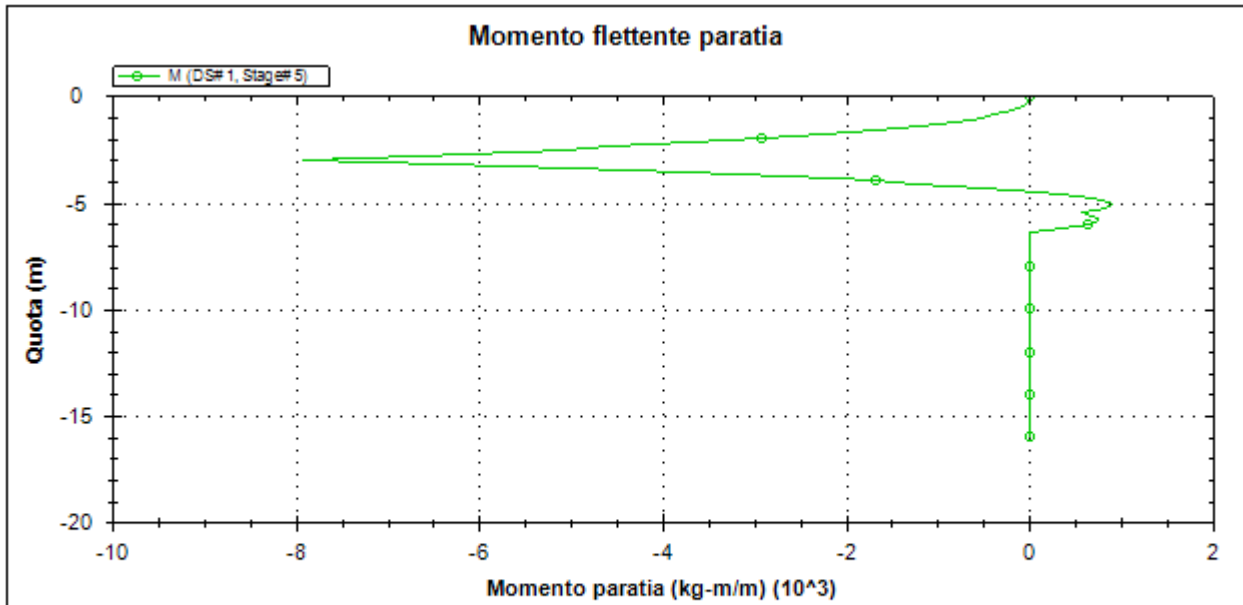
Società: My Company	DS: 1, New stage 4	CeAS srl and Deep Excavation LCC
Progettista: Engineer		Paratie Plus 2011 - DeepXcav 2011
\\Ros...si_nas\ufficio\studio\Paratie\488 Messina\RFI\PALI aggA.DEEP		3/7/2011



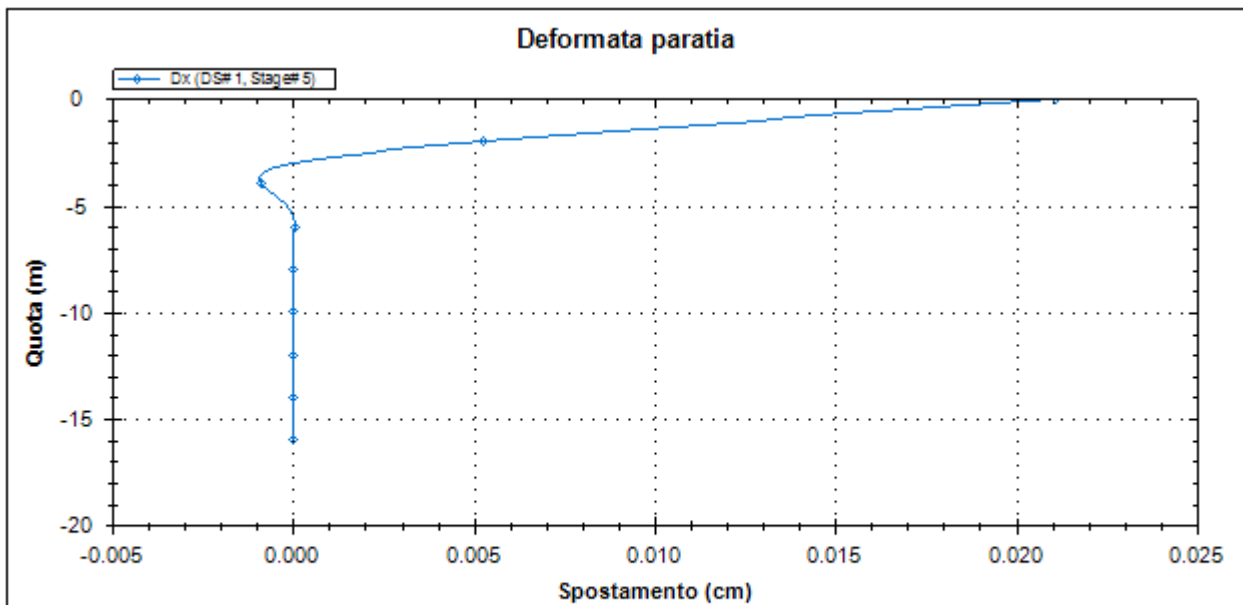
Società: My Company Progettista: Engineer	DS: 1, New stage 4	CeAS srl and Deep Excavation LCC Paratie Plus 2011 - DeepXcav 2011
\\Ros...si_nas\ufficio\studio\Paratie\488 Messina\RFI\PALI aggA.DEEP		3/7/2011



Società: My Company Progettista: Engineer	DS: 1, New stage 4	CeAS srl and Deep Excavation LCC Paratie Plus 2011 - DeepXcav 2011
\\Ros...si_nas\ufficio\studio\Paratie\488 Messina\RFI\PALI aggA.DEEP		3/7/2011



Società: My Company	DS: 1, 2 Tirante	CeAS srl and Deep Excavation LCC
Progettista: Engineer		Paratie Plus 2011 - DeepXcav 2011
\\Ros...si_nas\ufficio\studio\Paratie\488 Messina\RFI\PALI aggA.DEEP		3/7/2011



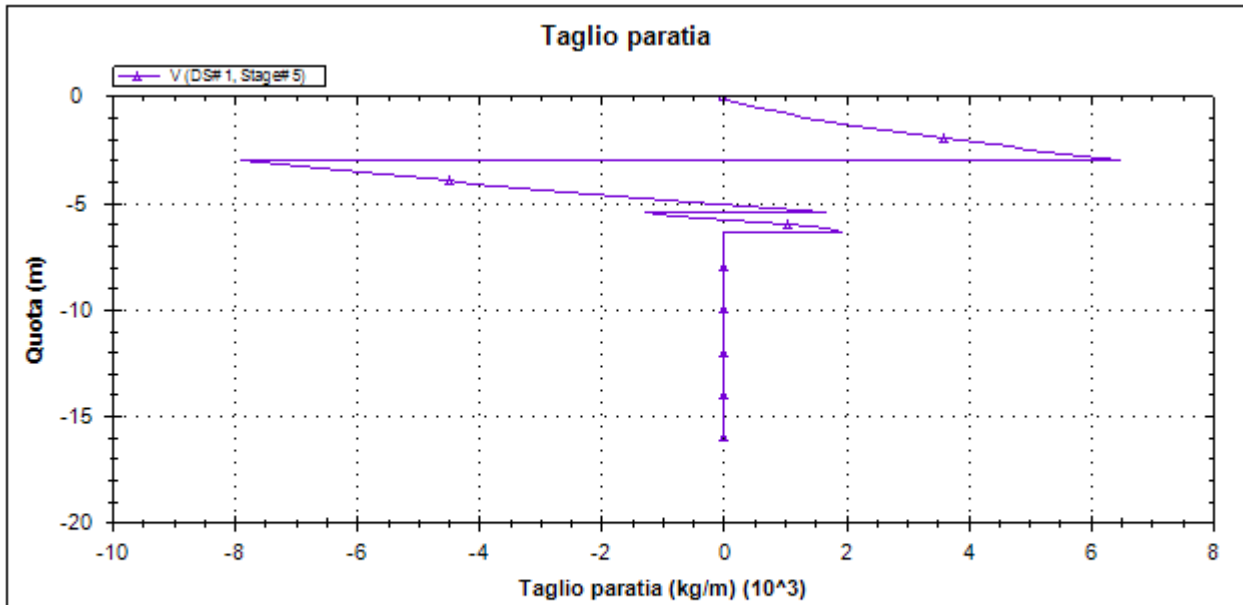
Società: My Company	DS: 1, 2 Tirante	CeAS srl and Deep Excavation LCC
Progettista: Engineer		Paratie Plus 2011 - DeepXcav 2011
\\Ros...si_nas\ufficio\studio\Paratie\488 Messina\RFI\PALI aggA.DEEP		3/7/2011

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

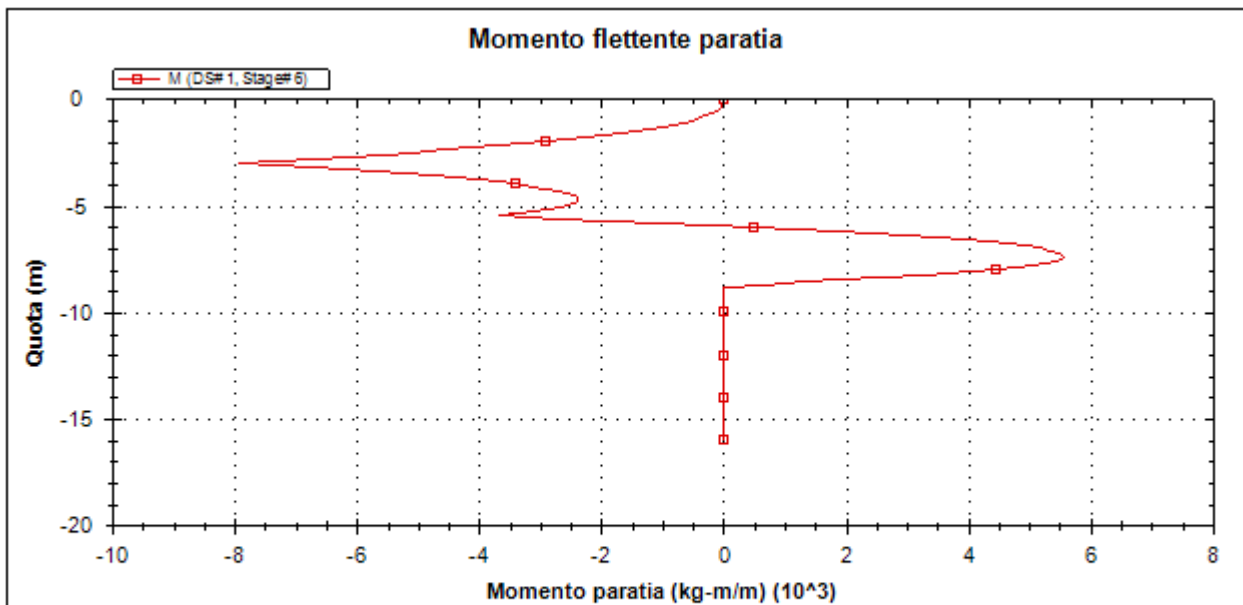
Codice documento
SS0558_F0.doc

Rev
F0

Data
20/06/2011



Società: My Company	DS: 1, 2 Tirante	CeAS srl and Deep Excavation LCC
Progettista: Engineer		Paratie Plus 2011 - DeepXcav 2011
\\Ros...si_nas\ufficio\studio\Paratie\488 Messina\RFI\PALI aggA.DEEP		3/7/2011



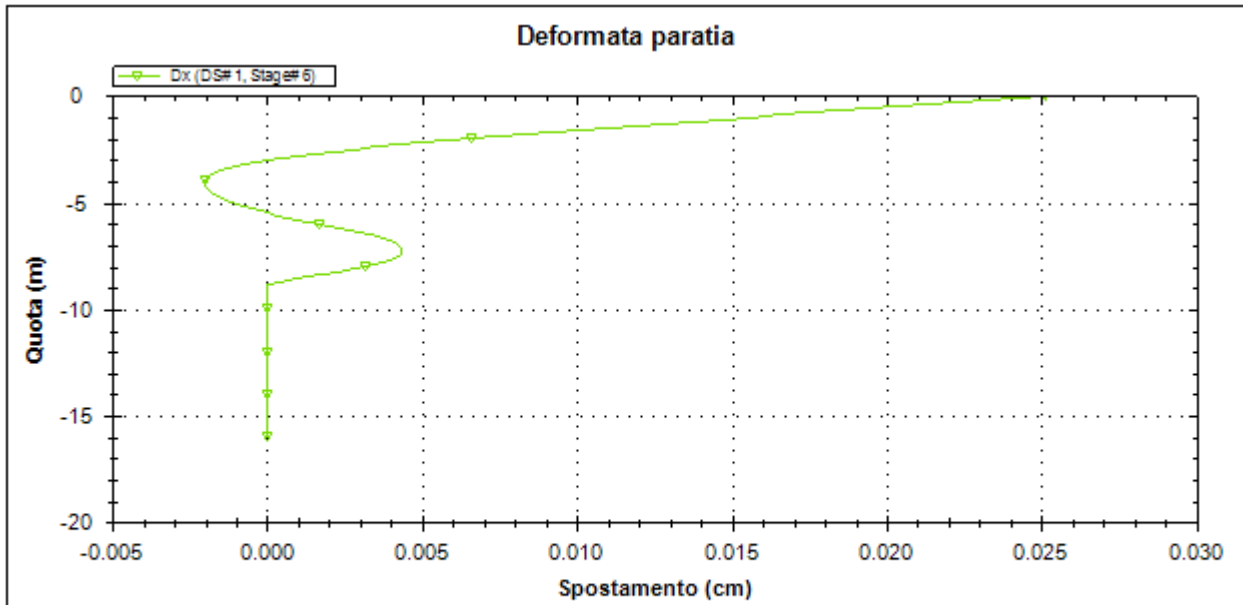
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Progettista: Engineer		Paratie Plus 2011 - DeepXcav 2011
\\Ros...si_nas\ufficio\studio\Paratie\488 Messina\RFI\PALI aggA.DEEP		3/7/2011

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

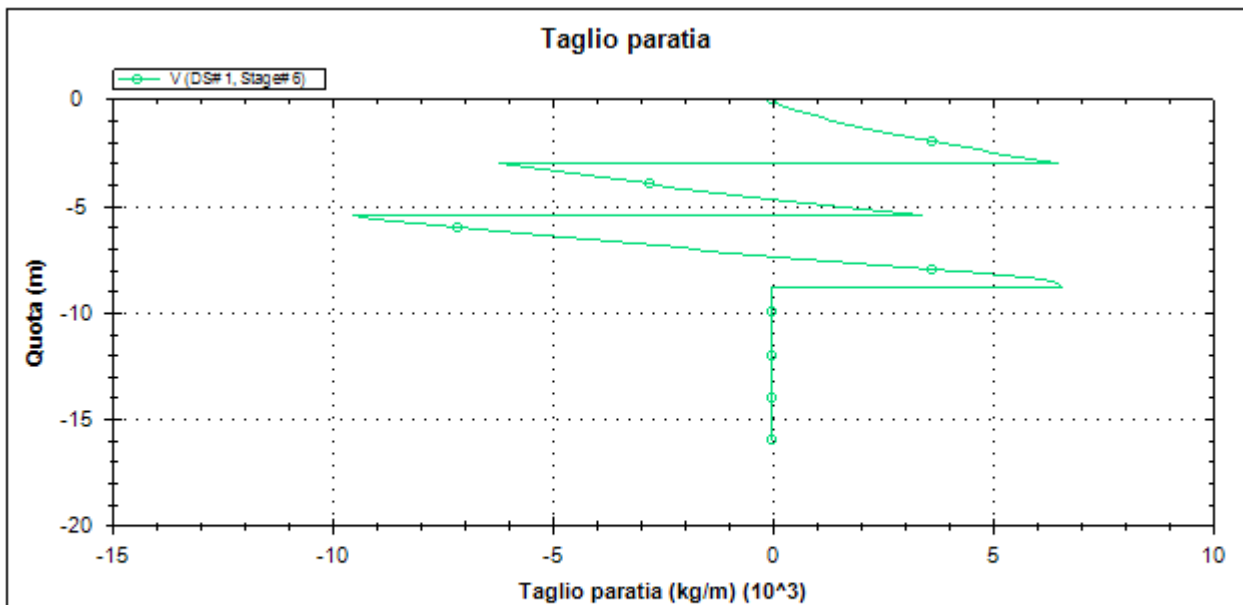
Codice documento
SS0558_F0.doc

Rev
F0

Data
20/06/2011



Societa': My Company Progettista: Engineer	DS: 1, Fondo scavo	CeAS srl and Deep Excavation LCC Paratie Plus 2011 - DeepXcav 2011
\\Ros...si_nas\ufficio\studio\Paratie\488 Messina\RFI\PALI aggA.DEEP		3/7/2011



Societa': My Company Progettista: Engineer	DS: 1, Fondo scavo	CeAS srl and Deep Excavation LCC Paratie Plus 2011 - DeepXcav 2011
\\Ros...si_nas\ufficio\studio\Paratie\488 Messina\RFI\PALI aggA.DEEP		3/7/2011

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
		RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD	<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0

Risultati per la Design Section 2: 0: DM08_ITA: Comb. 2: A2+M2+R1

APPROCCI DI PROGETTO E FATTORI DI COMBINAZIONE

Scenari di progetto utilizzati (da Normativa o personalizzati) e relativi fattori di combinazione

Stage	Design Code	Design Case	F(tan fr)	F (c')	F (Su)	F (EQ)	F(perm load)	F(temp load)	F(perm sup)	F(temp sup)	F Earth (Dstab)	F Earth (stab)	F GWT (Dstab)	F GWT (stab)	F HYD (Dstab)	F HYD (stab)	F UPL (Dstab)	F UPL (stab)
0	DM08_ITA	2: A2+M2+R1	1.25	1.25	1.4	0	1	1.3	1.2	1.1	1	1	1	1	1.35	0.9	1	1
1	DM08_ITA	2: A2+M2+R1	1.25	1.25	1.4	0	1	1.3	1.2	1.1	1	1	1	1	1.35	0.9	1	1
2	DM08_ITA	2: A2+M2+R1	1.25	1.25	1.4	0	1	1.3	1.2	1.1	1	1	1	1	1.35	0.9	1	1
3	DM08_ITA	2: A2+M2+R1	1.25	1.25	1.4	0	1	1.3	1.2	1.1	1	1	1	1	1.35	0.9	1	1
4	DM08_ITA	2: A2+M2+R1	1.25	1.25	1.4	0	1	1.3	1.2	1.1	1	1	1	1	1.35	0.9	1	1
5	DM08_ITA	2: A2+M2+R1	1.25	1.25	1.4	0	1	1.3	1.2	1.1	1	1	1	1	1.35	0.9	1	1
6	DM08_ITA	2: A2+M2+R1	1.25	1.25	1.4	0	1	1.3	1.2	1.1	1	1	1	1	1.35	0.9	1	1
7	DM08_ITA	2: A2+M2+R1	1.25	1.25	1.4	0	1	1.3	1.2	1.1	1	1	1	1	1.35	0.9	1	1

Stage=Fase di scavo

Design Code=Codice di verifica

Ftan fr=fattore moltiplicatore tangente angolo di attrito

F C'=fattore moltiplicatore coesione efficace

F Su'=fattore moltiplicatore coesione non drenata

F EQ=fattore moltiplicatore reazione sismica

F perm load=fattore moltiplicatore carichi permanenti

F temp load=fattore moltiplicatore carichi accidentali/variabili

F perm sup=fattore di riduzione resistenza per verifica pull out tirante

F temp sup=fattore di riduzione resistenza per verifica pull out tirante

F earth Dstab=fattore moltiplicatore per spinta attiva nel caso sfavorevole

F earth stab=fattore moltiplicatore per spinta attiva nel caso favorevole

F GWT Dstab (ground water)=fattore moltiplicatore per spinta idrostatica sfavorevole

F GWT stab (ground water)=fattore moltiplicatore per spinta idrostatica favorevole

F HYD Dstab=fattore moltiplicatore per spinta idrodinamica sfavorevole

F HYD stab=fattore moltiplicatore per spinta idrodinamica favorevole

F UPL Dstab=fattore moltiplicatore per sifonamento sfavorevole

F UPL stab=fattore moltiplicatore per sifonamento favorevole

DATI TERRENO

Name	g tot (daN/m3)	g dry (daN/m3)	Frict (deg)	C' (daN/m2)	Su (daN/m2)	FRp (deg)	FRcv (deg)	Eload (daN/m2)	Eur (daN/m2)	kAp Springs	kPp Springs	kAcv Springs	kPcv Springs	Vary	Spring Model	Color
Strato1	1900	1900	35	0	N/A	N/A	N/A	200000	600000	0.27	3.69	N/A	N/A	True	Linear	
Strato2	1900	1631.55	38	0	N/A	N/A	N/A	4000000	12000000	0.24	4.2	N/A	N/A	True	Linear	

gtot=peso specifico /totale terreno

gdry=peso secco del terreno

Frict=angolo di attrito di calcolo

C'=coesione efficace

Su = Coesione non drenata, parametro attivo per terreni tipo CLAY in condizioni NON drenate

Dilat=Dilatanza terreno (parametro valido solo in analisi non lineare)

Evc=modulo a compressione vergine molla equivalente terreno

Eur=modulo di scarico/ricarico (fase elastica) molla equivalente terreno

Kap= coefficiente di spinta attiva di picco

Kpp= coefficiente di spinta passiva di picco

Kacv= coefficiente di spinta attiva di picco

Kpcv= coefficiente di spinta passiva di picco

Spring models= modalità di definizione dei moduli di rigidezza molle terreno (LIN, EXP, SIMC)

LIN= Lineare-Elastico-Perfettamente plastico

EXP: esponenziale, SUB: Modulo di reazione del sottosuolo

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011

SIMC= Modo semplificato per argille

STRATIGRAFIA TERRENI

Top Elev= quota superiore strato
Soil type=nome del terreno
OCR=rappporto di sovraconsolidazione
K0=coefficiente di spinta a riposo
Nome: Boring 1, pos: (-8, 0)

Top elev.	Soil type	OCR	Ko
0	Strato1	1	0.43
-13	Strato2	1	0.38

DATI GENERALI RELATIVI A MATERIALI E PROPRIETA MECCANICHE ELEMENTI STRUTTURALI

Acciaio

Name	Strength Fy (daN/cm ²)	Fu (daN/cm ²)	Elastic E (daN/cm ²)	Density g (daN/m ³)
S355	3620	5200.6	2100615.4	7851.8148

Calcestruzzo

Name	Strength Fc' (daN/cm ²)	Elastic E (daN/cm ²)	Density g (daN/m ³)	Tension Strength Ft (daN/cm ²)
C25/30	254.9	320965.9	2549.291	10

Barre in acciaio

Name	Strength Fy (daN/cm ²)	Elastic E (daN/cm ²)
S1862 (Strands)	18987.1	2141404
B450C	4588.7	2141404

Legno

Name	Ultimate Bending Strength Fbu (daN/cm ²)	Ultimate Tensile Strength Ftu (daN/cm ²)	Ultimate Shear Strength Fvu (daN/cm ²)	Density g (daN/m ³)	Elastic E (daN/cm ²)
Regular grade	70.4	70.4	41.8	801.2522	56288.3

STEEL=acciaio

Name=nome materiale

strength fy=fyk=res caratteristica acciaio

Fu=fuk=resistenza ultima

Elastic E=modulo elastico

Density g=peso specifico

CONCRETE=calcestruzzo

Name=nome materiale

f'c=fck=resistenza cilindrica a compressione caratteristica cls

Elastic E=modulo elastico

Density g=peso specifico

Tension strength=ft=fctk=resistenza a trazione caratteristica

STEEL REBAR

Name=nome materiale

strength fy=fyk=resistenza caratteristica acciaio

Elastic E=modulo elastico

WOOD=legno

Name=nome materiale

Ultimate bending strength Fb=fbk=resistenza caratteristica a flessione

Ultimate tensile strength Ftu=ftuk=res caratt. parallela alle fibre

Ultimate shear strength Fvu=fvuk=res. caratt. a taglio

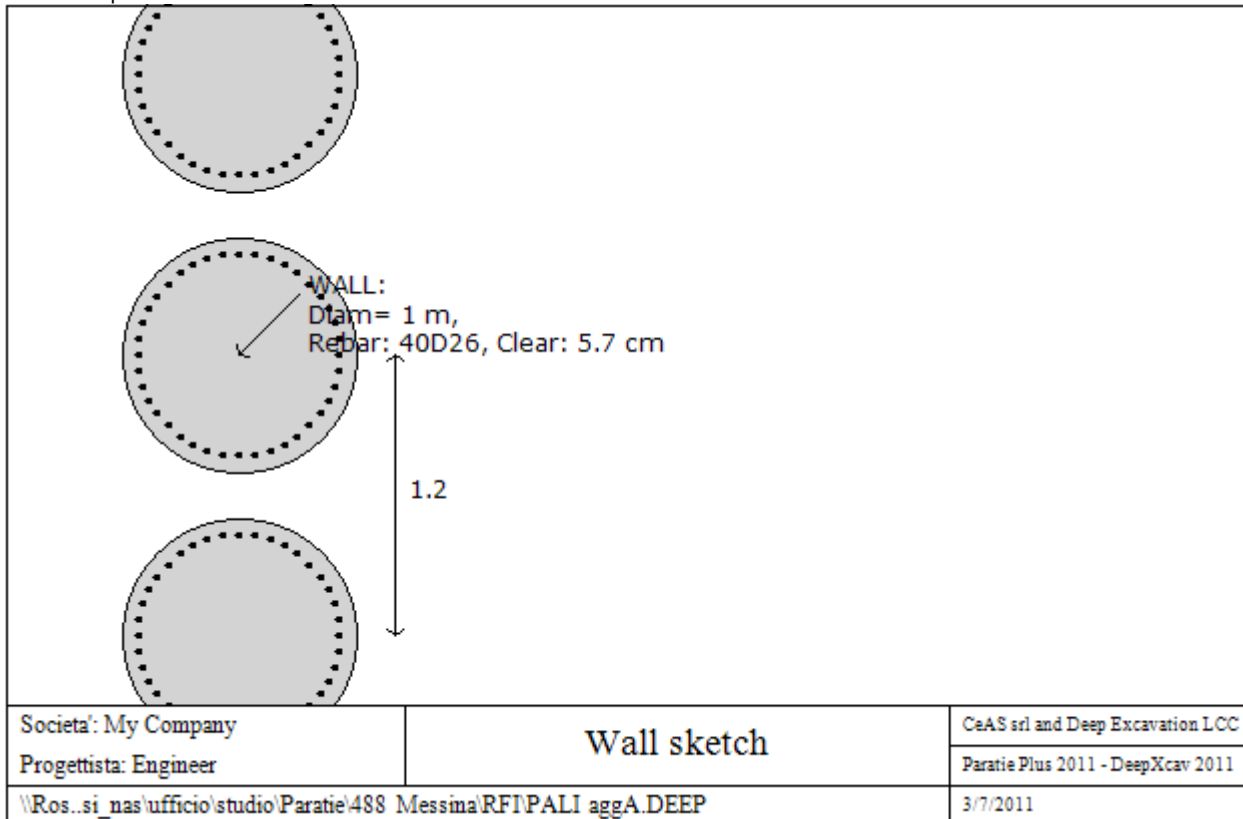
Density g=peso specifico

Elastic E=modulo elastico

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD	<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011	

PROPRIETA' SEZIONI TRAVI DI RIPARTIZIONE

Sezioni paratia0: Berlinese Sx



Sezioni paratia0: PALI 1000

Tipo paratia: Pali tangenti: pali in calcestruzzo armato
Quota sommita' paratia: 0 m Quota piede paratia: -16 m
Dimensione fuori piano paratia: 1.2 Spessore paratia = 1
Ampiezza zona spinta passiva al di sotto del piano di scavo: 1 Ampiezza zona spinta attiva al di sotto del piano di scavo: 1
 $f'c$ cls = 254.9 F_y barre = 4588.7 E_{cls} = 320965.9 F_{cT} calcestruzzo a trazione = 10% di F_c'
 f_y profilati in acciaio = 3620 $E_{acciaio}$ = 2100615.4
Attrito paratia: % attrito terreno = 50%
Le capacita' paratie in acciaio sono calcolate con NTC 2008
Le capacita' paratie in calcestruzzo sono calcolate con ACI 318-2002.
Nota: con la capacita' ultima si dovrebbe adottare un fattore di sicurezza strutturale.
Proprieta' paratie di pali tangenti
Tipo di sezione di calcestruzzo: Rettangolare
Dimensioni della sezione
D = 100 m B = 100 m A = 7853.98163397448 cm² I_{xx} = 4908738.52123405 cm⁴
Armatura longitudinale
Barre cima: N = 40 barre #D26 = A_{sTop} 212.36 cm², C_{top} = 7 m
Barre fondo: N = 40 barre #D25 = A_{sBot} NaN cm², C_{bot} = 7 m
Armatura a taglio
Bar #D10 = A_s 0.785 cm², s_V = 12 m, s_H = 25 m

PROPRIETA' GENERALI

Le travi di ripartizione sono utilizzate sui supporti come elementi strutturali ma non vengono inclusi nel calcolo della rigidezza della paratia.
 $f'c=f_{ck}$ = resistenza cilindrica del calcestruzzo
 $f_y=f_{yk}$ = resistenza caratteristica acciaio

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011

f_y = resistenza caratteristica barre di armatura

TABELLA DEI PARAMETRI (parametri principali)

1) Tutte le travi di ripartizione in calcestruzzo hanno sezione rettangolare

N/A= dato non disponibile

$F_y=f_{yk}$

$F'c=f_{ck}$

D= altezza della trave

B= larghezza della trave

2) Proprietà della trave in acciaio

W= peso per unità di lunghezza

A= area

D= diametro

tw= spessore anima

tp= spessore tubo

bf= larghezza ala

tf= spessore ala

k= spessore flangia

I_{xx}= modulo di inerzia asse forte (per unità di lunghezza)

S_{xx}= momento statico asse forte (per unità di lunghezza)

r_x= raggio giratore di inerzia - asse X

r_y= raggio giratore di inerzia - asse Y

I_{yy}= modulo di inerzia asse debole (per unità di lunghezza)

S_{yy}= momento statico asse debole (per unità di lunghezza)

r_T= raggio giratore per la torsione

C_w= costante di ingobbimento

DATI VINCOLI, TIRANTI, PUNTONI, ECC

Vincolo 0: Tipo = Tirante

X = 1 m, Z = -3 m, S = 2.4 m

L_{free} = 14.00 m, L_{fix} = 15 m

Paratia: Berlinese Sx

Stage No	Active	Prestress	Slab live load	User add. strain
	Si'/No	(daN)	(daN/m ²)	+expansion
0	No	-	-	-
1	No	-	-	-
2	No	-	-	-
3	Si'	45000	-	-
4	Si'	45000	-	-
5	Si'	45000	-	-
6	Si'	45000	-	-
7	Si'	45000	-	-

Vincolo 1: Tipo = Tirante

X = 1 m, Z = -5.5 m, S = 2.4 m

L_{free} = 10.00 m, L_{fix} = 10 m

Paratia: Berlinese Sx

Stage No	Active	Prestress	Slab live load	User add. strain
	Si'/No	(daN)	(daN/m ²)	+expansion
0	No	-	-	-
1	No	-	-	-
2	No	-	-	-
3	No	-	-	-
4	No	-	-	-
5	Si'	45000	-	-
6	Si'	45000	-	-
7	Si'	45000	-	-

Support type= tipo di vincolo

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011

Tieback=tirante
Strut=puntone
Raker=Sbadacchio
LEGENDA PER TIRANTI
Dati generali
Z=quota vincolo
S=interasse in direzione orizzontale
Lfree=lunghezza tratto elastico
Lfix=lunghezza tratto rigido
Rfix=% sfruttamento tratto rigido
Stage No=numero step di scavo
Active=stato tirante (YES=attivo)
Post stress= precarico tirante (carico moltiplicato per interasse)
Walls= indica il nome della paratia alla quale il vincolo è applicato
Nel caso di solette indica il punto di partenza e cioè la paratia di sinistra

PARAMETRI DI CALCOLO PER SINGOLA FASE

Sommario delle assunzioni dell'ultima fase

Name	Analysis	Drive	ka-Mult	Htr T/B	Resist	Res	Contlever	Support	Axial	Used	Min Toe	Toe	Toe
	Method	Press		(%)	Press	Mult	Method	Model	Incl	FSwall	FDtoe	FSrot	FSpas
Stage 0	Conventional-Up	Ka	N/A	N/A	Kp+ d	N/A	Free Earth	Fixed	N/A	1	12.615	12.615	13.562
Stage 1	Conventional-Up	Ka	N/A	N/A	Kp+ d	N/A	Free Earth	Fixed	N/A	1	10.366	10.366	12.129
Stage 2	Conventional-Up	Ka	N/A	N/A	Kp+ d	N/A	Free Earth	Fixed	N/A	1	4	5.698	8.222
Stage 3	Conventional-Up	Ka	N/A	N/A	Kp+ d	N/A	Free Earth	Fixed	N/A	1	10.352	10.352	N/A
Stage 4	Conventional-Up	Ka	N/A	N/A	Kp+ d	N/A	Free Earth	Fixed	N/A	1	5.263	6.684	N/A
Stage 5	Conventional-Up	Ka	N/A	N/A	Kp+ d	N/A	Free Earth	Fixed	N/A	1	7.143	7.285	189.088
Stage 6	Conventional-Up	Ka	N/A	N/A	Kp+ d	N/A	Free Earth	Fixed	N/A	1	3.444	4.809	26.887
Stage 7	Conventional-Up	Ka	N/A	N/A	Kp+ d	N/A	Free Earth	Fixed	N/A	1	3.444	4.802	26.825

Name=nome fase

Analysis method=metodo di calcolo
COnventional=analisi all'equilibriolimito
springs UP=analisi non lineare (schema a molle elasto plastiche)
DR=analisi per terreni tipo argilla in condizione drenata
U=analisi per terreni tipo argilla in condizione NON drenata
Up=analisi non drenata solo per i terreni selezionati

Drive press=Ka=spinta terreno attiva
ka mult=eventuale moltiplicatore Ka
Htr T/B (%)=schema pressione attiva di tipo trapezoidale
Resit press=Kp=spinta terreno passiva
Res Mult=eventuale moltiplicatore Kp
COntle Method=
Support Model=tipologia vincoli fissi (fixed=fissi)
Axial Incl=se azione assiale inclusa
Used FS wall=coeff di riduzione dominio MN
Min FD TOe=sicurezza minima per infissione (analisi classica)
Toe FS rot=sicurezza a rotazione (analisi classica)
Toe FSpas=sicurezza sulle pressioni agenti/resistenti (analisi classica)

GRAFICI FASI DI SCAVO

Di seguito si riportano gli schemi grafici delle fasi di scavo principali.

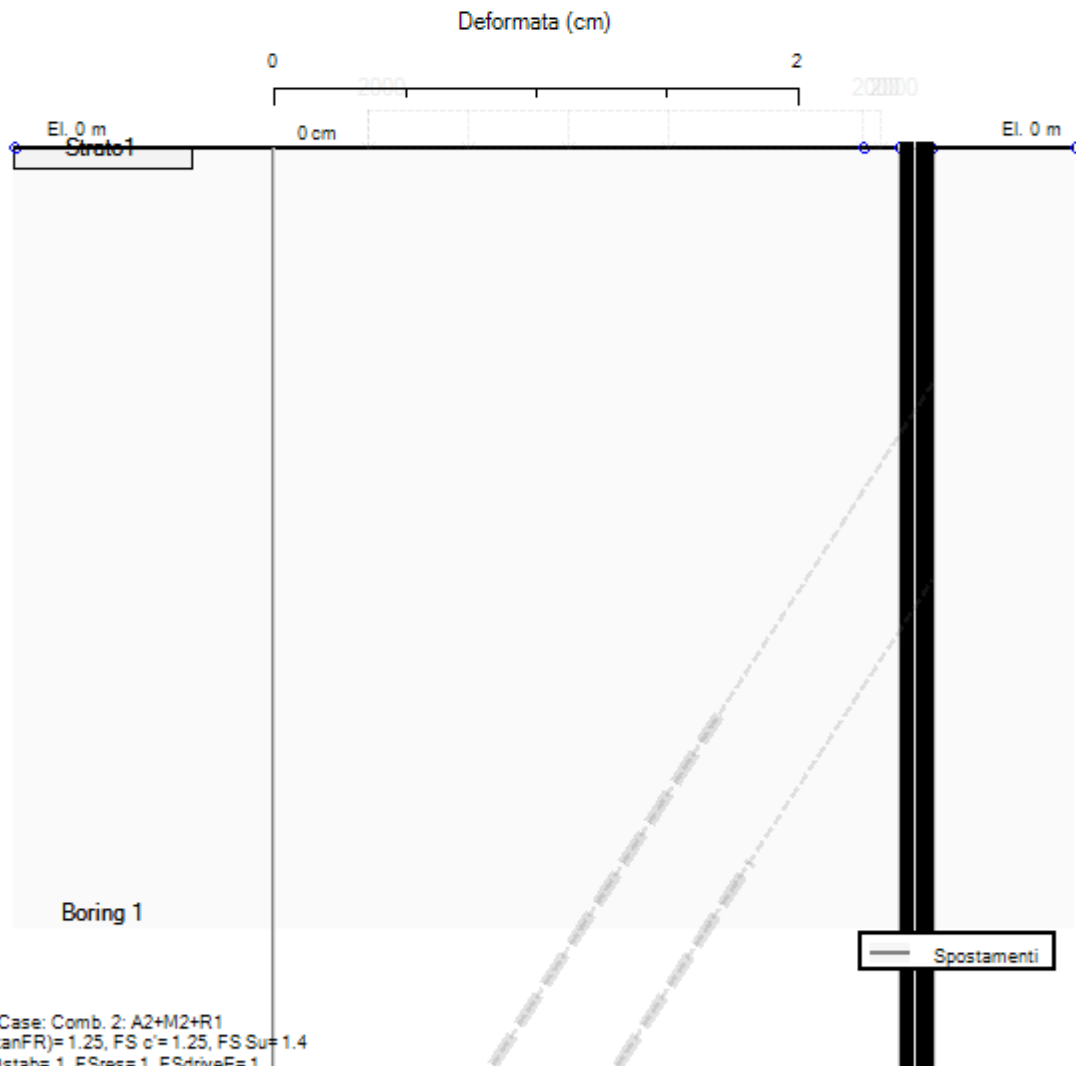
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

Codice documento
SS0558_F0.doc

Rev
F0

Data
20/06/2011

0: DM08_ITA: Comb. 2: A2+M2+R1(LINK: History 0)



DM08_ITA, Case: Comb. 2: A2+M2+R1
Soil 'M': FS(tanFR)= 1.25, FS c'= 1.25, FS Sur= 1.4
nStabs= 1, nDistabs= 1, ESres= 1, ESdriveF= 1

Societa': My Company

Progettista: Engineer

DS: 2, 0

CeAS srl and Deep Excavation LCC

Paratie Plus 2011 - DeepXcav 2011

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3/7/2011

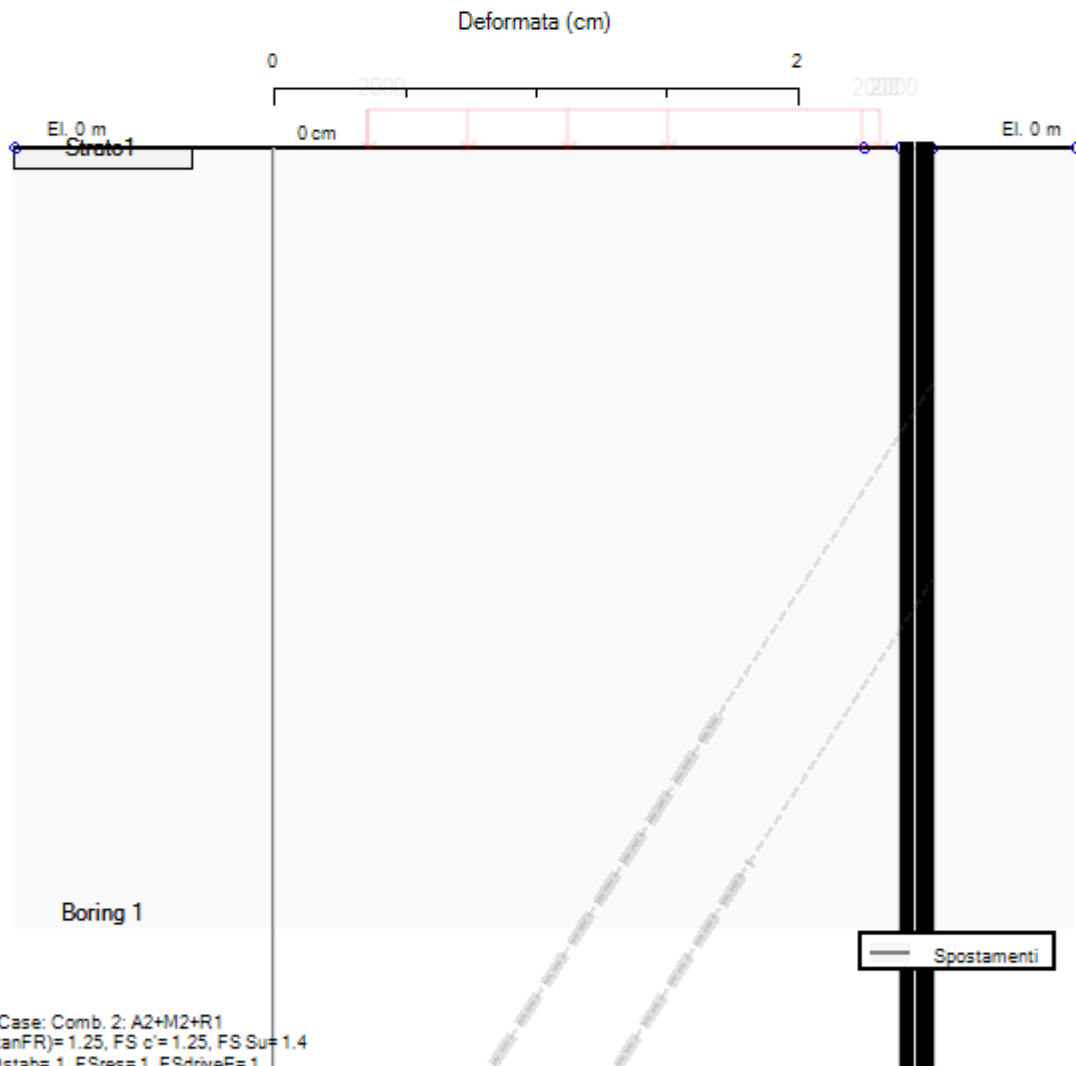
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SS0558_F0.doc

Rev
F0

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DM08_ITA, Case: Comb. 2: A2+M2+R1
Soil 'M': FS(tanFR)= 1.25, FS c'= 1.25, FS Sur= 1.4
nStabs= 1, nDistabs= 1, ESres= 1, ESdriveF= 1

Societa': My Company

Progettista: Engineer

DS: 2, Condizione geostatica

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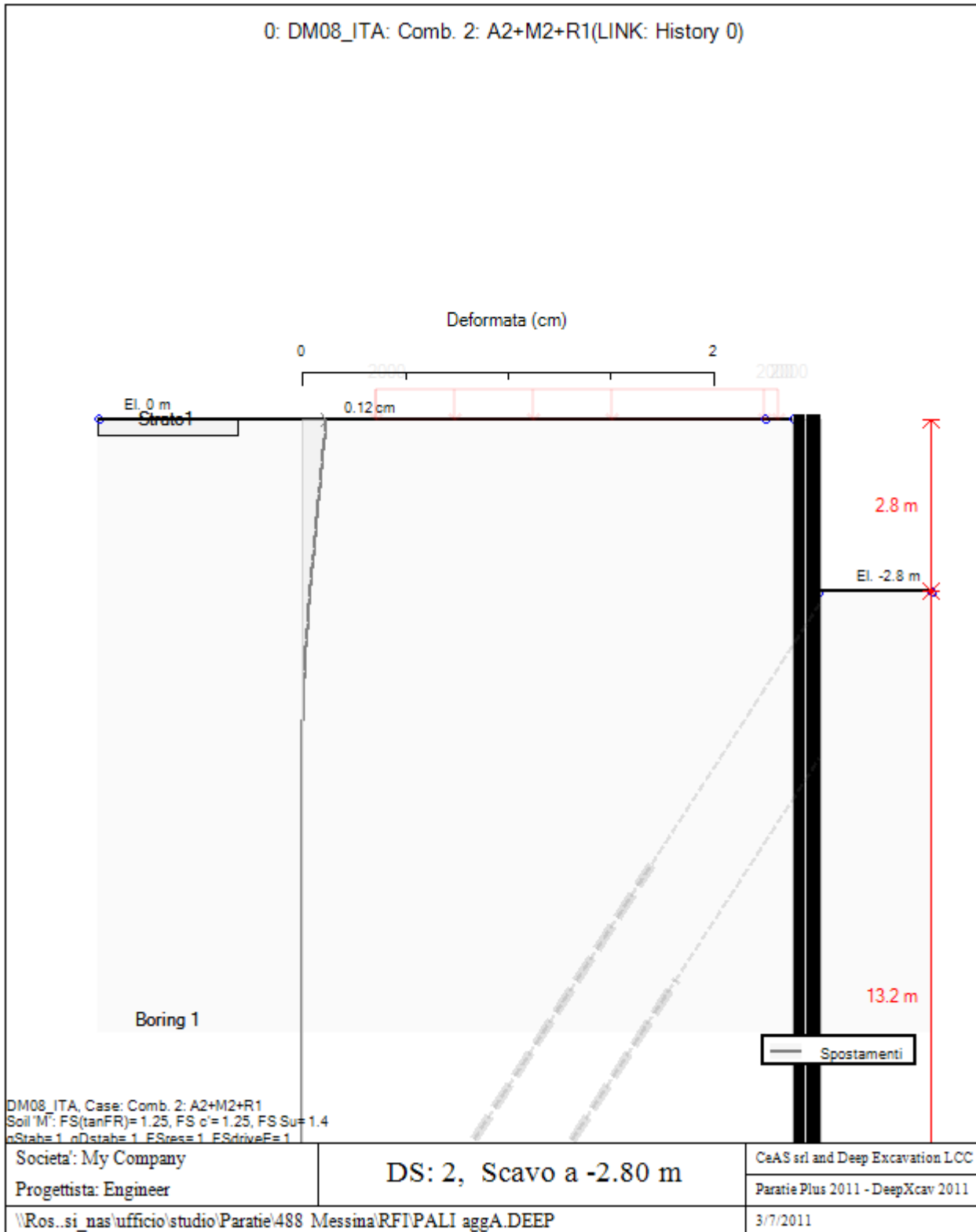
3/7/2011

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

Codice documento
SS0558_F0.doc

Rev
F0

Data
20/06/2011



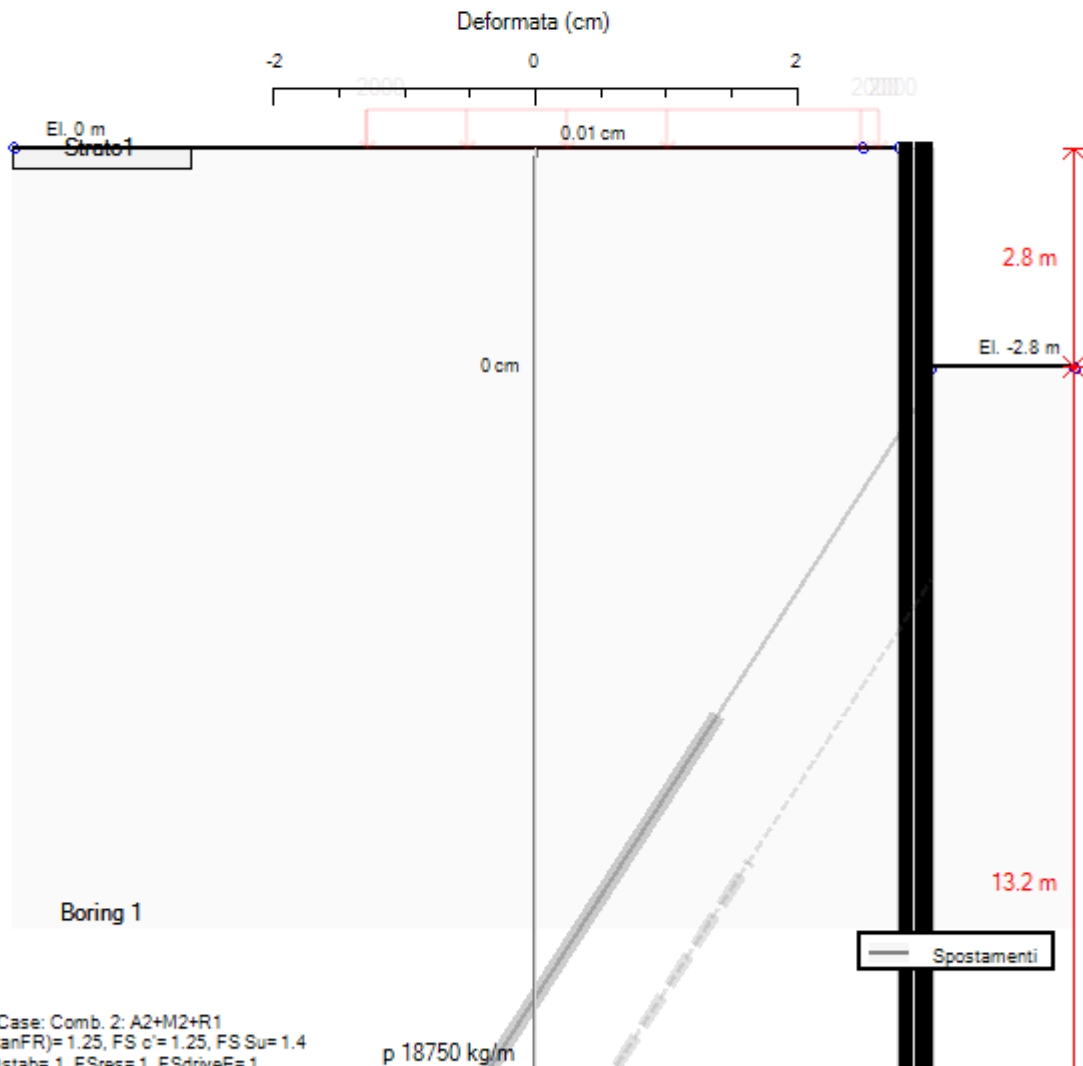
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Codice documento
SS0558_F0.doc

Rev
F0

Data
20/06/2011

0: DM08_ITA: Comb. 2: A2+M2+R1(LINK: History 0)



DM08_ITA, Case: Comb. 2: A2+M2+R1
Soil 'M': FS(tanFR)= 1.25, FS c'= 1.25, FS Su= 1.4
pStabs_1_nDistabs_1_FSres=1_FSdriveF=1

p 18750 kg/m

Societa': My Company

Progettista: Engineer

DS: 2, 1 Tirante

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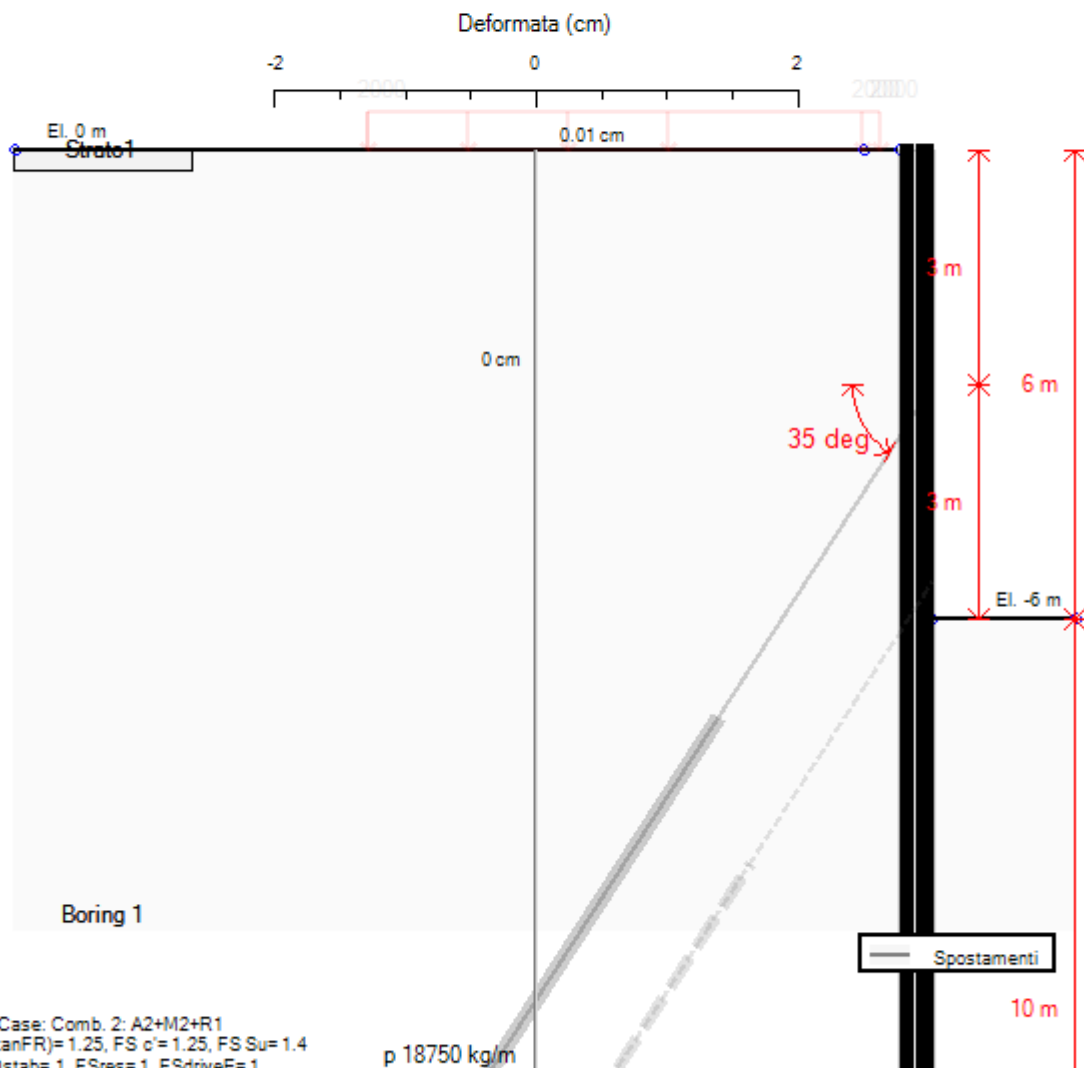
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Codice documento
SS0558_F0.doc

Rev
F0

Data
20/06/2011

0: DM08_ITA: Comb. 2: A2+M2+R1(LINK: History 0)



DM08_ITA, Case: Comb. 2: A2+M2+R1
Soil 'M': FS(tanFR)= 1.25, FS c'= 1.25, FS Su= 1.4
pStabs 1 nDistabs 1 ESres=1 ESdriveF=1

Societa': My Company

Progettista: Engineer

DS: 2, New stage 4

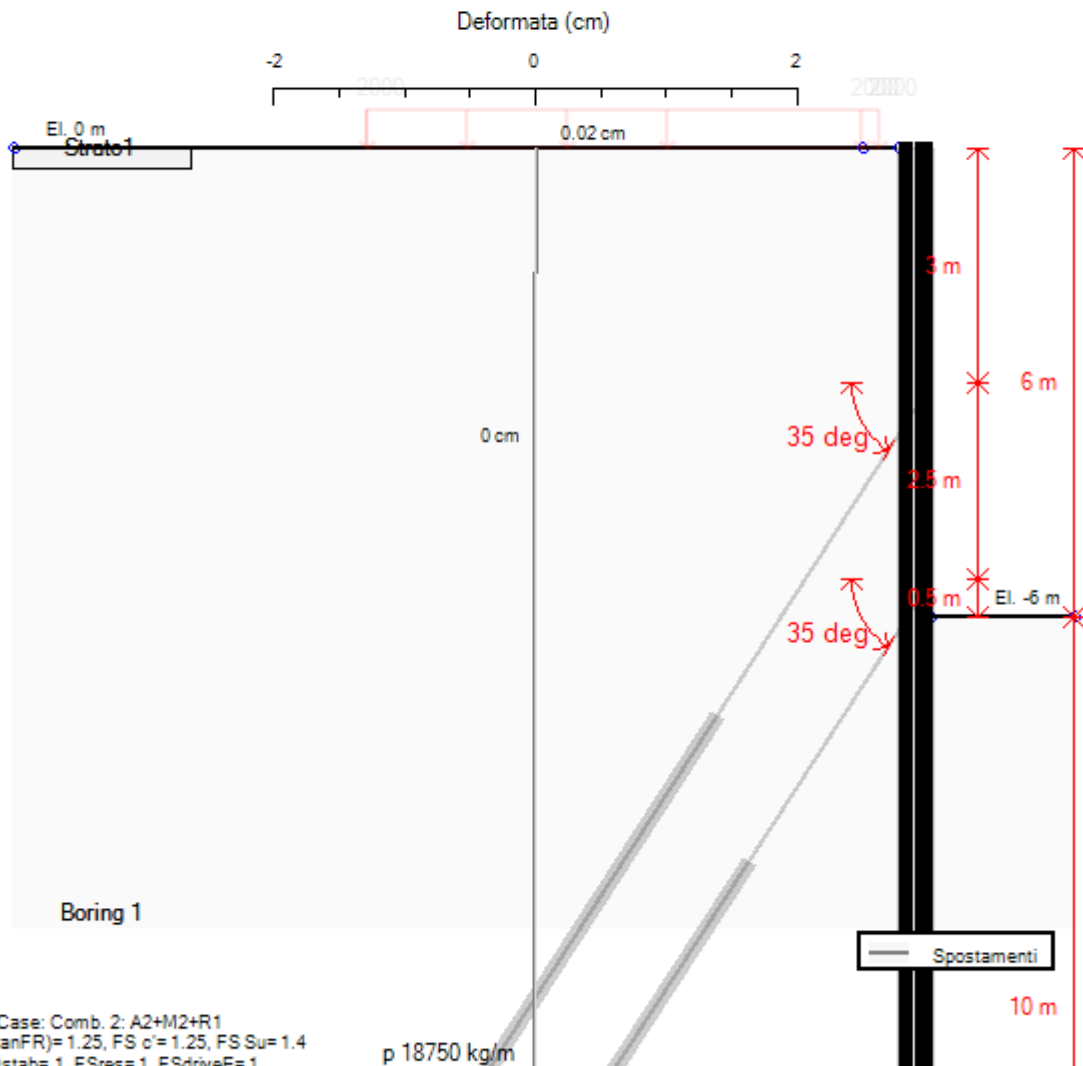
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3/7/2011

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DM08_ITA, Case: Comb. 2: A2+M2+R1
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nStabs=1, nDistabs=1, ESres=1, ESdriveF=1

Societa': My Company

Progettista: Engineer

DS: 2, 2 Tirante

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3/7/2011

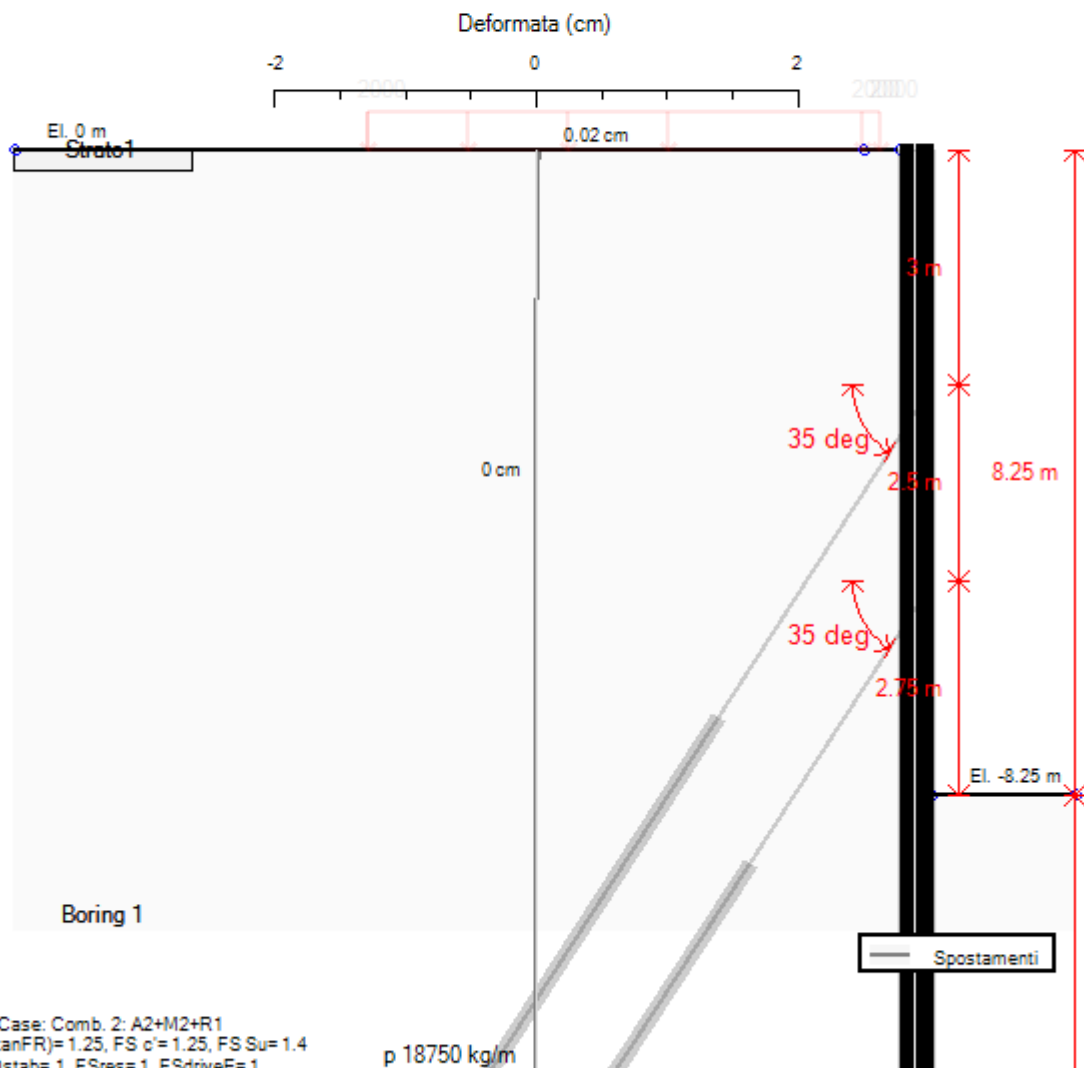
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Codice documento
SS0558_F0.doc

Rev
F0

Data
20/06/2011

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pStabs_1_nDistabs_1_ESres=1, ESdriveF=1

Societa': My Company
Progettista: Engineer

DS: 2, Fondo scavo

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3/7/2011

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011

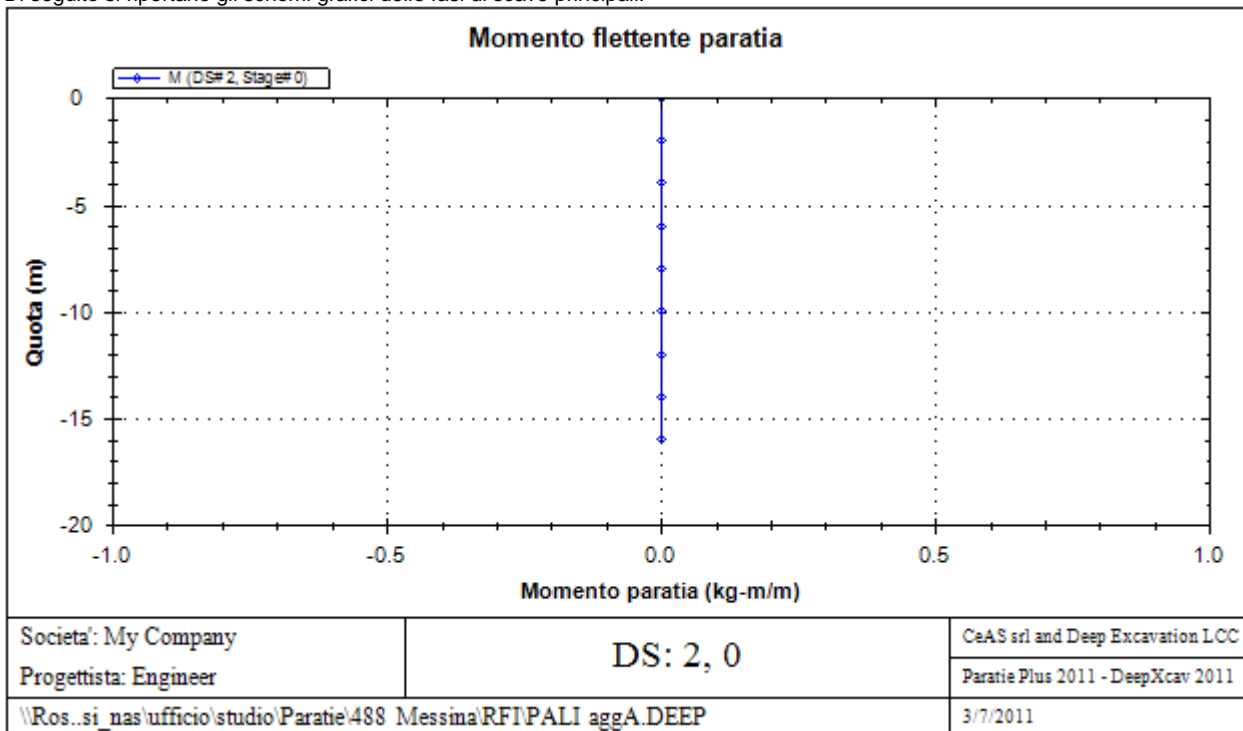
Stabilita' del piede

FS infissione per fase

	FS minimo al piede	FS Passivo	FS Rotazione	FS Lunghezza	FS Pass. mobilizzato	FS Forza attiva / attiva teorica
Stage #0	12.615	13.562	12.615	160	N/A	N/A
Stage #1	10.366	12.129	10.366	160	N/A	N/A
Stage #2	4	8.222	5.698	4	N/A	N/A
Stage #3	10.352	N/A	10.352	10.352	N/A	N/A
Stage #4	5.263	N/A	6.684	5.263	N/A	N/A
Stage #5	7.143	189.088	7.285	7.143	N/A	N/A
Stage #6	3.444	26.887	4.809	3.444	N/A	N/A
Stage #7	3.444	26.825	4.802	3.444	N/A	N/A

GRAFICI FASI DI SCAVO

Di seguito si riportano gli schemi grafici delle fasi di scavo principali.

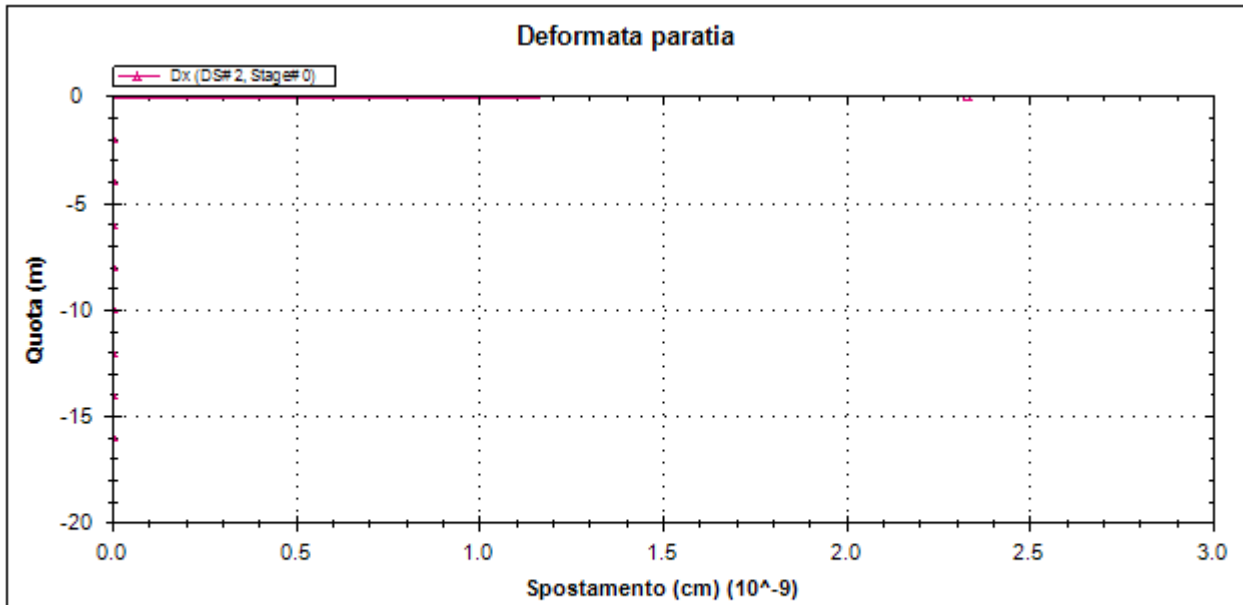


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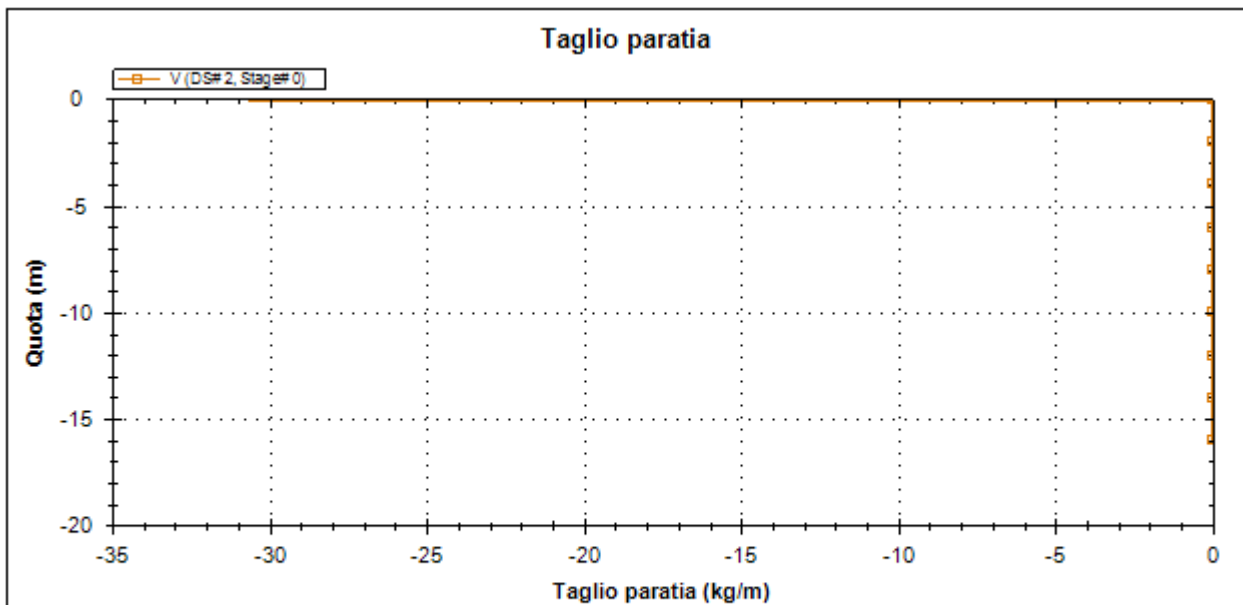
Codice documento
SS0558_F0.doc

Rev
F0

Data
20/06/2011



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Progettista: Engineer		Paratie Plus 2011 - DeepXcav 2011
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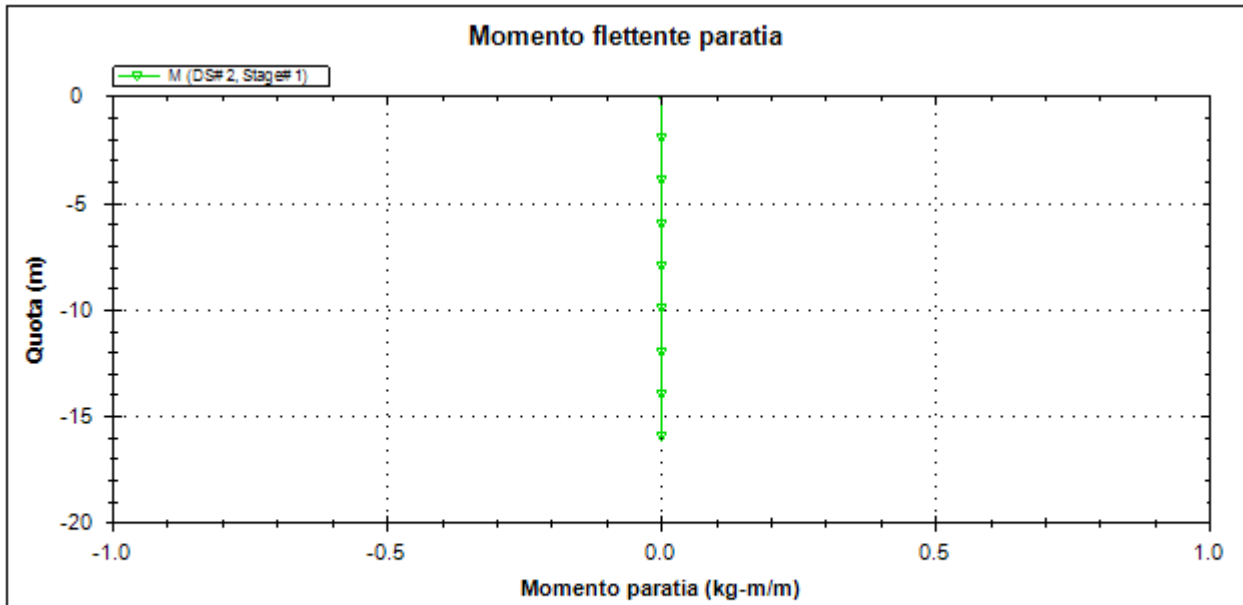
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Progettista: Engineer		Paratie Plus 2011 - DeepXcav 2011
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RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

Codice documento
SS0558_F0.doc

Rev
F0

Data
20/06/2011



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Progettista: Engineer

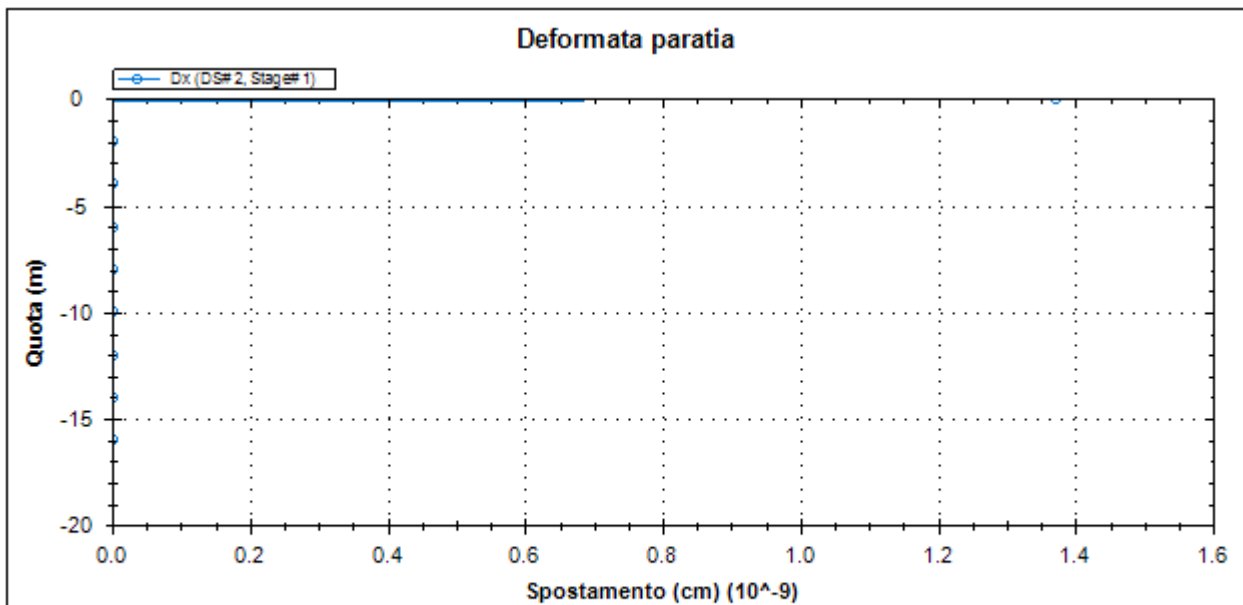
DS: 2, Condizione geostatica

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3/7/2011



Societa': My Company
Progettista: Engineer

DS: 2, Condizione geostatica

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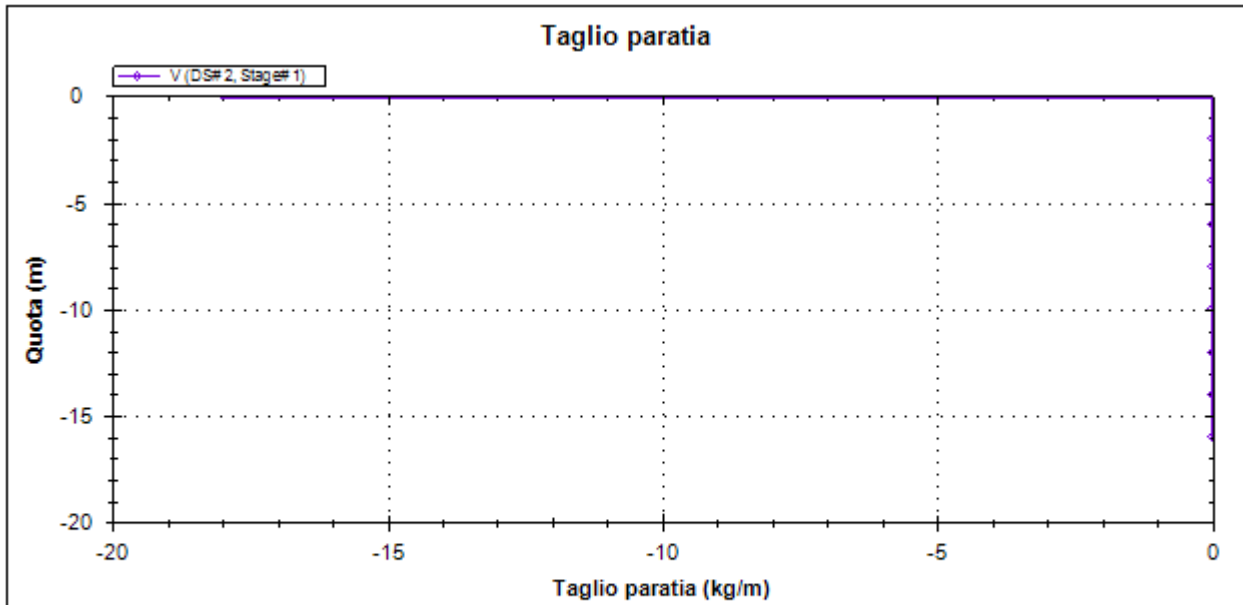
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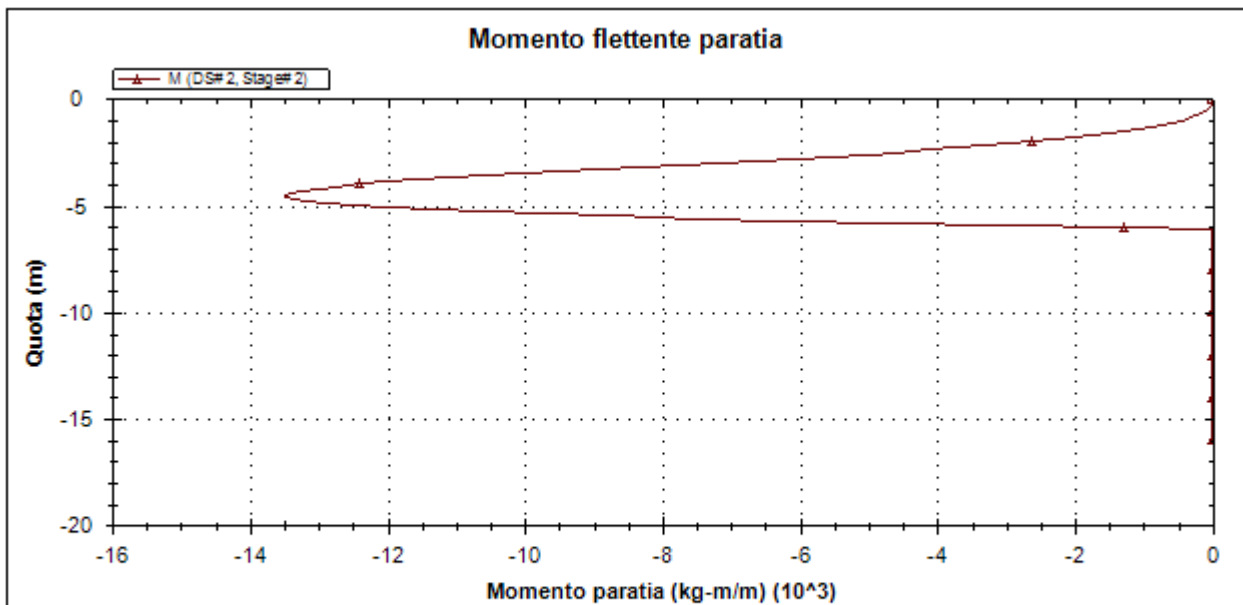
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SS0558_F0.doc

Rev
F0

Data
20/06/2011



Società: My Company Progettista: Engineer	DS: 2, Condizione geostatica	CeAS srl and Deep Excavation LCC Paratie Plus 2011 - DeepXcav 2011
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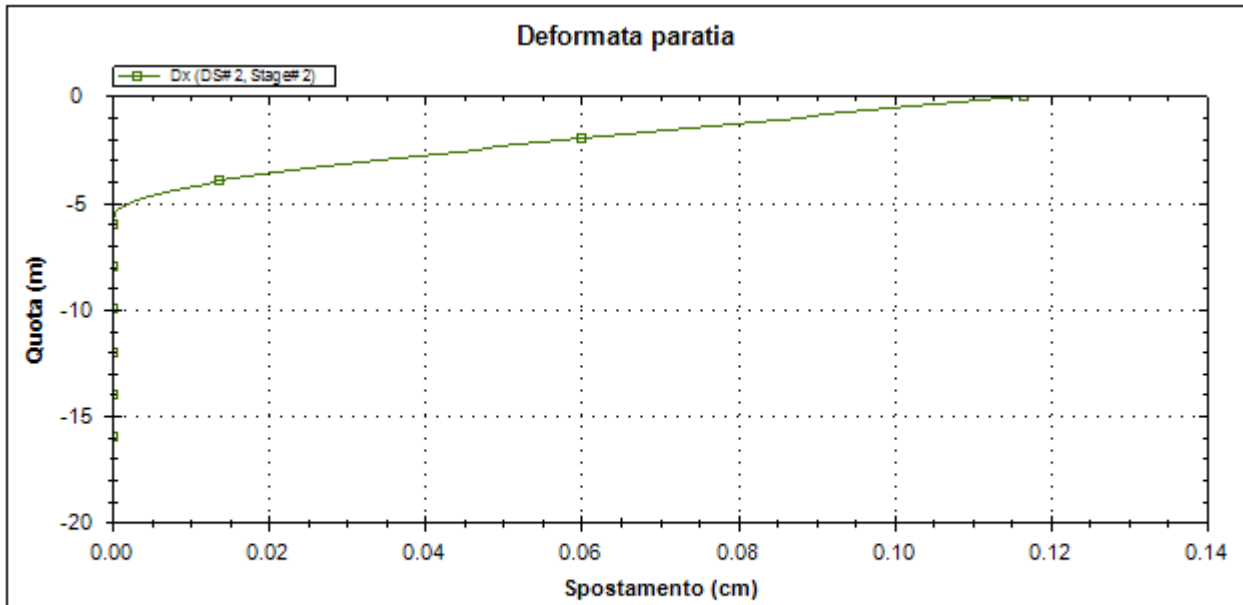
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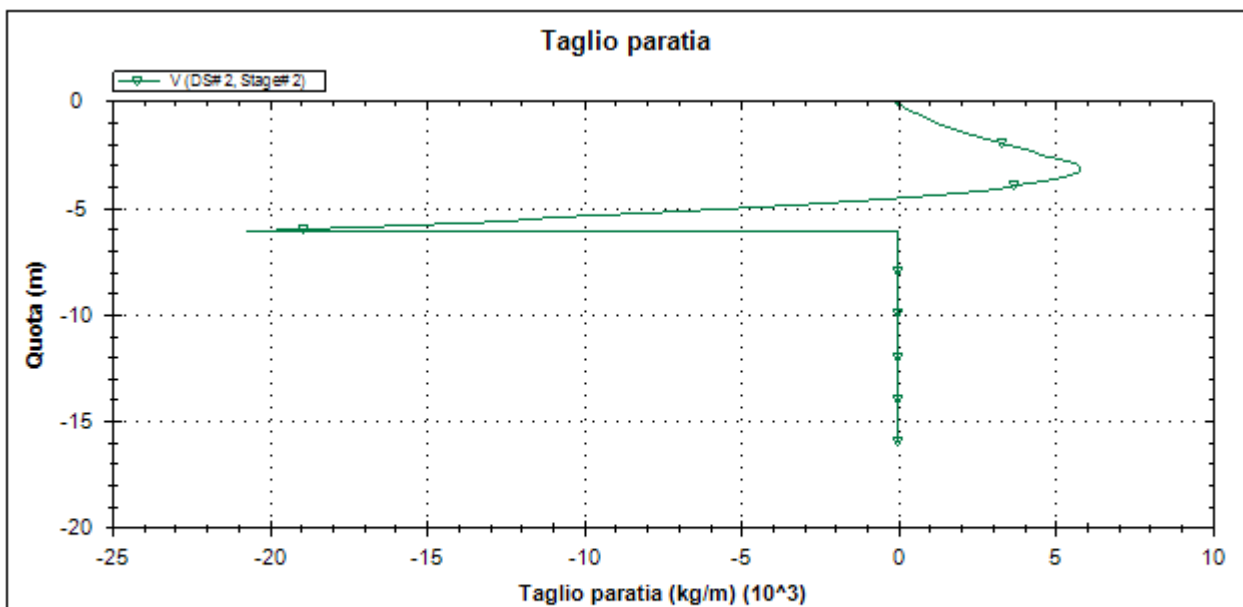
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SS0558_F0.doc

Rev
F0

Data
20/06/2011



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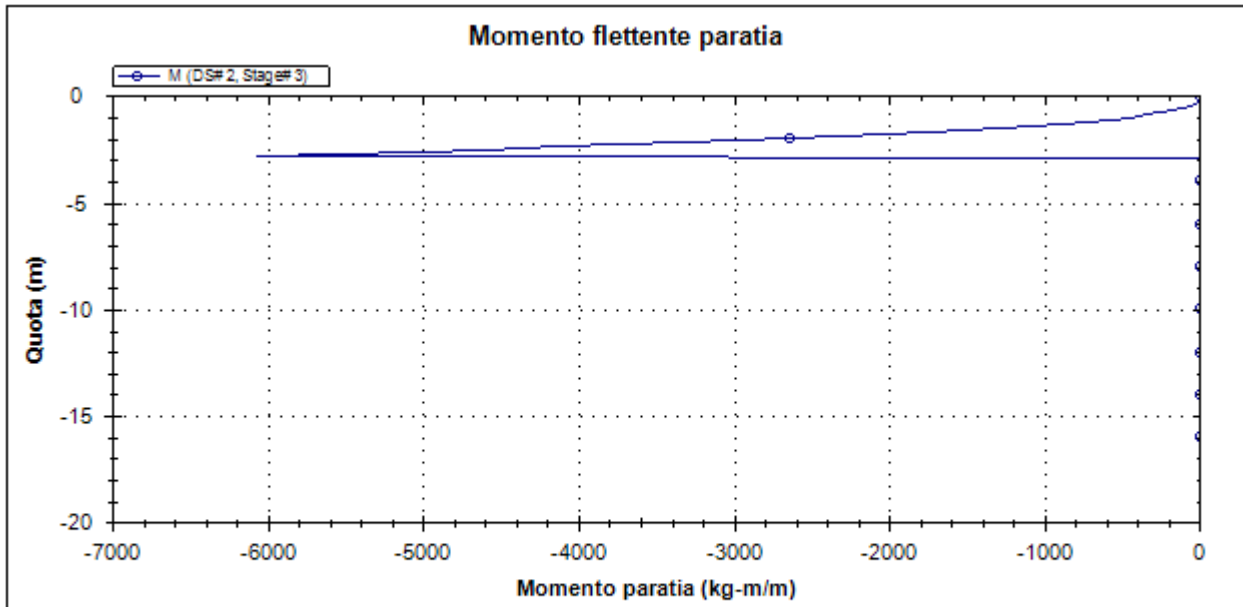
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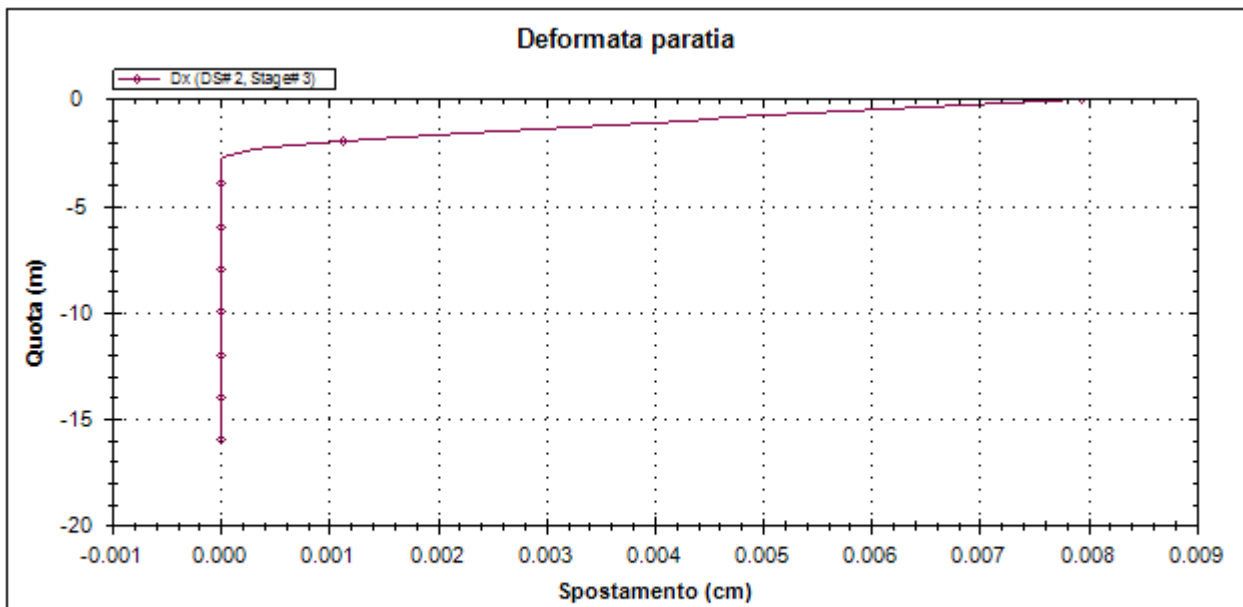
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SS0558_F0.doc

Rev
F0

Data
20/06/2011



Società: My Company Progettista: Engineer	DS: 2, 1 Tirante	CeAS srl and Deep Excavation LCC Paratie Plus 2011 - DeepXcav 2011
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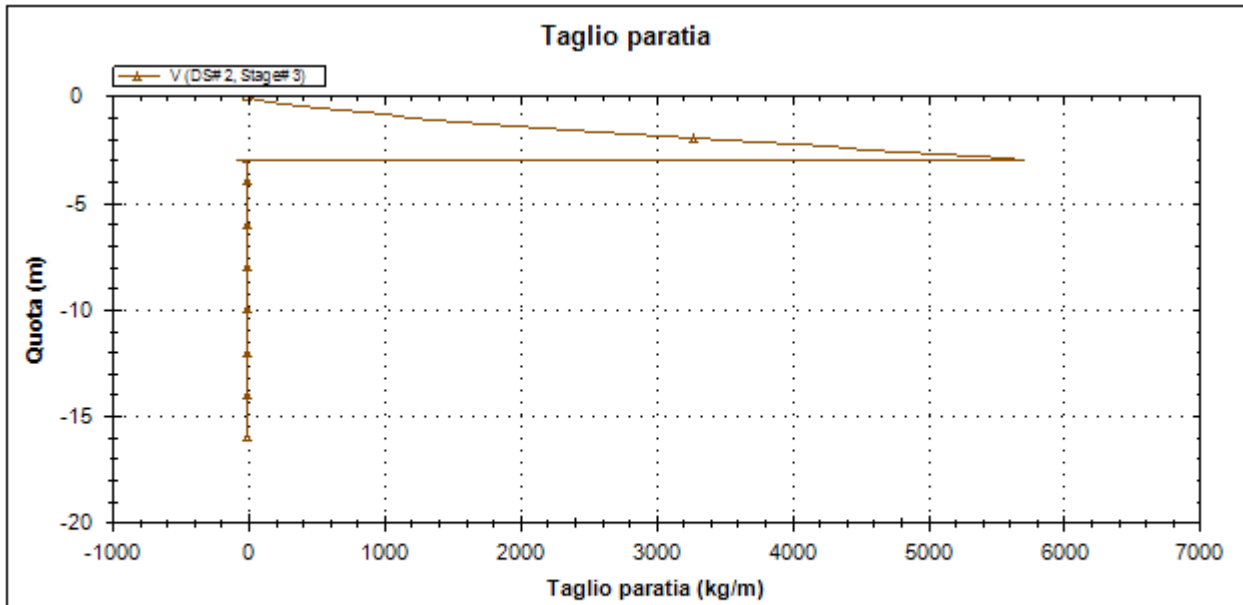
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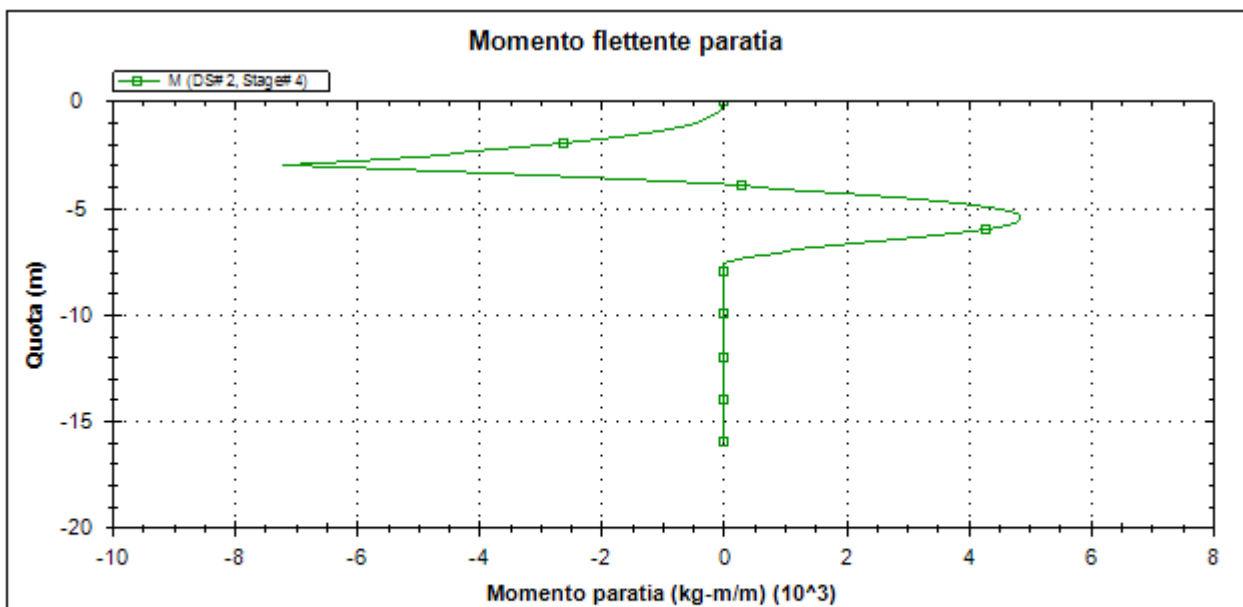
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Rev
F0

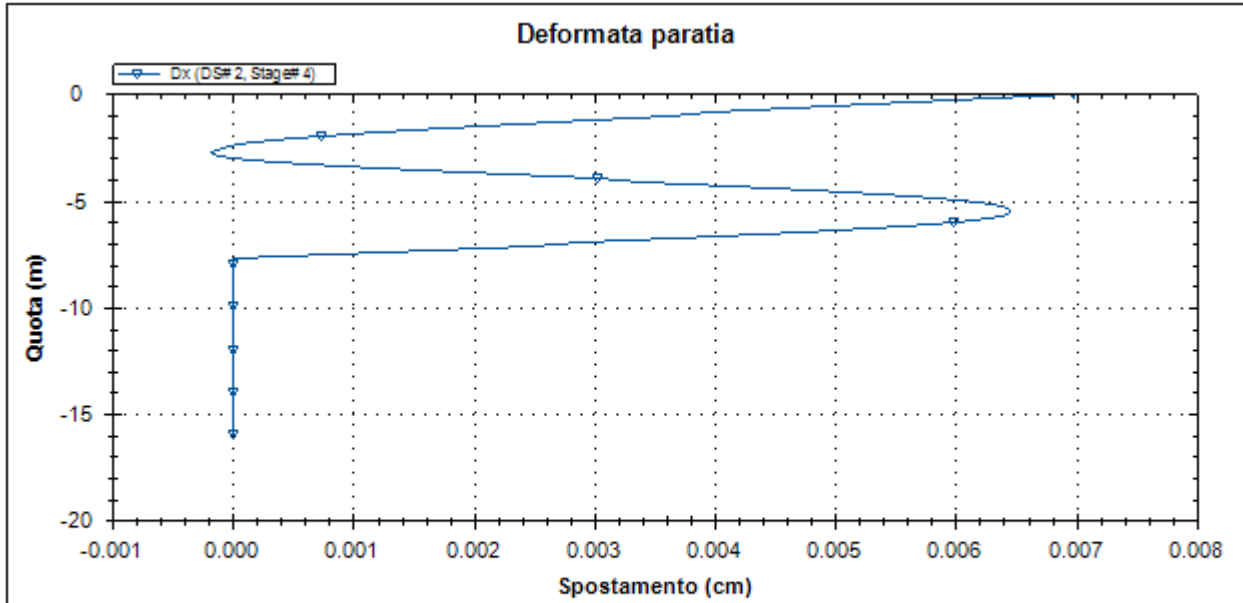
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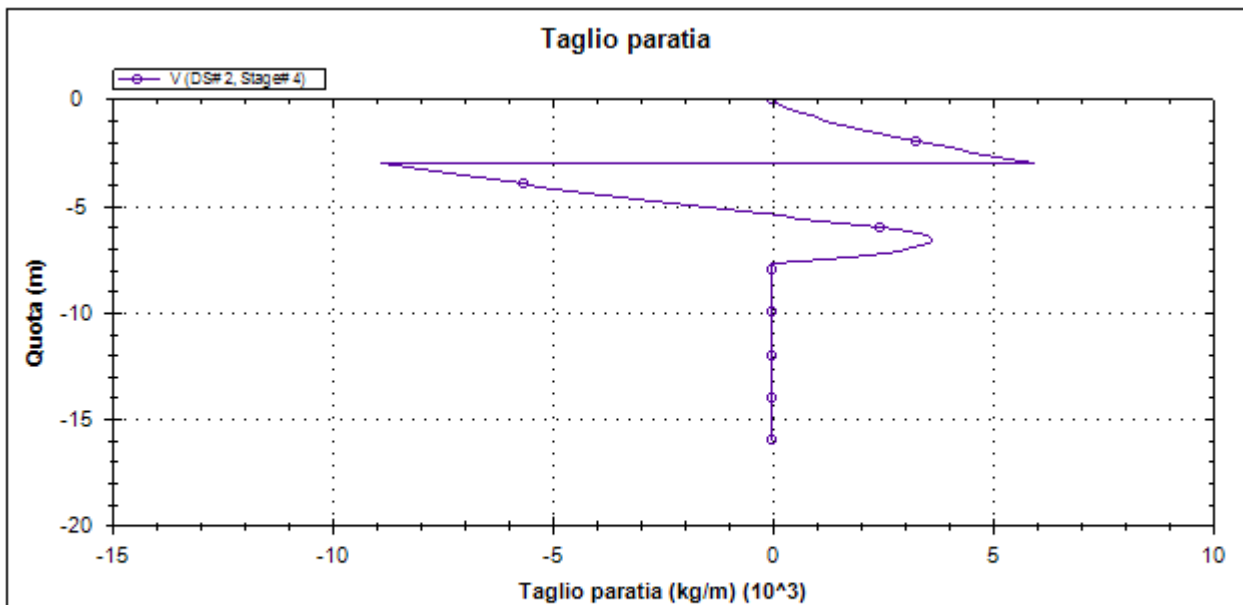
Società: My Company	DS: 2, 1 Tirante	CeAS srl and Deep Excavation LCC
Progettista: Engineer		Paratie Plus 2011 - DeepXcav 2011
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Società: My Company	DS: 2, New stage 4	CeAS srl and Deep Excavation LCC
Progettista: Engineer		Paratie Plus 2011 - DeepXcav 2011
\\Ros...si_nas\ufficio\studio\Paratie\488 Messina\RFI\PALI aggA.DEEP		3/7/2011



Societa': My Company	DS: 2, New stage 4	CeAS srl and Deep Excavation LCC
Progettista: Engineer		Paratie Plus 2011 - DeepXcav 2011
\\Ros...si_nas\ufficio\studio\Paratie\488 Messina\RFI\PALI aggA.DEEP		3/7/2011



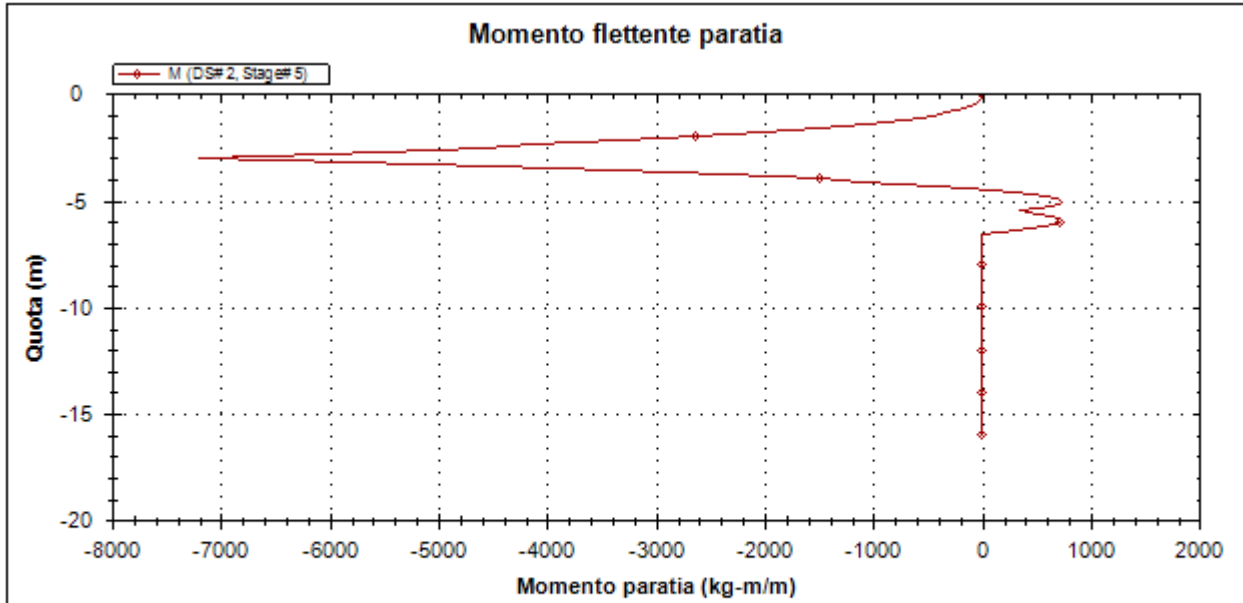
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Progettista: Engineer		Paratie Plus 2011 - DeepXcav 2011
\\Ros...si_nas\ufficio\studio\Paratie\488 Messina\RFI\PALI aggA.DEEP		3/7/2011

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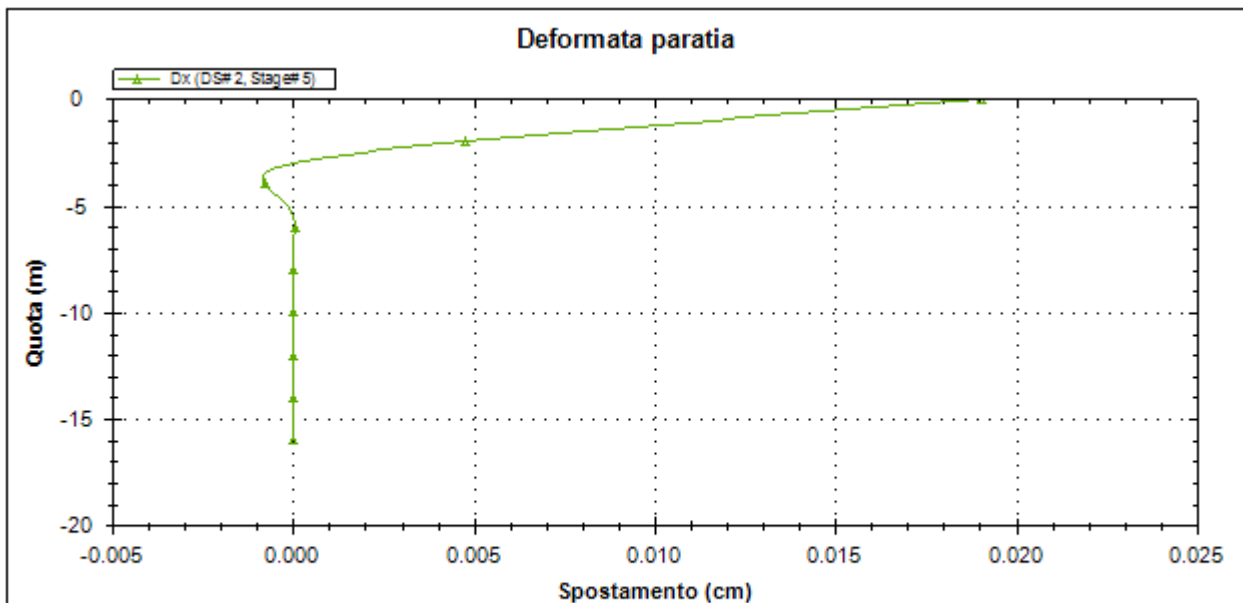
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SS0558_F0.doc

Rev
F0

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20/06/2011



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Progettista: Engineer		Paratie Plus 2011 - DeepXcav 2011
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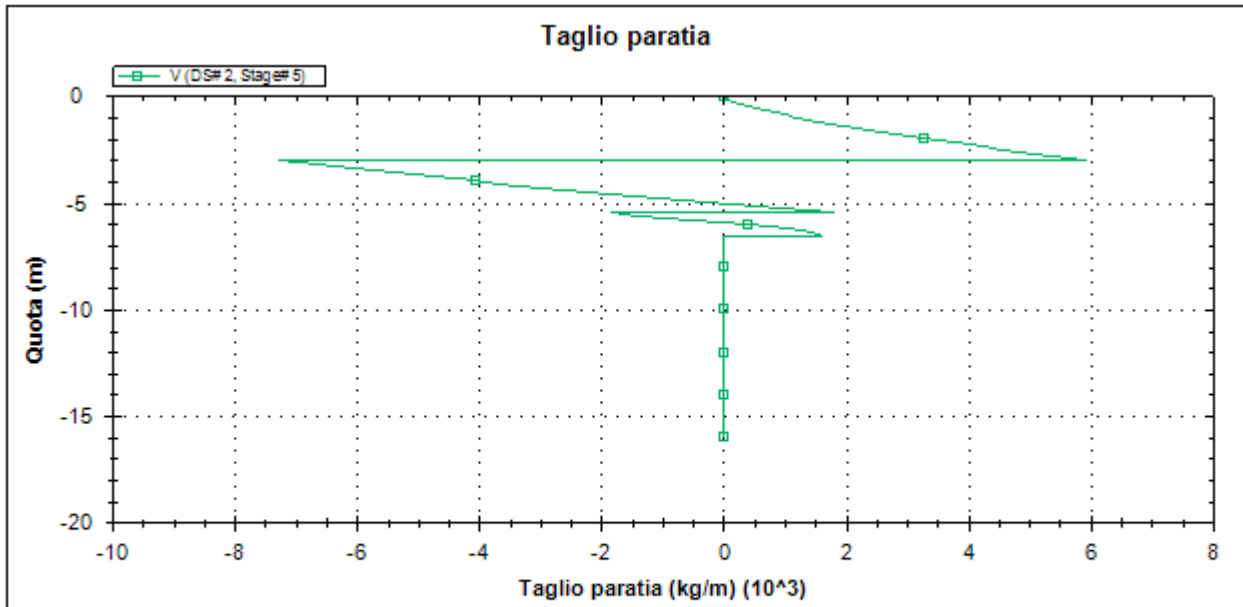
Società: My Company	DS: 2, 2 Tirante	CeAS srl and Deep Excavation LCC
Progettista: Engineer		Paratie Plus 2011 - DeepXcav 2011
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RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

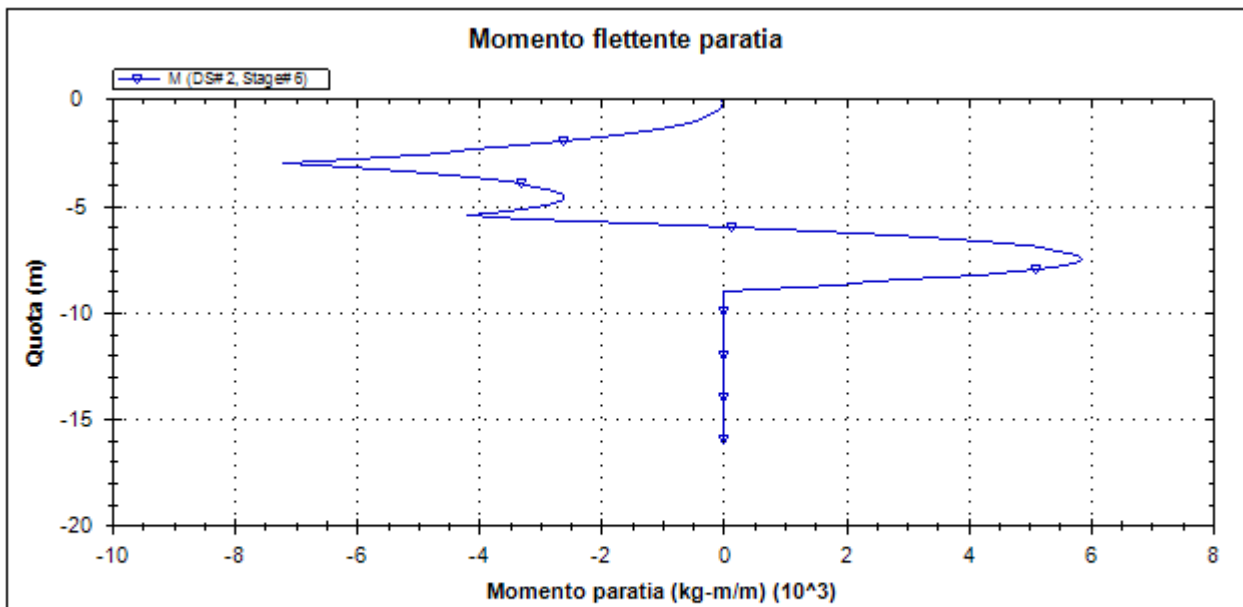
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Rev
F0

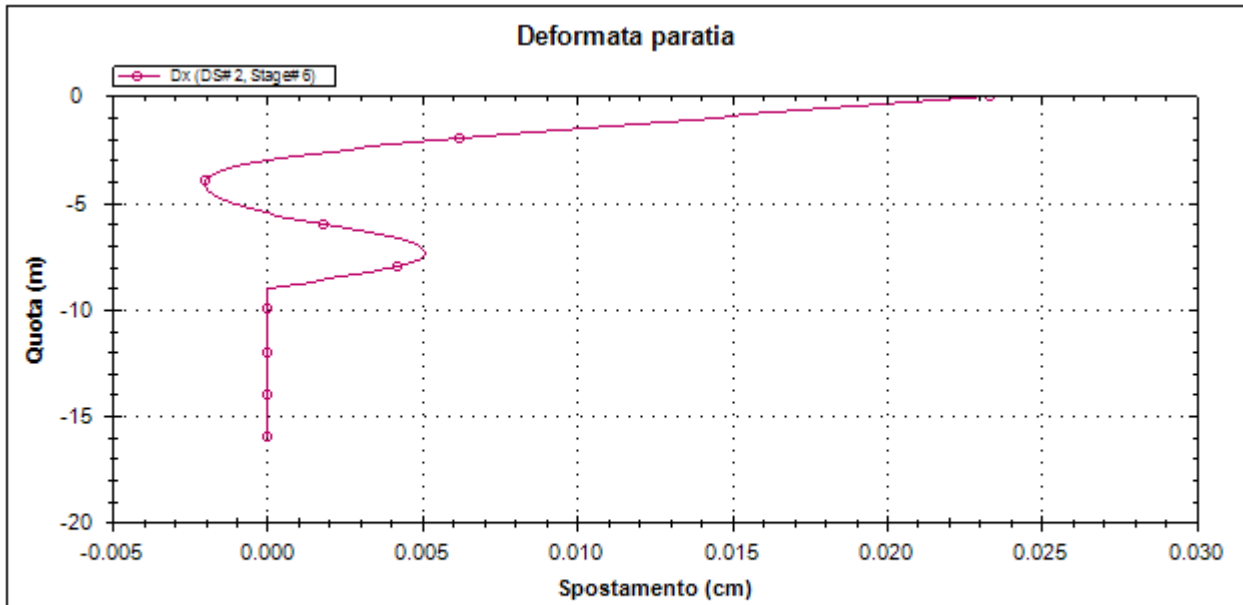
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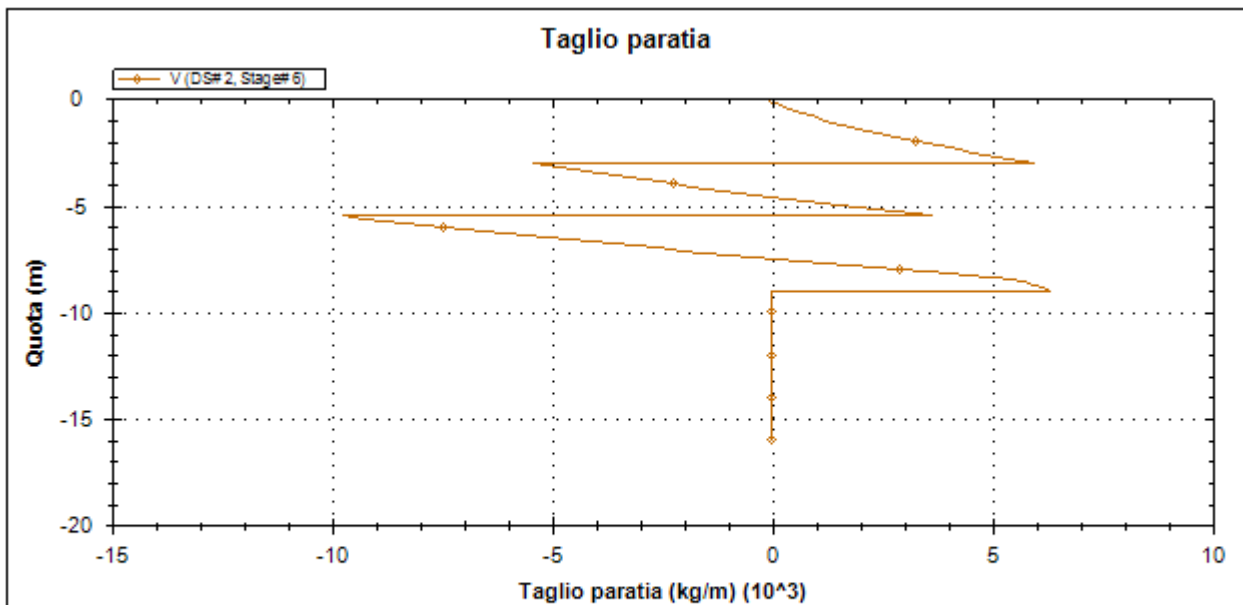
Società: My Company	DS: 2, 2 Tirante	CeAS srl and Deep Excavation LCC
Progettista: Engineer		Paratie Plus 2011 - DeepXcav 2011
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Società: My Company	DS: 2, Fondo scavo	CeAS srl and Deep Excavation LCC
Progettista: Engineer		Paratie Plus 2011 - DeepXcav 2011
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Società: My Company Progettista: Engineer	DS: 2, Fondo scavo	CeAS srl and Deep Excavation LCC Paratie Plus 2011 - DeepXcav 2011
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Società: My Company Progettista: Engineer	DS: 2, Fondo scavo	CeAS srl and Deep Excavation LCC Paratie Plus 2011 - DeepXcav 2011
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		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
		RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD	<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0

Risultati per la Design Section 3: 0: DM08_ITA: EQK - Seismic

APPROCCI DI PROGETTO E FATTORI DI COMBINAZIONE

Scenari di progetto utilizzati (da Normativa o personalizzati) e relativi fattori di combinazione

Stage	Design Code	Design Case	F(tan)	F	F	F	F(perm)	F(temp)	F(perm)	F(temp)	F Earth	F Earth	F GWT	F GWT	F HYD	F HYD	F UPL	F UPL
	Name		fr	(c')	(Su)	(EQ)	load	load	sup	sup	(Dstab)	(stab)	(Dstab)	(stab)	(Dstab)	(stab)	(Dstab)	(stab)
0	DM08_ITA	EQK - Seismic	1.25	1.25	1.4	1	1	1	1.2	1.1	1	1	1	1	1.35	0.9	1	1
1	DM08_ITA	EQK - Seismic	1.25	1.25	1.4	1	1	1	1.2	1.1	1	1	1	1	1.35	0.9	1	1
2	DM08_ITA	EQK - Seismic	1.25	1.25	1.4	1	1	1	1.2	1.1	1	1	1	1	1.35	0.9	1	1
3	DM08_ITA	EQK - Seismic	1.25	1.25	1.4	1	1	1	1.2	1.1	1	1	1	1	1.35	0.9	1	1
4	DM08_ITA	EQK - Seismic	1.25	1.25	1.4	1	1	1	1.2	1.1	1	1	1	1	1.35	0.9	1	1
5	DM08_ITA	EQK - Seismic	1.25	1.25	1.4	1	1	1	1.2	1.1	1	1	1	1	1.35	0.9	1	1
6	DM08_ITA	EQK - Seismic	1.25	1.25	1.4	1	1	1	1.2	1.1	1	1	1	1	1.35	0.9	1	1
7	DM08_ITA	EQK - Seismic	1.25	1.25	1.4	1	1	1	1.2	1.1	1	1	1	1	1.35	0.9	1	1

Stage=Fase di scavo

Design Code=Codice di verifica

Ftan fr=fattore moltiplicatore tangente angolo di attrito

F C'=fattore moltiplicatore coesione efficace

F Su'=fattore moltiplicatore coesione non drenata

F EQ=fattore moltiplicatore azione sismica

F perm load=fattore moltiplicatore carichi permanenti

F temp load=fattore moltiplicatore carichi accidentali/variabili

F perm sup=fattore di riduzione resistenza per verifica pull out tirante

F temp sup=fattore di riduzione resistenza per verifica pull out tirante

F earth Dstab=fattore moltiplicatore per spinta attiva nel caso sfavorevole

F earth stab=fattore moltiplicatore per spinta attiva nel caso favorevole

F GWT Dstab (ground water)=fattore moltiplicatore per spinta idrostatica sfavorevole

F GWT stab (ground water)=fattore moltiplicatore per spinta idrostatica favorevole

F HYD Dstab=fattore moltiplicatore per spinta idrodinamica sfavorevole

F HYD stab=fattore moltiplicatore per spinta idrodinamica favorevole

F UPL Dstab=fattore moltiplicatore per sifonamento sfavorevole

F UPL stab=fattore moltiplicatore per sifonamento favorevole

DATI TERRENO

Name	g tot	g dry	Frict	C'	Su	FRp	FRcv	Eload	Eur	kAp	kPp	kAcv	kPcv	Vary	Spring	Color
	(daN/m3)	(daN/m3)	(deg)	(daN/m2)	(daN/m2)	(deg)	(deg)	(daN/m2)	(daN/m2)	Springs	Springs	Springs	Springs		Model	
Strato1	1900	1900	35	0	N/A	N/A	N/A	200000	600000	0.27	3.69	N/A	N/A	True	Linear	
Strato2	1900	1631.55	38	0	N/A	N/A	N/A	4000000	12000000	0.24	4.2	N/A	N/A	True	Linear	

gtot=peso specifico /totale terreno

gdry=peso secco del terreno

Frict=angolo di attrito di calcolo

C'=coesione efficace

Su = Coesione non drenata, parametro attivo per terreni tipo CLAY in condizioni NON drenate

Dilat=Dilatanza terreno (parametro valido solo in analisi non lineare)

Evc=modulo a compressione vergine molla equivalente terreno

Eur=modulo di scarico/ricarico (fase elastica) molla equivalente terreno

Kap= coefficiente di spinta attiva di picco

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011

Kpp= coefficiente di spinta passiva di picco
Kacv= coefficiente di spinta attiva di picco
Kpcv= coefficiente di spinta passiva di picco
Spring models= modalità di definizione dei moduli di rigidezza molle terreno (LIN, EXP, SIMC)
LIN= Lineare-Elastico-Perfettamente plastico
EXP: esponenziale, SUB: Modulo di reazione del sottosuolo
SIMC= Modo semplificato per argille

STRATIGRAFIA TERRENI

Top Elev= quota superiore strato
Soil type=nome del terreno
OCR=rapporto di sovraconsolidazione
K0=coefficiente di spinta a riposo
Nome: Boring 1, pos: (-8, 0)

Top elev.	Soil type	OCR	Ko
0	Strato1	1	0.43
-13	Strato2	1	0.38

DATI GENERALI RELATIVI A MATERIALI E PROPRIETA MECCANICHE ELEMENTI STRUTTURALI

Acciaio

Name	Strength Fy	Fu	Elastic E	Density g
	(daN/cm ²)	(daN/cm ²)	(daN/cm ²)	(daN/m ³)
S355	3620	5200.6	2100615.4	7851.8148

Calcestruzzo

Name	Strength Fc'	Elastic E	Density g	Tension Strength Ft
	(daN/cm ²)	(daN/cm ²)	(daN/m ³)	(daN/cm ²)
C25/30	254.9	320965.9	2549.291	10

Barre in acciaio

Name	Strength Fy	Elastic E
	(daN/cm ²)	(daN/cm ²)
S1862 (Strands)	18987.1	2141404
B450C	4588.7	2141404

Legno

Name	Ultimate Bending Strength Fbu	Ultimate Tensile Strength Ftu	Ultimate Shear Strength Fvu	Density g	Elastic E
	(daN/cm ²)	(daN/cm ²)	(daN/cm ²)	(daN/m ³)	(daN/cm ²)
Regular grade	70.4	70.4	41.8	801.2522	56288.3

STEEL=acciaio

Name=nome materiale
strength fy=fyk=res caratteristica acciaio
Fu=fuk=resistenza ultima
Elastic E=modulo elastico
Density g=peso specifico
CONCRETE=calcestruzzo

Name=nome materiale
fc=fck=resistenza cilindrica a compressione caratteristica cls
Elastic E=modulo elastico
Density g=peso specifico
Tension strength=ft=fctk=resistenza a trazione caratteristica

STEEL REBAR

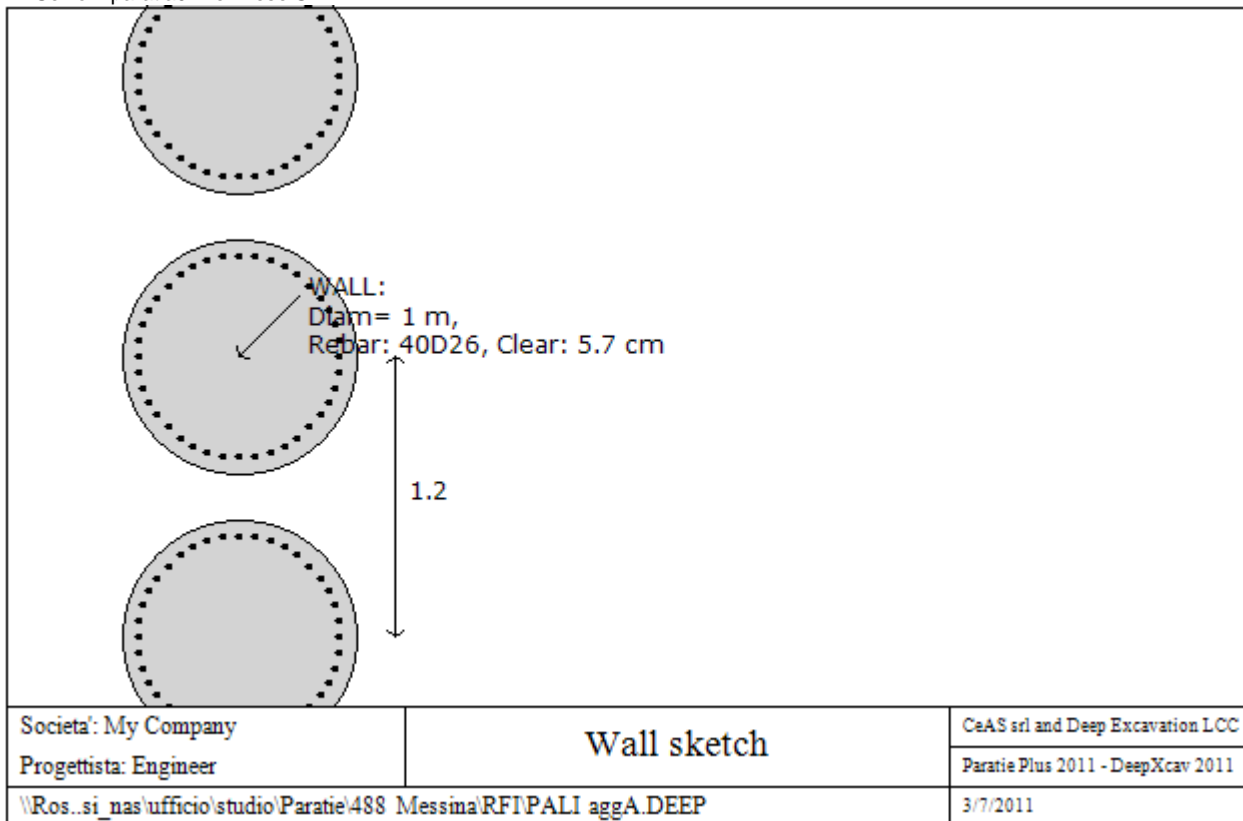
Name=nome materiale
strength fy=fyk=resistenza caratteristica acciaio
Elastic E=modulo elastico
WOOD=legno

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO	
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD	<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011

Name=nome materiale
Ultimate bending strength $F_b=f_{bk}$ =resistenza caratteristica a flessione
Ultimate tensile strength $F_t=f_{tuk}$ =res. caratt. parallela alle fibre
Ultimate shear strength $F_v=f_{vuk}$ =res. caratt. a taglio
Density g =peso specifico
Elastic E =modulo elastico

PROPRIETA' SEZIONI TRAVI DI RIPARTIZIONE

Sezioni paratia0: Berlinese Sx



Sezioni paratia0: PALI 1000
Tipo paratia: Pali tangenti: pali in calcestruzzo armato
Quota sommita' paratia: 0 m Quota piede paratia: -16 m
Dimensione fuori piano paratia: 1.2 Spessore paratia = 1
Ampiezza zona spinta passiva al di sotto del piano di scavo: 1 Ampiezza zona spinta attiva al di sotto del piano di scavo: 1
 $f_c'_{cls} = 254.9$ $F_y \text{ barre} = 4588.7$ $E_{cls} = 320965.9$ F_{cT} calcestruzzo a trazione = 10% di F_c'
 f_y profilati in acciaio = 3620 $E_{acciaio} = 2100615.4$
Attrito paratia: % attrito terreno = 50%
Le capacita' paratie in acciaio sono calcolate con NTC 2008
Le capacita' paratie in calcestruzzo sono calcolate con ACI 318-2002.
Nota: con la capacita' ultima si dovrebbe adottare un fattore di sicurezza strutturale.
Proprieta' paratie di pali tangenti
Tipo di sezione di calcestruzzo: Rettangolare
Dimensioni della sezione
 $D = 100$ m $B = 100$ m $A = 7853.98163397448$ cm² $I_{xx} = 4908738.52123405$ cm⁴
Armatura longitudinale
Barre cima: $N = 40$ barre #D26 = $A_{sTop} 212.36$ cm², $C_{top} = 7$ m
Barre fondo: $N = 40$ barre #D25 = $A_{sBot} NaN$ cm², $C_{bot} = 7$ m
Armatura a taglio
Bar #D10 = $A_s 0.785$ cm², $sV = 12$ m, $sH = 25$ m

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RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011

PROPRIETA' GENERALI

Le travi di ripartizione sono utilizzate sui supporti come elementi strutturali ma non vengono inclusi nel calcolo della rigidità della paratia.

$f'c=fck$ = resistenza cilindrica del calcestruzzo

$f_yk=f_y$ = resistenza caratteristica acciaio

f_y = resistenza caratteristica barre di armatura

TABELLA DEI PARAMETRI (parametri principali)

1) Tutte le travi di ripartizione in calcestruzzo hanno sezione rettangolare

N/A= dato non disponibile

$F_y=f_yk$

$F'c=fck$

D= altezza della trave

B= larghezza della trave

2) Proprietà della trave in acciaio

W= peso per unità di lunghezza

A= area

D= diametro

tw= spessore anima

tp= spessore tubo

bf= larghezza ala

tf= spessore ala

k= spessore flangia

I_{xx}= modulo di inerzia asse forte (per unità di lunghezza)

S_{xx}= momento statico asse forte (per unità di lunghezza)

r_x= raggio giratore di inerzia - asse X

r_y= raggio giratore di inerzia - asse Y

I_{yy}= modulo di inerzia asse debole (per unità di lunghezza)

S_{yy}= momento statico asse debole (per unità di lunghezza)

r_T= raggio giratore per la torsione

C_w= costante di ingobbimento

DATI VINCOLI, TIRANTI, PUNTONI, ECC

Vincolo 0: Tipo = Tirante

X = 1 m, Z = -3 m, S = 2.4 m

L_{free} = 14.00 m, L_{fix} = 15 m

Paratia: Berlinese Sx

Stage No	Active Si'/No	Prestress (daN)	Slab live load (daN/m ²)	User add. strain +expansion
0	No	-	-	-
1	No	-	-	-
2	No	-	-	-
3	Si'	45000	-	-
4	Si'	45000	-	-
5	Si'	45000	-	-
6	Si'	45000	-	-
7	Si'	45000	-	-

Vincolo 1: Tipo = Tirante

X = 1 m, Z = -5.5 m, S = 2.4 m

L_{free} = 10.00 m, L_{fix} = 10 m

Paratia: Berlinese Sx

Stage No	Active Si'/No	Prestress (daN)	Slab live load (daN/m ²)	User add. strain +expansion
0	No	-	-	-
1	No	-	-	-
2	No	-	-	-
3	No	-	-	-
4	No	-	-	-

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
		RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD	<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0

5	Si'	45000	-	-
6	Si'	45000	-	-
7	Si'	45000	-	-

Support type= tipo di vincolo

Tieback=tirante

Strut=puntone

Raker=Sbadacchio

LEGENDA PER TIRANTI

Dati generali

Z=quota vincolo

S=interasse in direzione orizzontale

Lfree=lunghezza tratto elastico

Lfix=lunghezza tratto rigido

Rfix=% sfruttamento tratto rigido

Stage No=numero step di scavo

Active=stato tirante (YES=attivo)

Post stress= precarico tirante (carico moltiplicato per interasse)

Walls= indica il nome della paratia alla quale il vincolo è applicato

Nel caso di solette indica il punto di partenza e cioè la paratia di sinistra

PARAMETRI DI CALCOLO PER SINGOLA FASE

Sommario delle assunzioni dell'ultima fase

Name	Analysis Method	Drive Press	ka-Mult	Htr T/B (%)	Resist Press	Res Mult	Contlever Method	Support Model	Axial Incl	Used FSwall	Min Toe FDtoe	Toe FSrot	Toe FSpas
Stage 0	Conventional-Up	Ka	N/A	N/A	Kp+ d	N/A	Free Earth	Fixed	N/A	1	3.033	3.033	4.278
Stage 1	Conventional-Up	Ka	N/A	N/A	Kp+ d	N/A	Free Earth	Fixed	N/A	1	10.814	10.814	12.436
Stage 2	Conventional-Up	Ka	N/A	N/A	Kp+ d	N/A	Free Earth	Fixed	N/A	1	4.258	5.958	8.44
Stage 3	Conventional-Up	Ka	N/A	N/A	Kp+ d	N/A	Free Earth	Fixed	N/A	1	10.473	10.473	N/A
Stage 4	Conventional-Up	Ka	N/A	N/A	Kp+ d	N/A	Free Earth	Fixed	N/A	1	5.263	6.763	N/A
Stage 5	Conventional-Up	Ka	N/A	N/A	Kp+ d	N/A	Free Earth	Fixed	N/A	1	7.357	7.357	230.526
Stage 6	Conventional-Up	Ka	N/A	N/A	Kp+ d	N/A	Free Earth	Fixed	N/A	1	3.444	4.856	27.929
Stage 7	Conventional-Up	Ka	N/A	N/A	Kp+ d	N/A	Free Earth	Fixed	N/A	1	3.298	4.811	24.668

Name=nome fase

Analysis method=metodo di calcolo

Conventional=analisi all'equilibriolimito

springs UP=analisi non lineare (schema a molle elasto plastiche)

DR=analisi per terreni tipo argilla in condizione drenata

U=analisi per terreni tipo argilla in condizione NON drenata

Up=analisi non drenata solo per i terreni selezionati

Drive press=Ka=spinta terreno attiva

ka mult=eventuale moltiplicatore Ka

Htr T/B (%)=schema pressione attiva di tipo trapezoidale

Resit press=Kp=spinta terreno passiva

Res Mult=eventuale moltiplicatore Kp

CONtle Method=

Support Model=tipologia vincoli fissi (fixed=fissi)

Axial Incl=se azione assiale inclusa

Used FS wall=coeff di riduzione dominio MN

Min FD TOe=sicurezza minima per infissione (analisi classica)

Toe FS rot=sicurezza a rotazione (analisi classica)

Toe FSpas=sicurezza sulle pressioni agenti/resistenti (analisi classica)

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD	<i>Codice documento</i> SS0558_F0.doc		<i>Rev</i> F0	<i>Data</i> 20/06/2011

GRAFICI FASI DI SCAVO

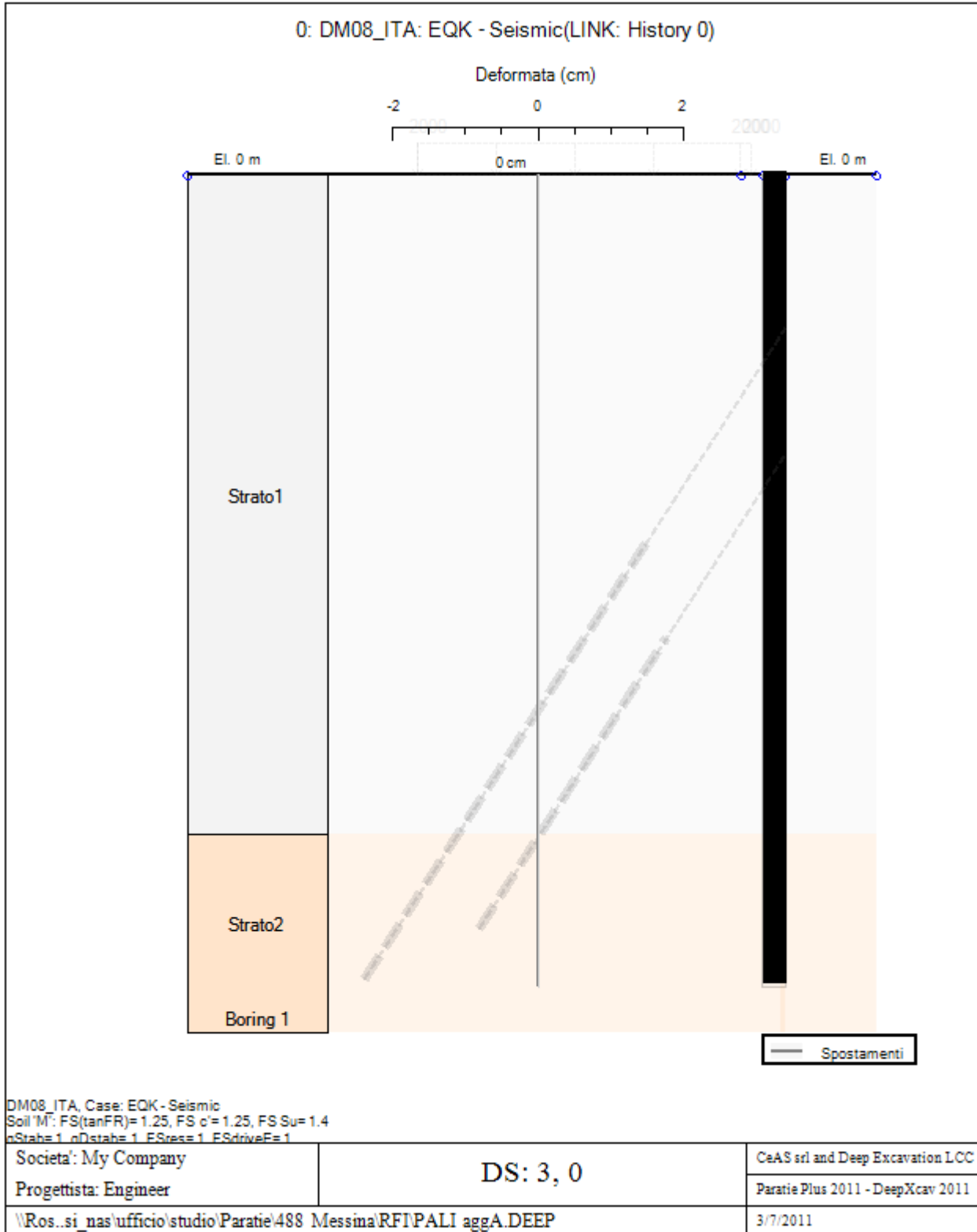
Di seguito si riportano gli schemi grafici delle fasi di scavo principali.

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Codice documento
SS0558_F0.doc

Rev
F0

Data
20/06/2011

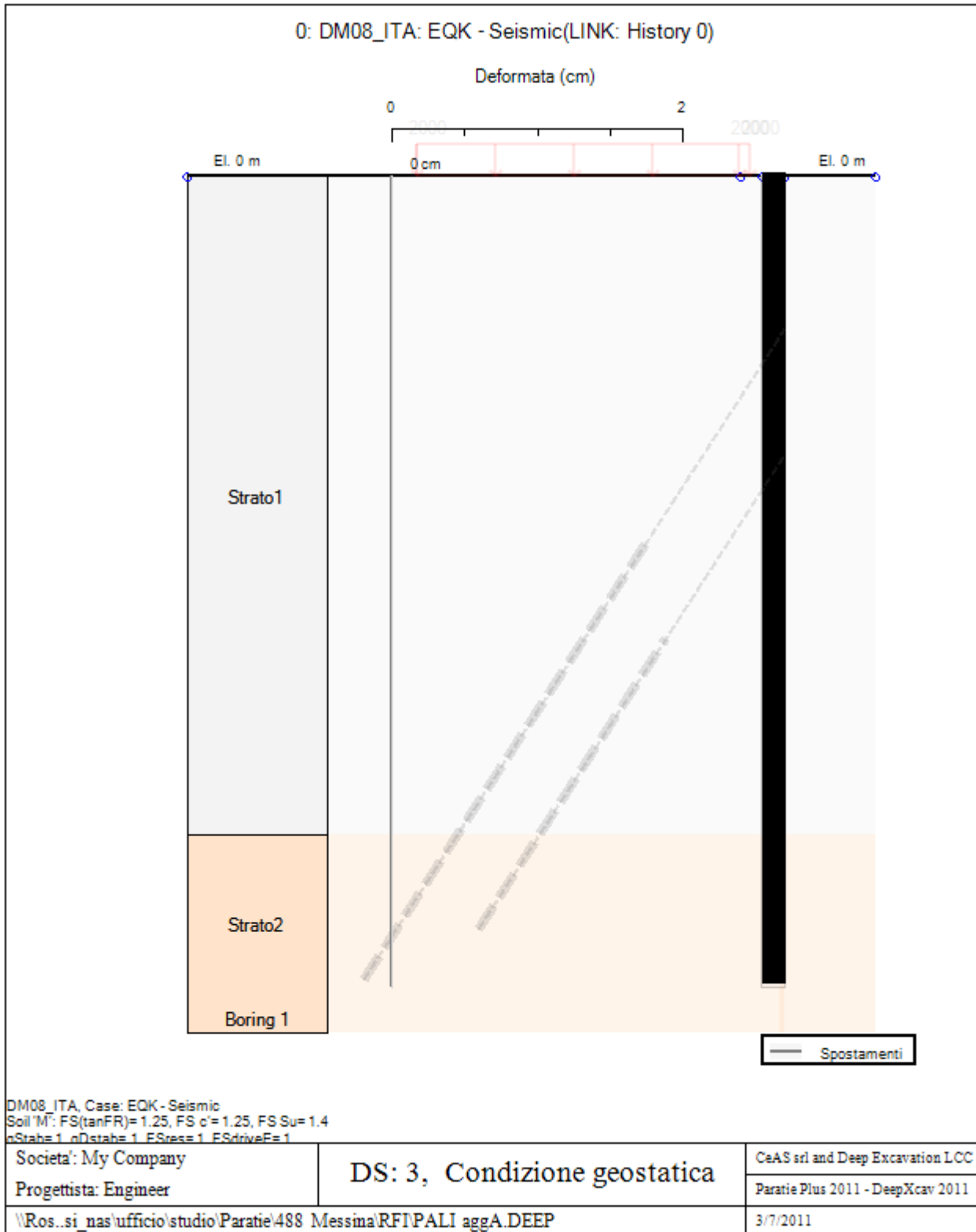


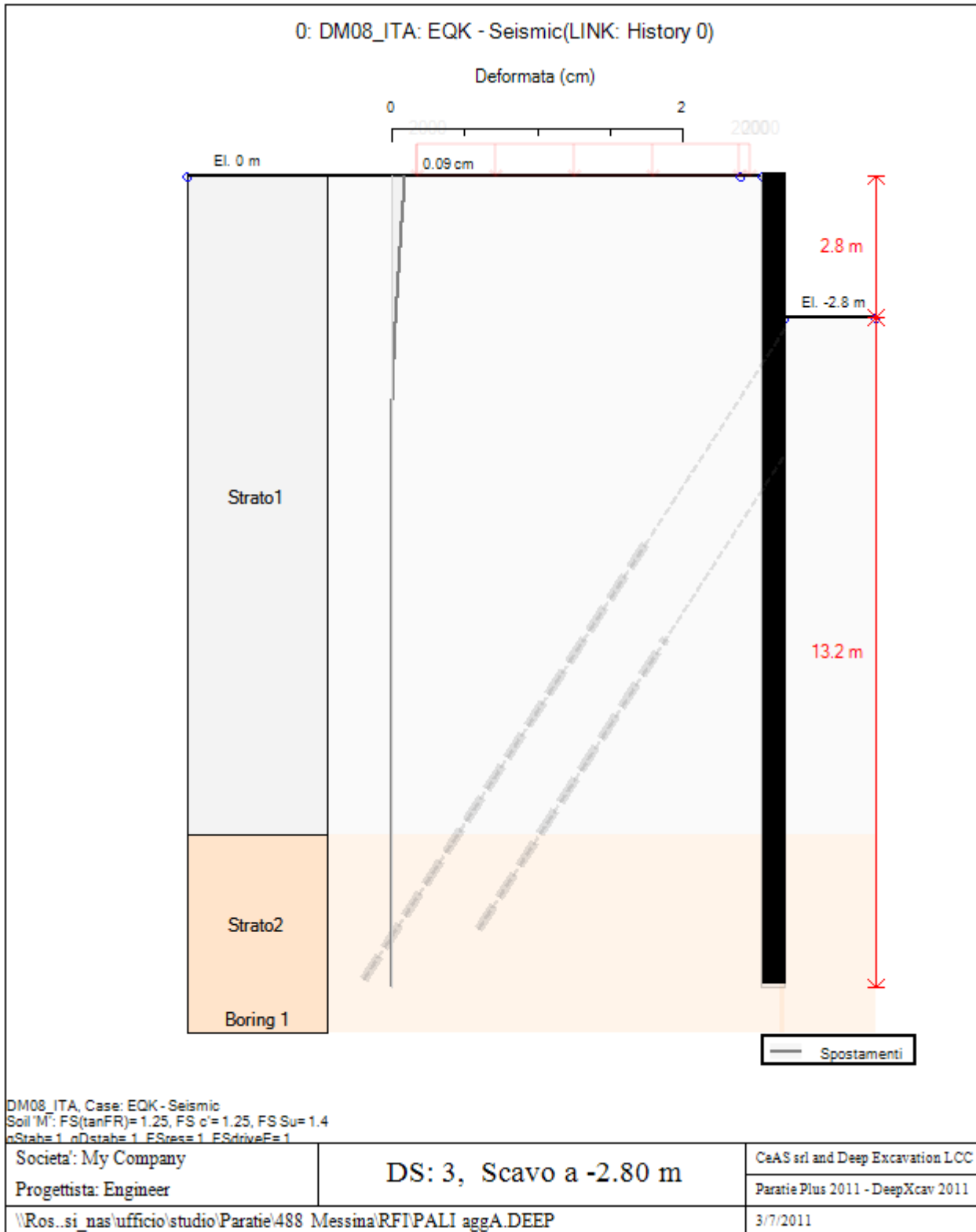
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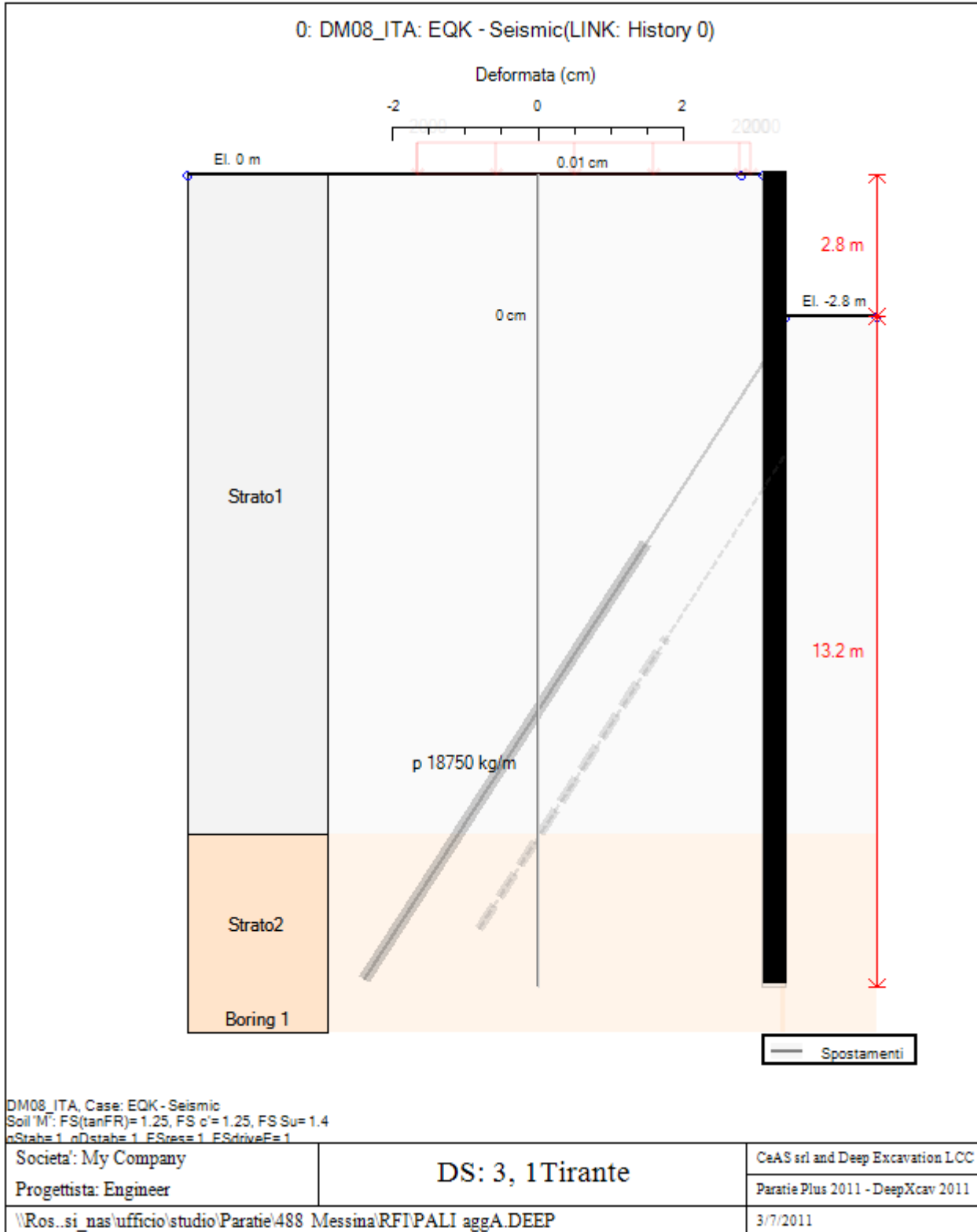
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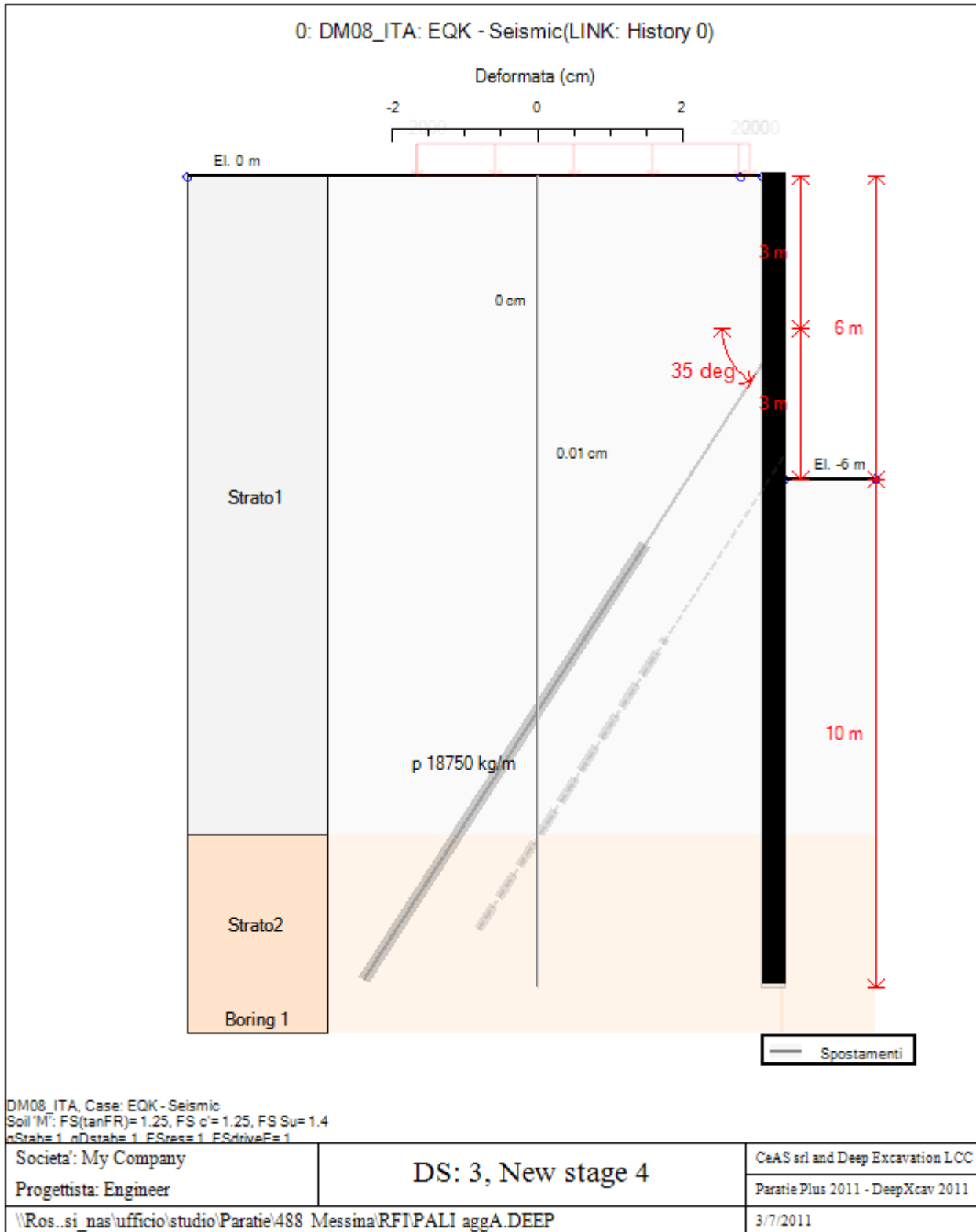
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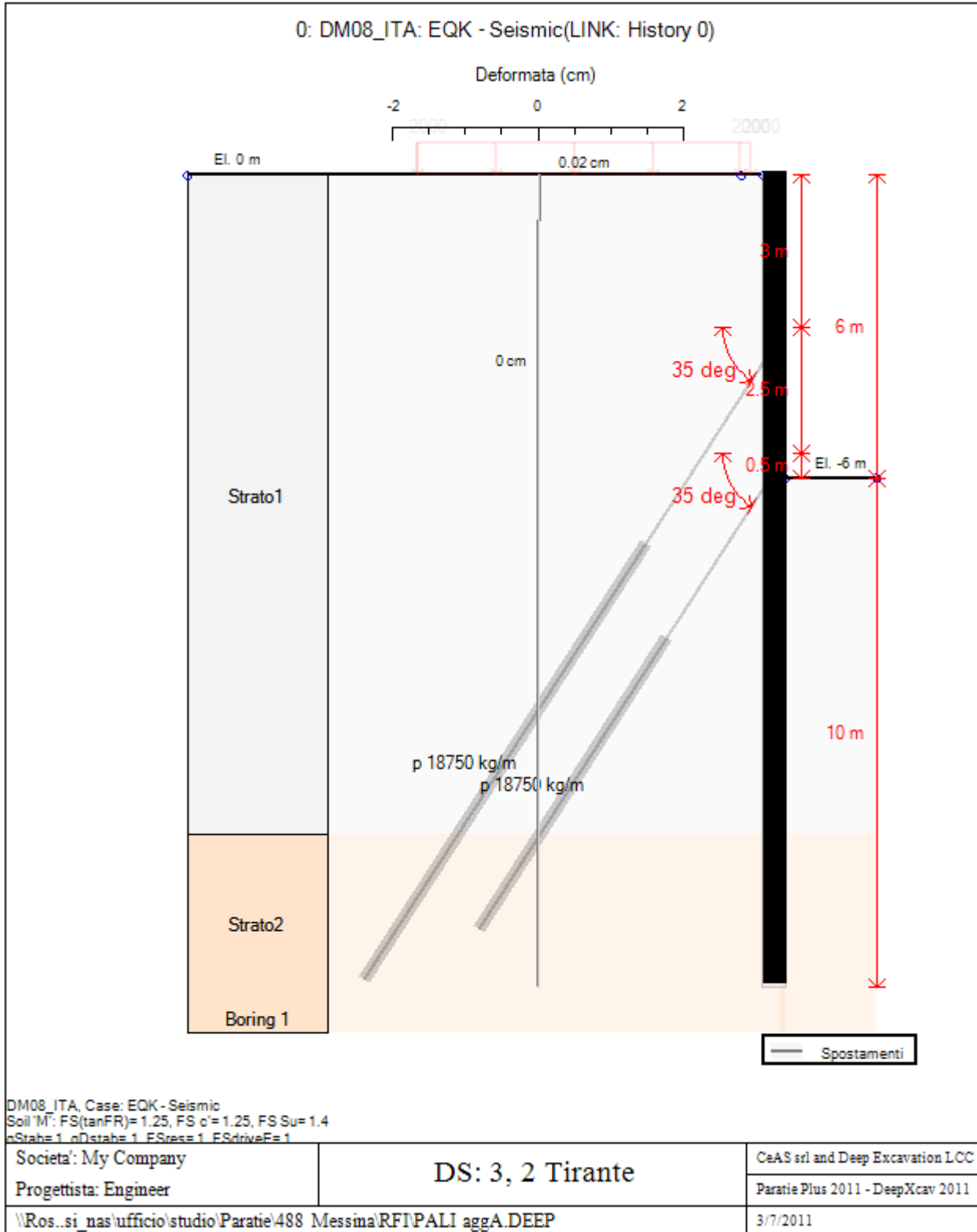
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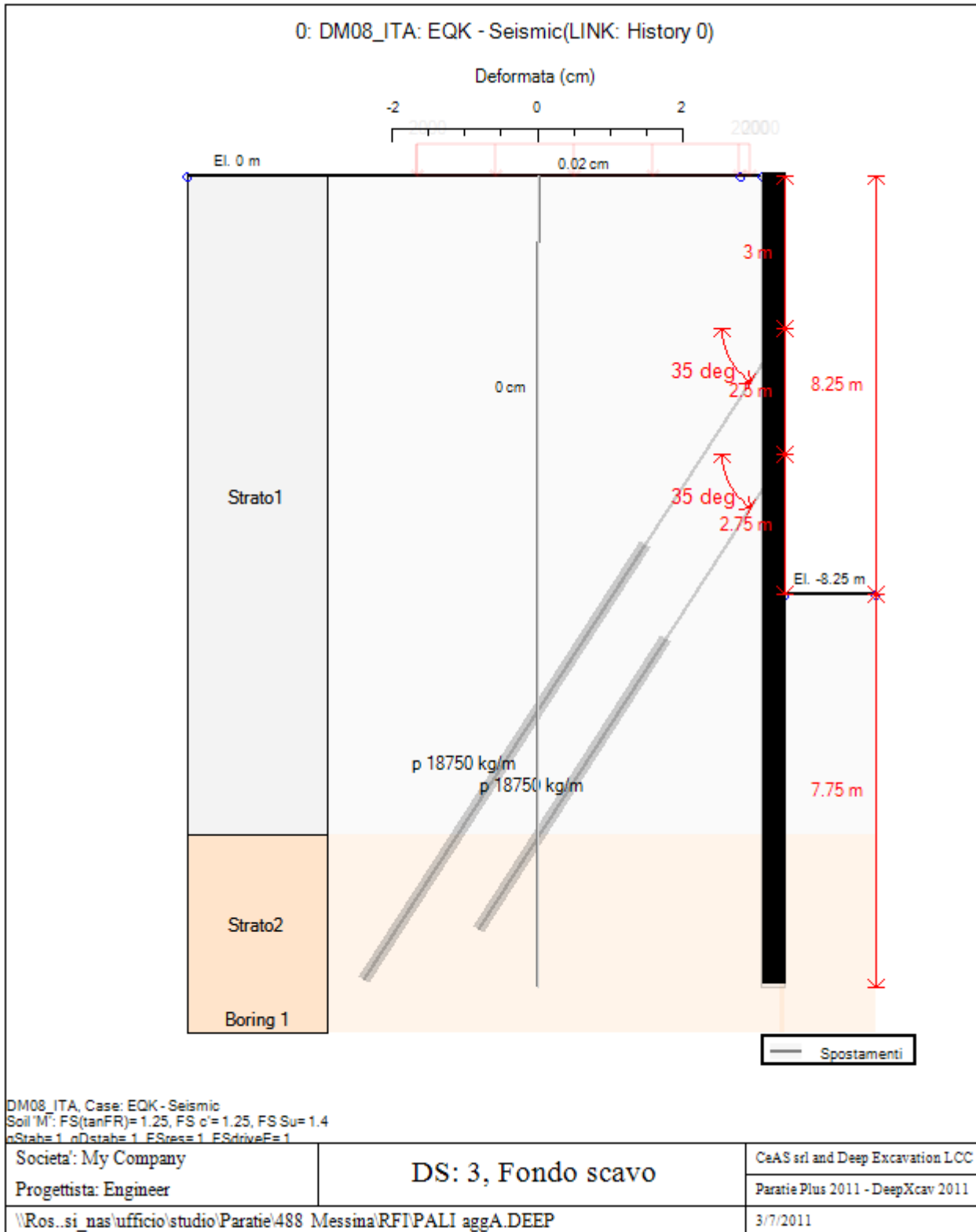


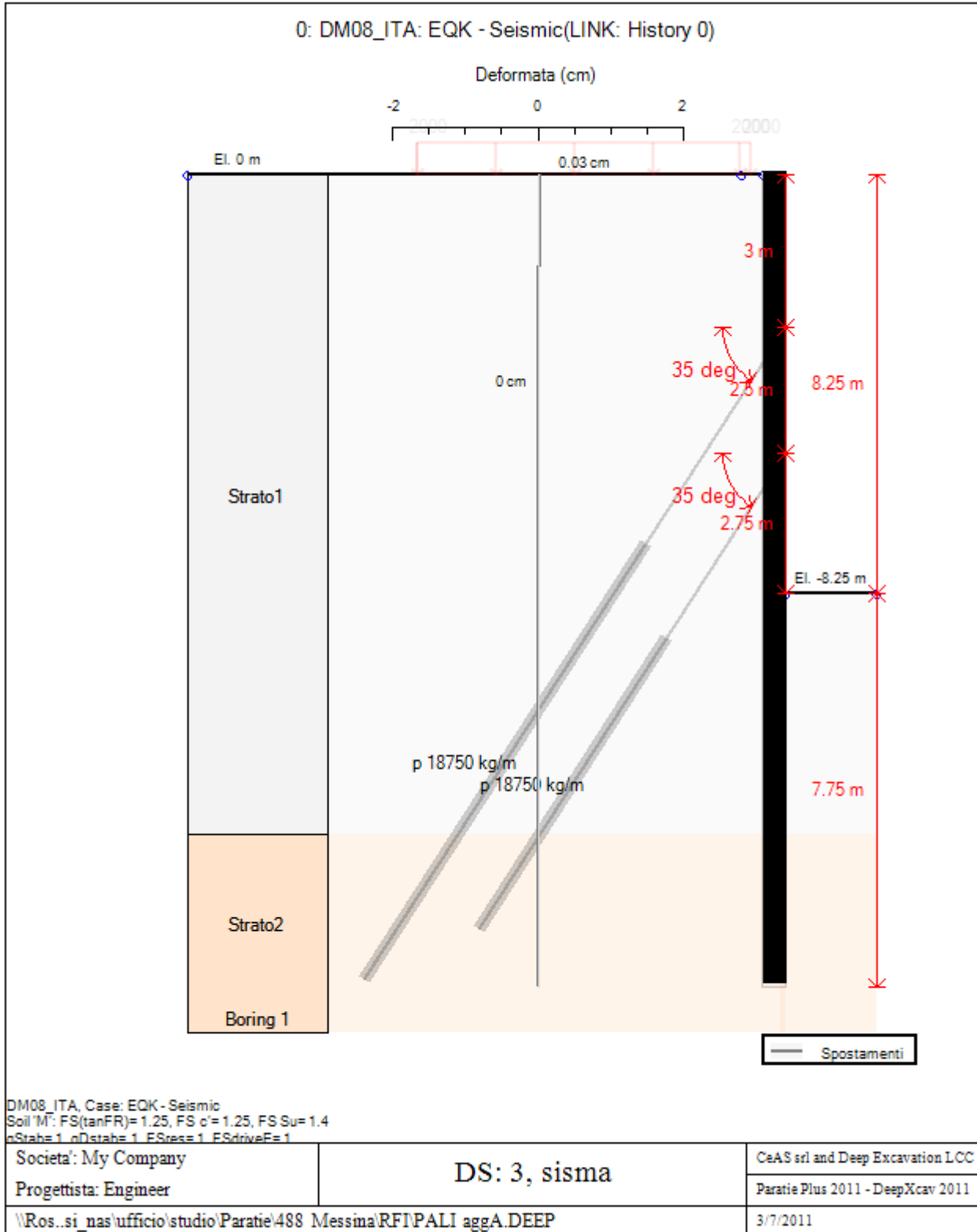












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		RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD	Codice documento SS0558_F0.doc	Rev F0

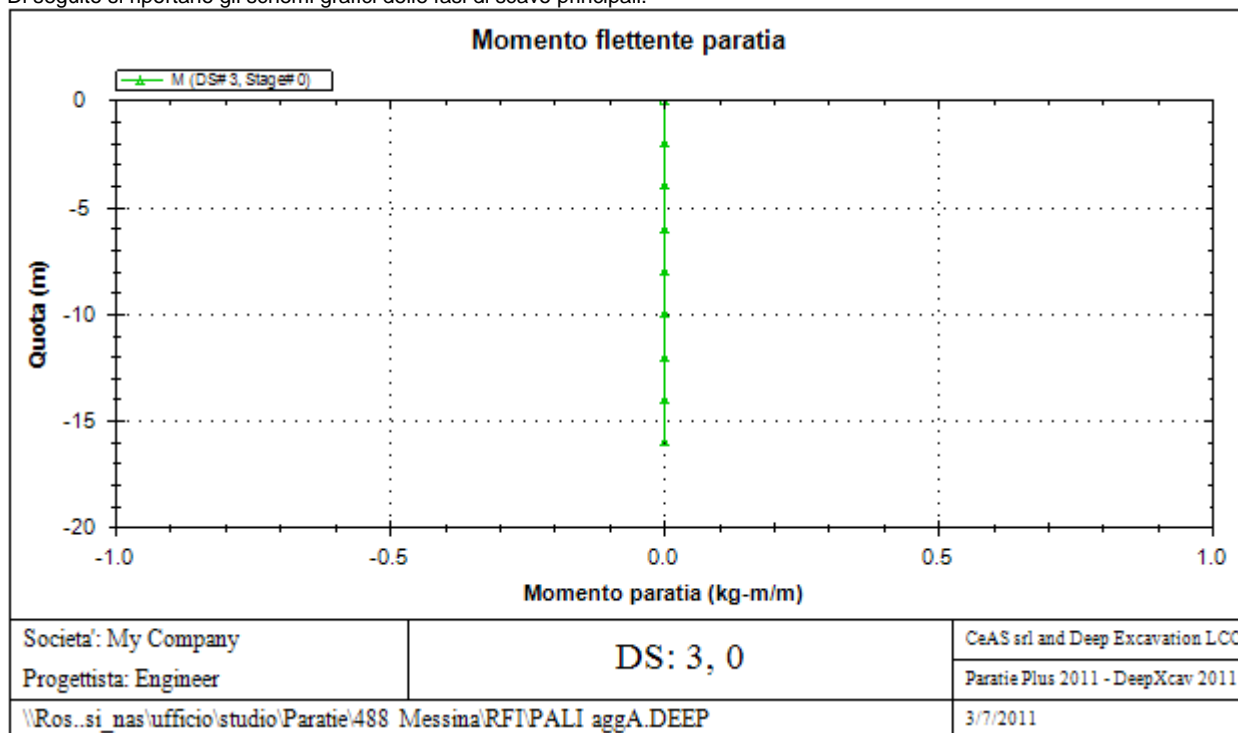
Stabilita' del piede

FS infissione per fase

	FS minimo al piede	FS Passivo	FS Rotazione	FS Lunghezza	FS Pass. mobilizzato	FS Forza attiva / attiva teorica
Stage #0	3.033	4.278	3.033	160	N/A	N/A
Stage #1	10.814	12.436	10.814	160	N/A	N/A
Stage #2	4.258	8.44	5.958	4.258	N/A	N/A
Stage #3	10.473	N/A	10.473	10.473	N/A	N/A
Stage #4	5.263	N/A	6.763	5.263	N/A	N/A
Stage #5	7.357	230.526	7.357	7.692	N/A	N/A
Stage #6	3.444	27.929	4.856	3.444	N/A	N/A
Stage #7	3.298	24.668	4.811	3.298	N/A	N/A

GRAFICI FASI DI SCAVO

Di seguito si riportano gli schemi grafici delle fasi di scavo principali.

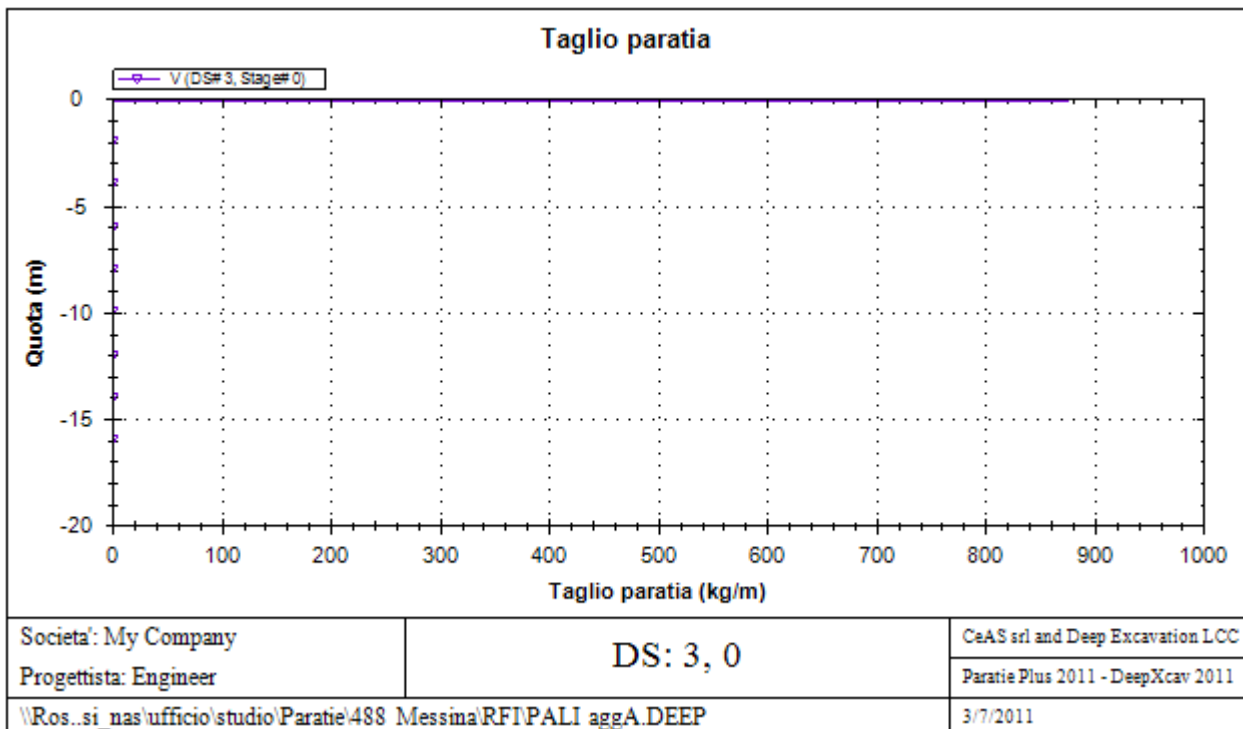
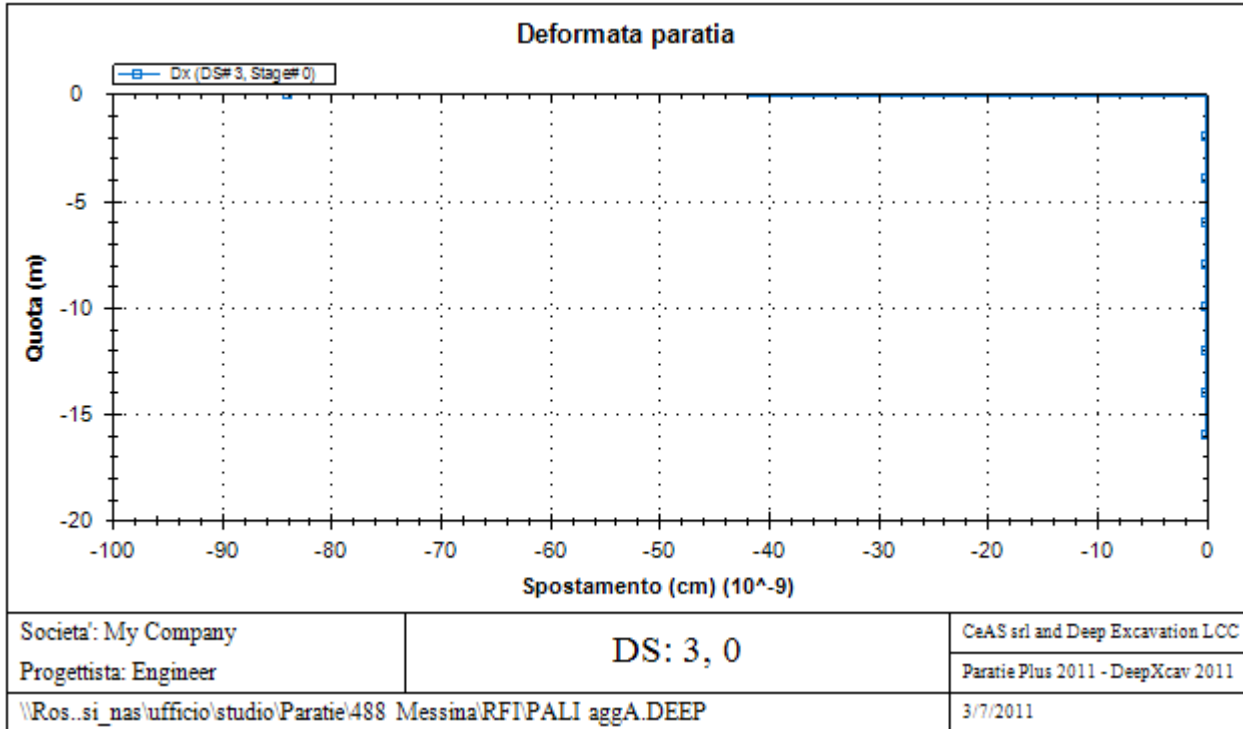


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SS0558_F0.doc

Rev
F0

Data
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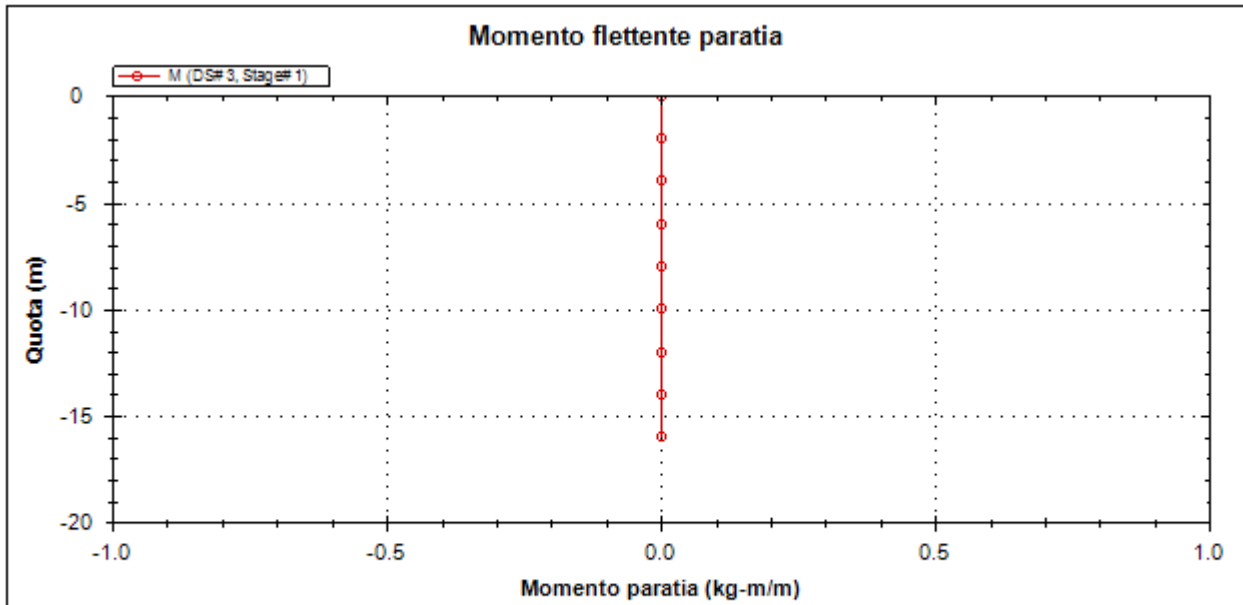


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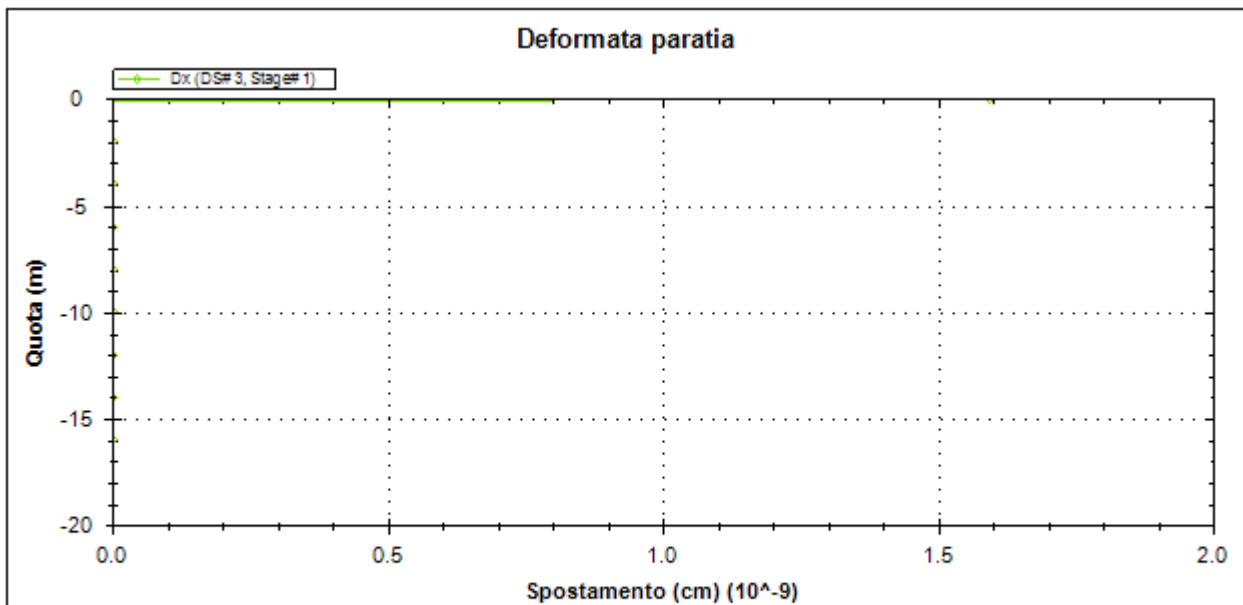
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20/06/2011



Societa': My Company Progettista: Engineer	DS: 3, Condizione geostatica	CeAS srl and Deep Excavation LCC Paratie Plus 2011 - DeepXcav 2011
\\Ros...si_nas\ufficio\studio\Paratie\488 Messina\RFI\PALI aggA.DEEP		3/7/2011



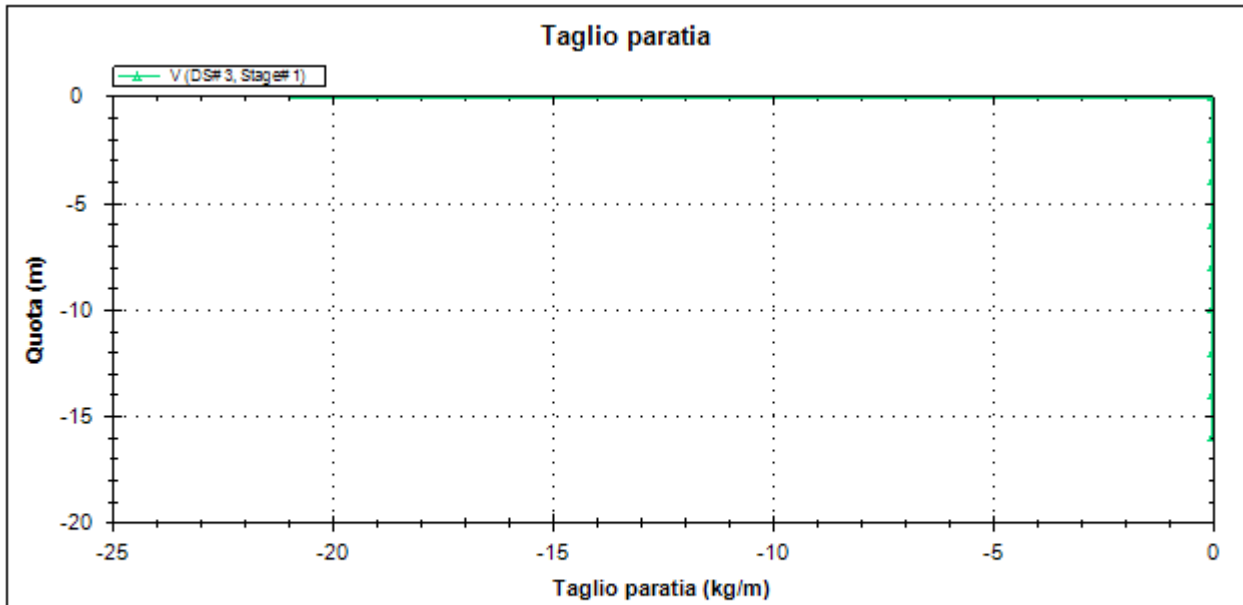
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\\Ros...si_nas\ufficio\studio\Paratie\488 Messina\RFI\PALI aggA.DEEP		3/7/2011

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

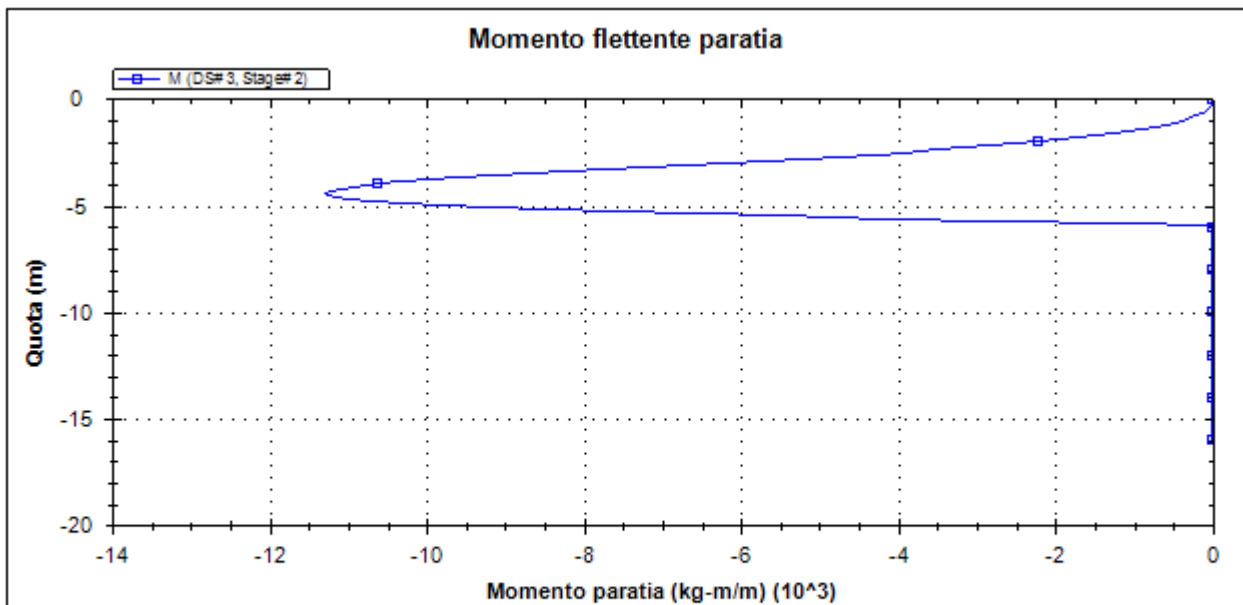
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Rev
F0

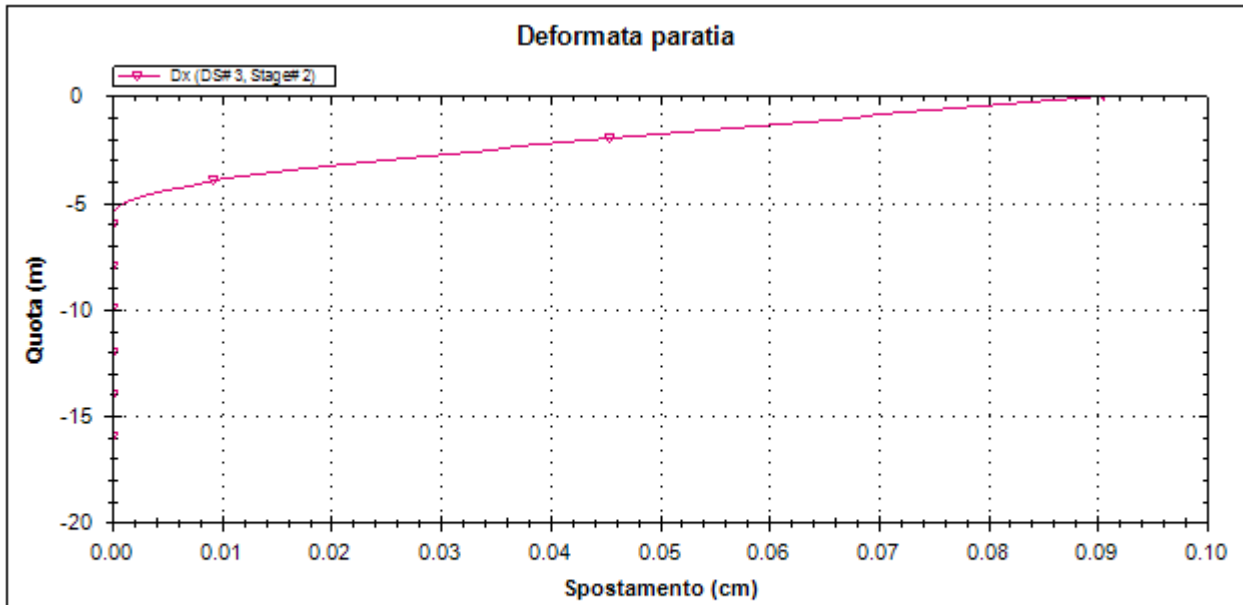
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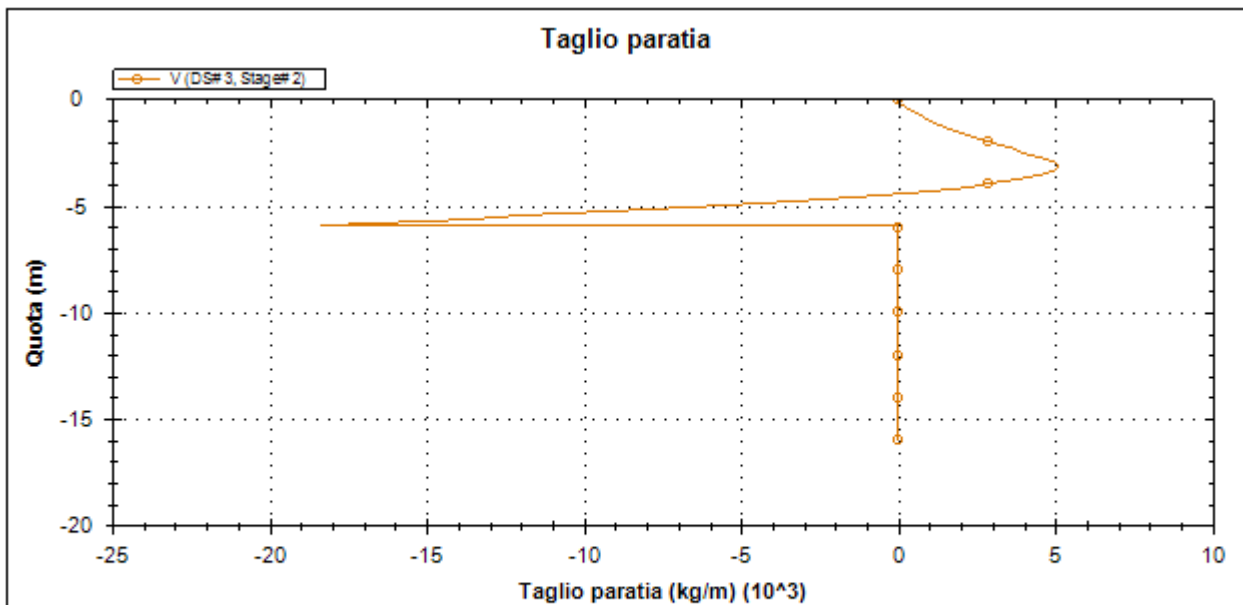
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\\Ros...si_nas\ufficio\studio\Paratie\488 Messina\RFI\PALI aggA.DEEP		3/7/2011



Societa': My Company Progettista: Engineer	DS: 3, Scavo a -2.80 m	CeAS srl and Deep Excavation LCC Paratie Plus 2011 - DeepXcav 2011
\\Ros...si_nas\ufficio\studio\Paratie\488 Messina\RFI\PALI aggA.DEEP		3/7/2011



Societa': My Company Progettista: Engineer	DS: 3, Scavo a -2.80 m	CeAS srl and Deep Excavation LCC Paratie Plus 2011 - DeepXcav 2011
\\Ros...si_nas\ufficio\studio\Paratie\488 Messina\RFI\PALI aggA.DEEP		3/7/2011



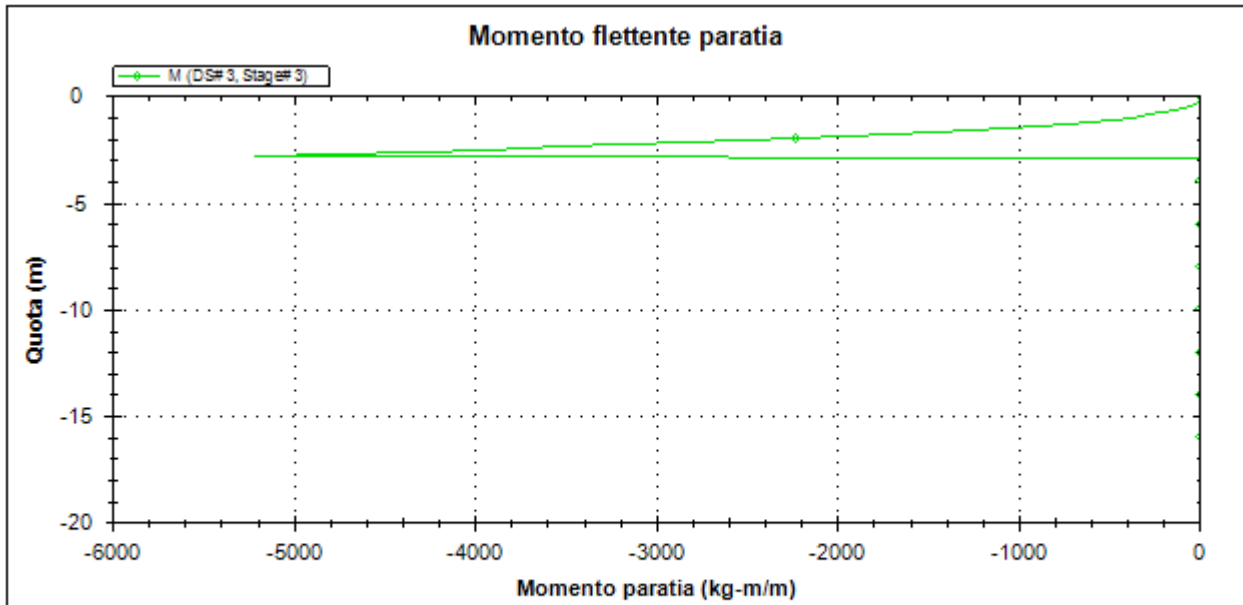
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\\Ros...si_nas\ufficio\studio\Paratie\488 Messina\RFI\PALI aggA.DEEP		3/7/2011

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

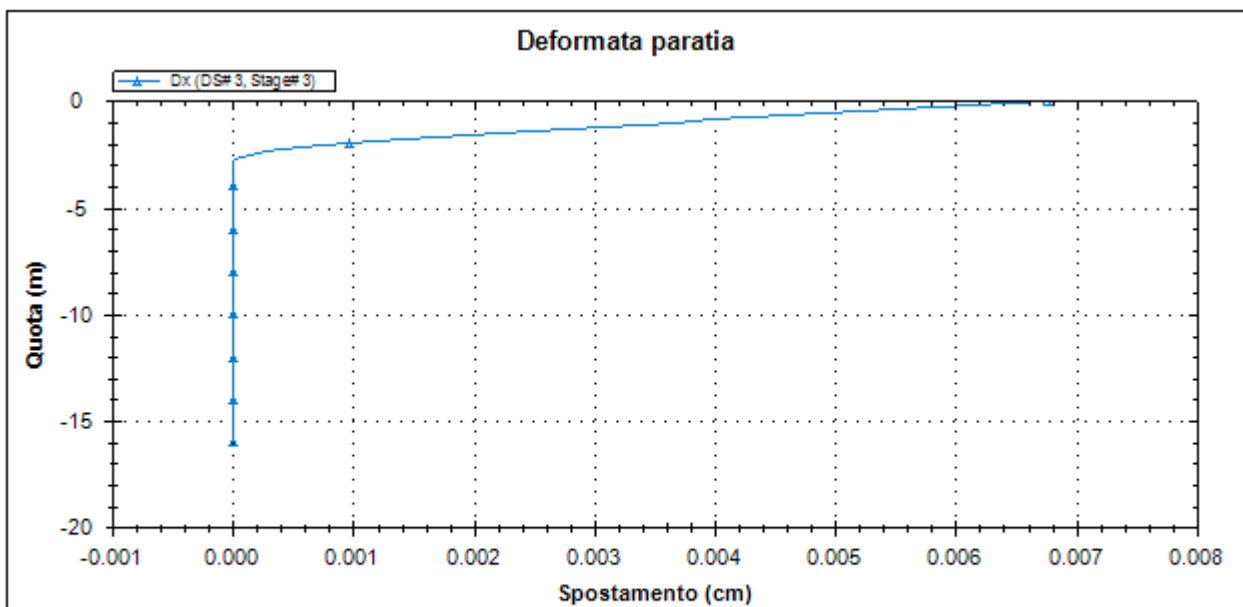
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Rev
F0

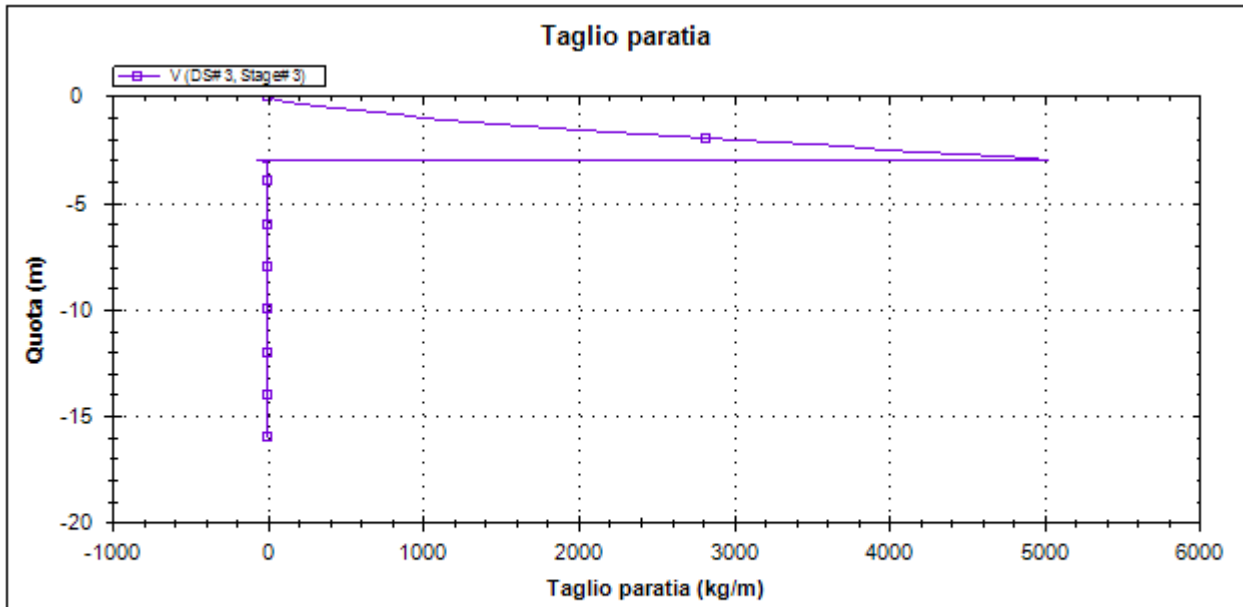
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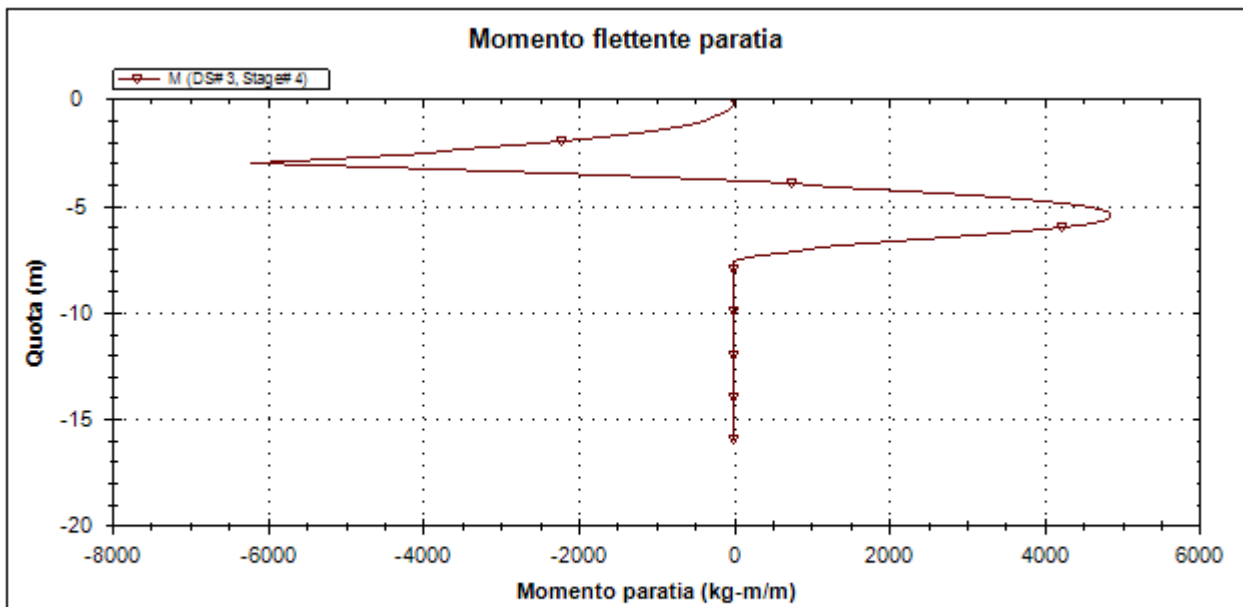
Societa': My Company Progettista: Engineer	DS: 3, 1 Tirante	CeAS srl and Deep Excavation LCC Paratie Plus 2011 - DeepXcav 2011
\\Ros...si_nas\ufficio\studio\Paratie\488 Messina\RFI\PALI aggA.DEEP		3/7/2011



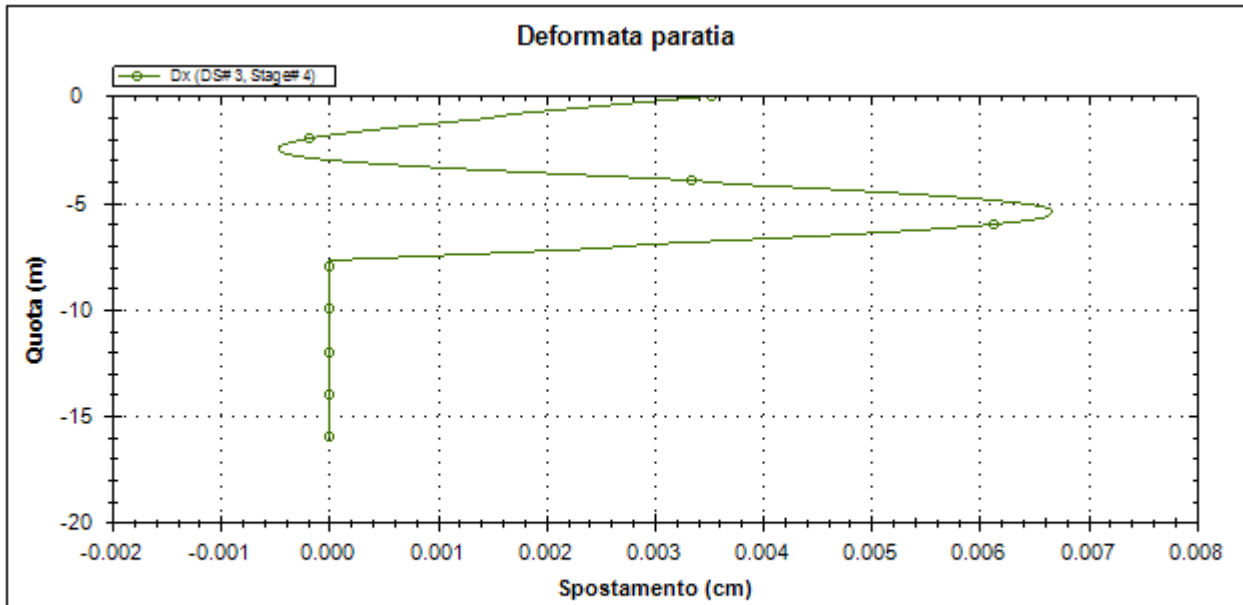
Societa': My Company Progettista: Engineer	DS: 3, 1 Tirante	CeAS srl and Deep Excavation LCC Paratie Plus 2011 - DeepXcav 2011
\\Ros...si_nas\ufficio\studio\Paratie\488 Messina\RFI\PALI aggA.DEEP		3/7/2011



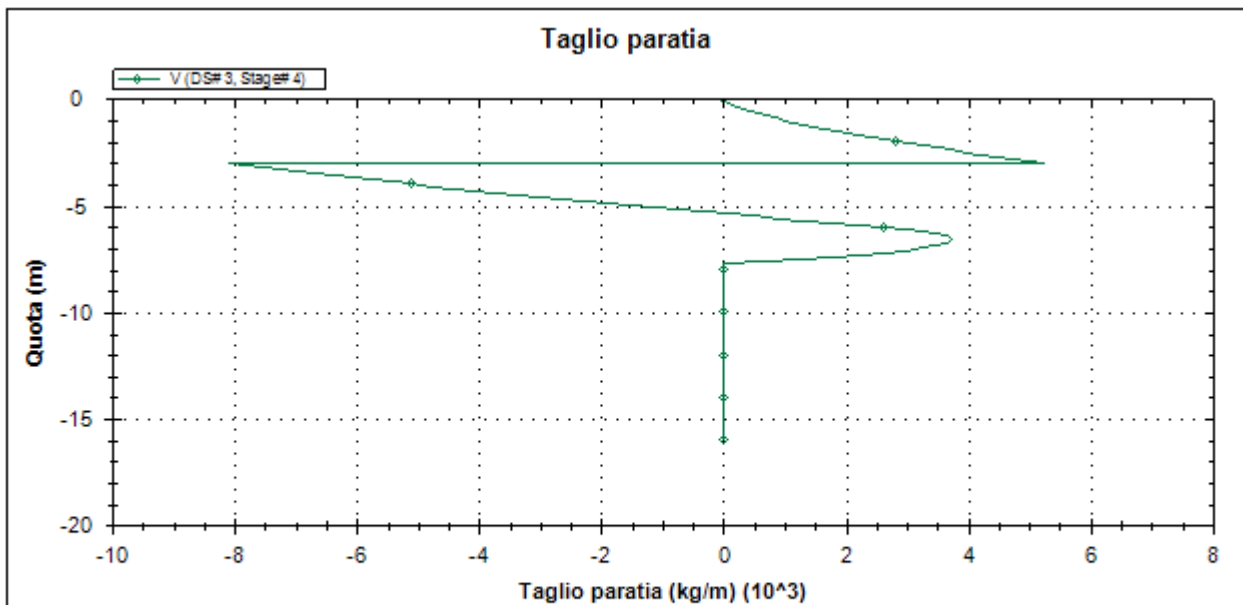
Societa': My Company	DS: 3, 1 Tirante	CeAS srl and Deep Excavation LCC
Progettista: Engineer		Paratie Plus 2011 - DeepXcav 2011
\\Ros...si_nas\ufficio\studio\Paratie\488 Messina\RFI\PALI aggA.DEEP		3/7/2011



Societa': My Company	DS: 3, New stage 4	CeAS srl and Deep Excavation LCC
Progettista: Engineer		Paratie Plus 2011 - DeepXcav 2011
\\Ros...si_nas\ufficio\studio\Paratie\488 Messina\RFI\PALI aggA.DEEP		3/7/2011



Società: My Company	DS: 3, New stage 4	CeAS srl and Deep Excavation LCC
Progettista: Engineer		Paratie Plus 2011 - DeepXcav 2011
\\Ros...si_nas\ufficio\studio\Paratie\488 Messina\RFI\PALI aggA.DEEP		3/7/2011



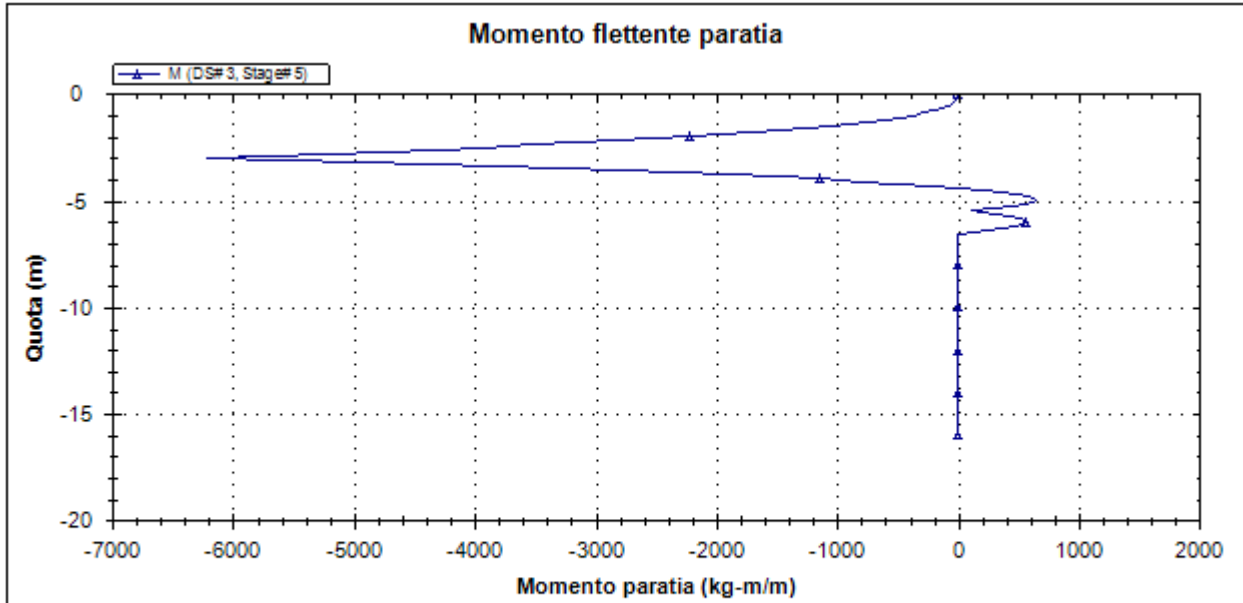
Società: My Company	DS: 3, New stage 4	CeAS srl and Deep Excavation LCC
Progettista: Engineer		Paratie Plus 2011 - DeepXcav 2011
\\Ros...si_nas\ufficio\studio\Paratie\488 Messina\RFI\PALI aggA.DEEP		3/7/2011

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

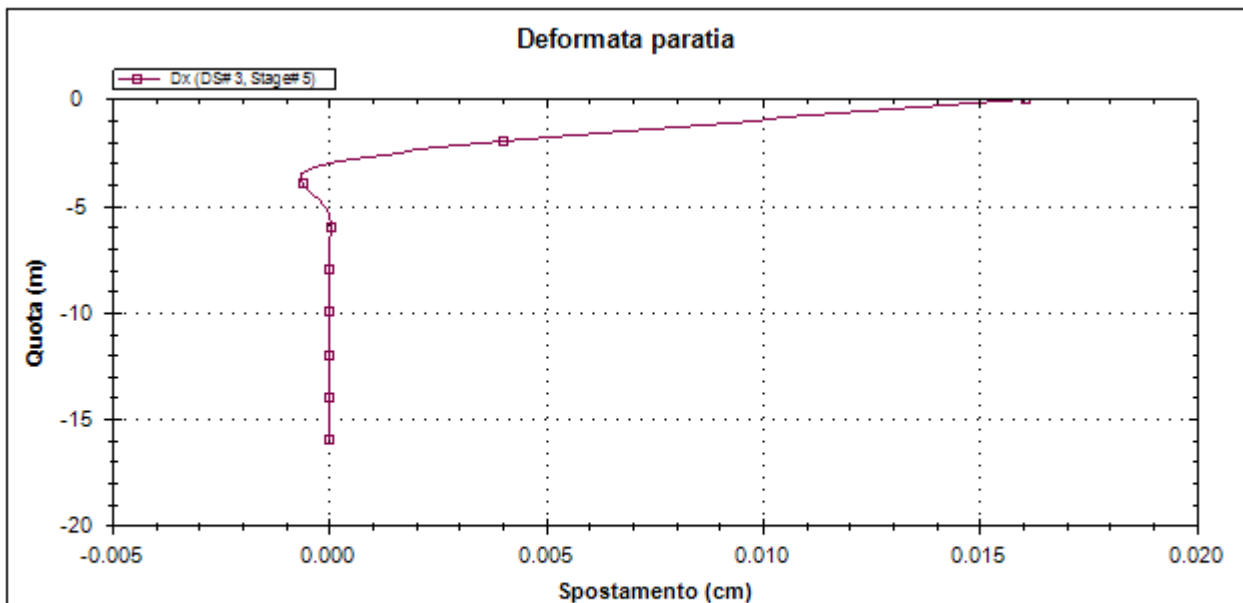
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SS0558_F0.doc

Rev
F0

Data
20/06/2011



Società: My Company	DS: 3, 2 Tirante	CeAS srl and Deep Excavation LCC
Progettista: Engineer		Paratie Plus 2011 - DeepXcav 2011
\\Ros...si_nas\ufficio\studio\Paratie\488 Messina\RFI\PALI aggA.DEEP		3/7/2011



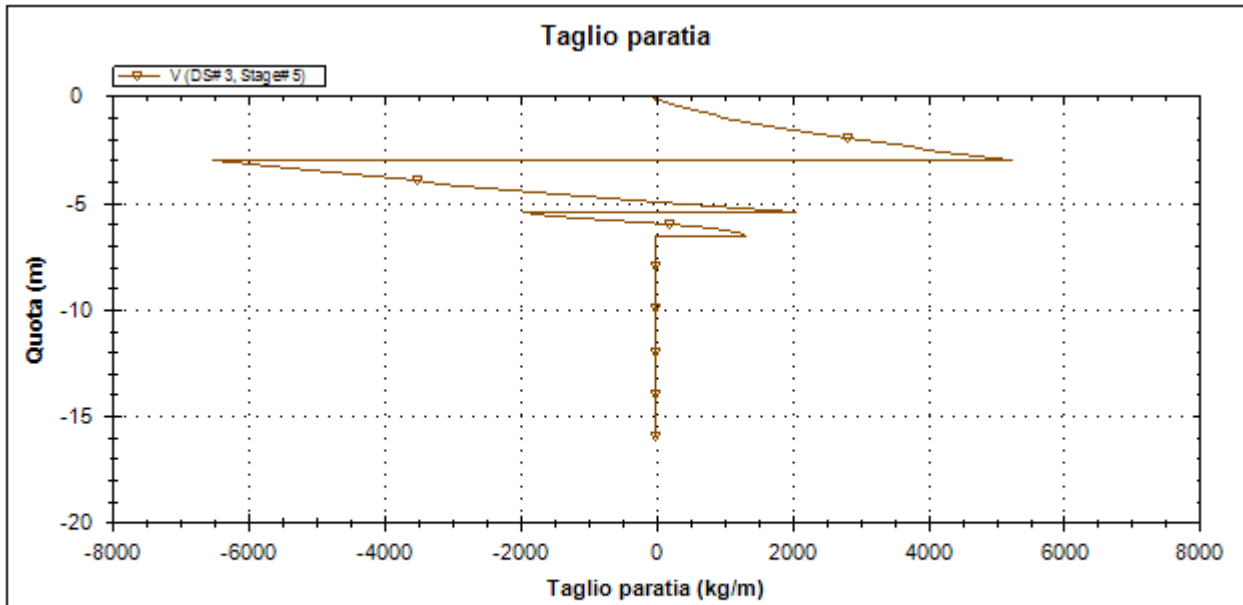
Società: My Company	DS: 3, 2 Tirante	CeAS srl and Deep Excavation LCC
Progettista: Engineer		Paratie Plus 2011 - DeepXcav 2011
\\Ros...si_nas\ufficio\studio\Paratie\488 Messina\RFI\PALI aggA.DEEP		3/7/2011

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

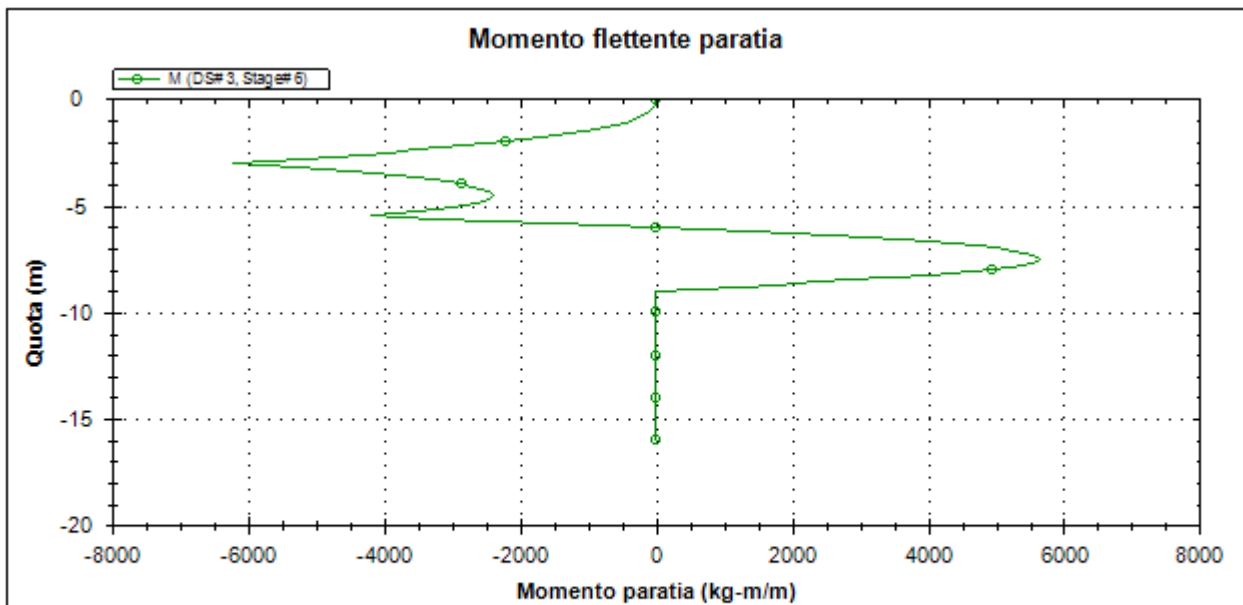
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Rev
F0

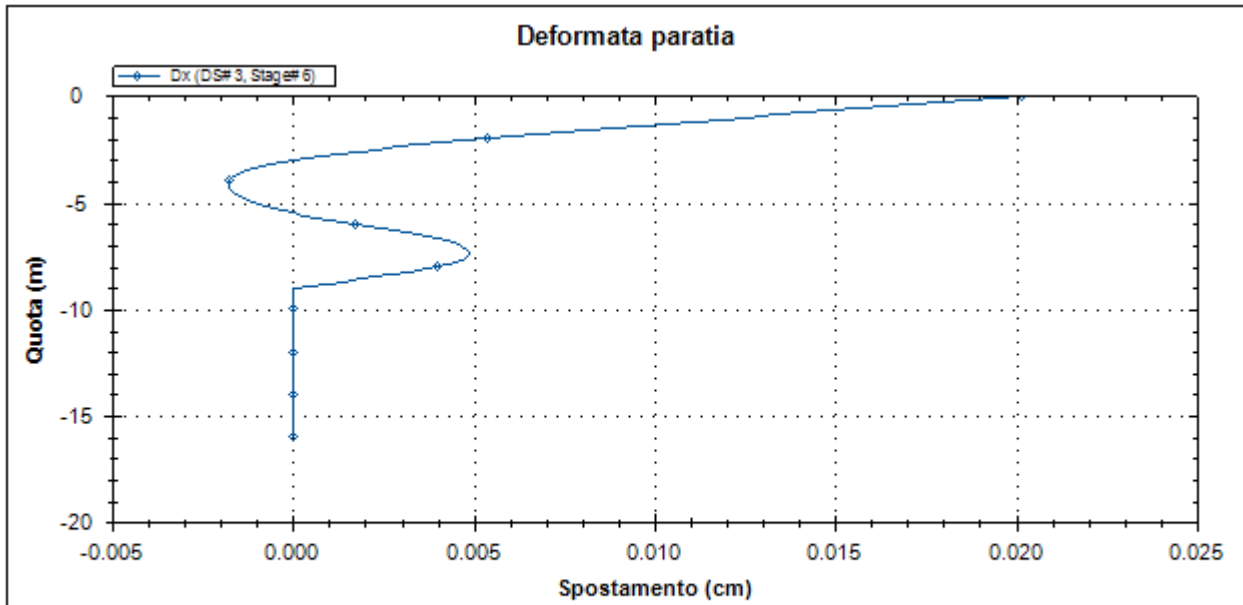
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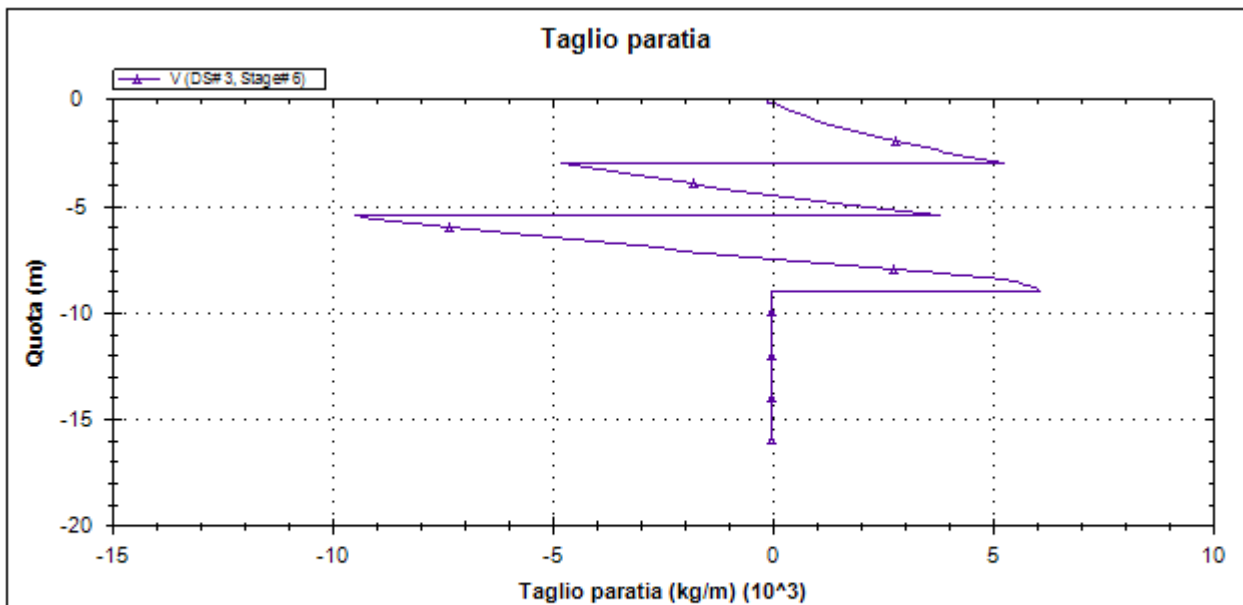
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Progettista: Engineer		Paratie Plus 2011 - DeepXcav 2011
\\Ros...si_nas\ufficio\studio\Paratie\488 Messina\RFI\PALI aggA.DEEP		3/7/2011



Società: My Company	DS: 3, Fondo scavo	CeAS srl and Deep Excavation LCC
Progettista: Engineer		Paratie Plus 2011 - DeepXcav 2011
\\Ros...si_nas\ufficio\studio\Paratie\488 Messina\RFI\PALI aggA.DEEP		3/7/2011



Societa': My Company	DS: 3, Fondo scavo	CeAS srl and Deep Excavation LCC
Progettista: Engineer		Paratie Plus 2011 - DeepXcav 2011
\\Ros...si_nas\ufficio\studio\Paratie\488 Messina\RFI\PALI aggA.DEEP		3/7/2011



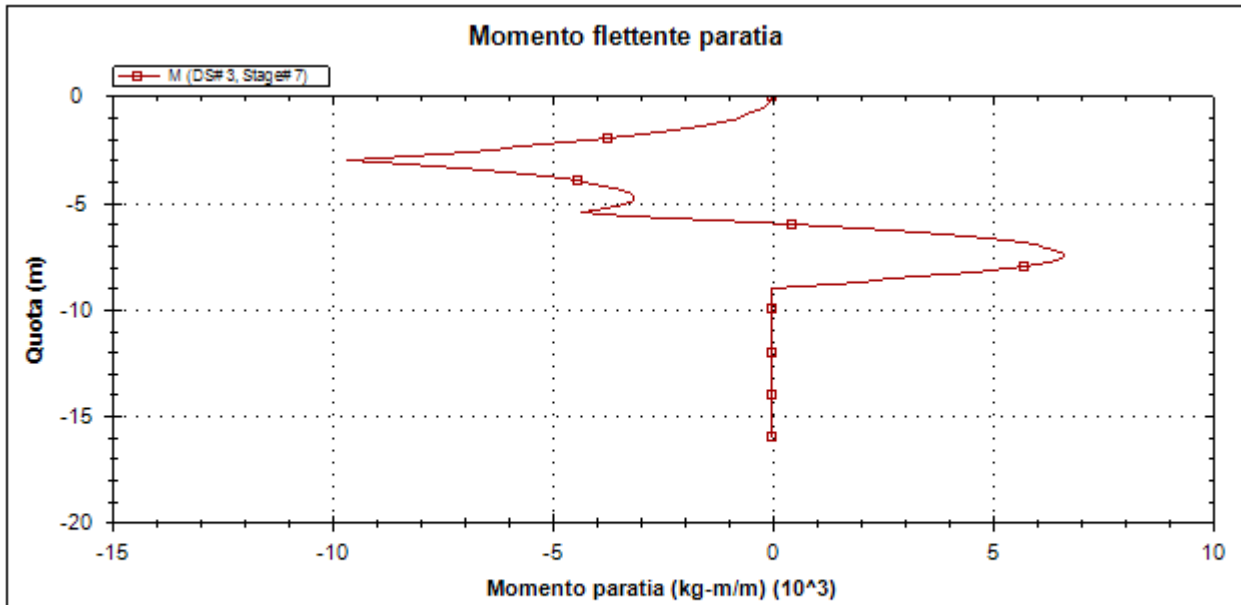
Societa': My Company	DS: 3, Fondo scavo	CeAS srl and Deep Excavation LCC
Progettista: Engineer		Paratie Plus 2011 - DeepXcav 2011
\\Ros...si_nas\ufficio\studio\Paratie\488 Messina\RFI\PALI aggA.DEEP		3/7/2011

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

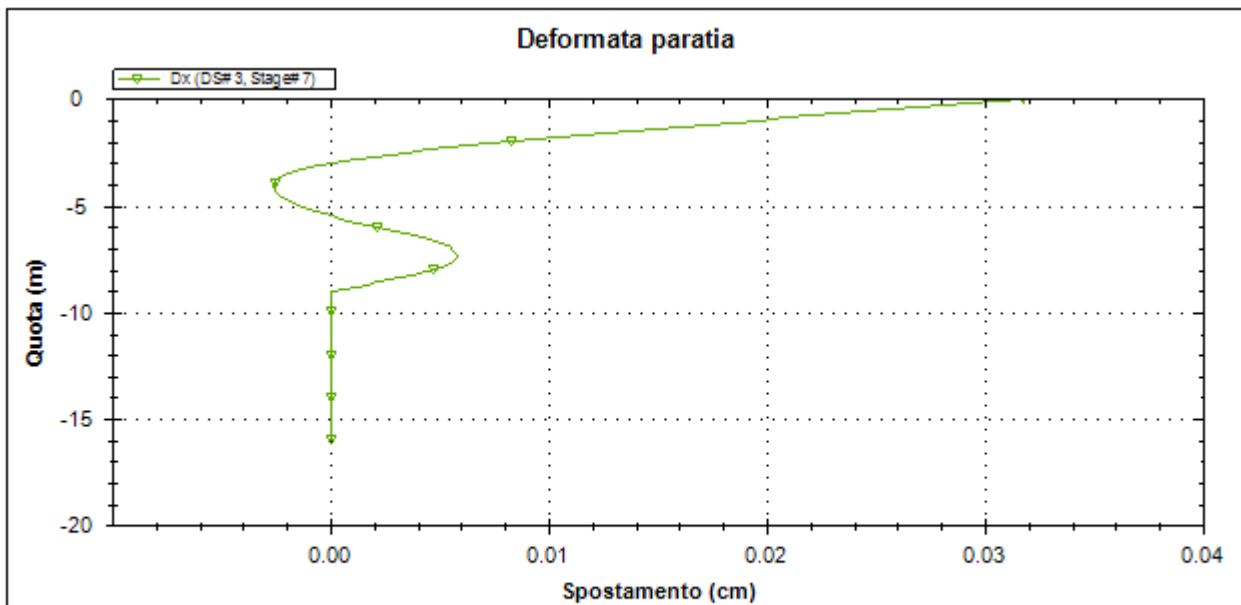
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Rev
F0

Data
20/06/2011



Società: My Company	DS: 3, sisma	CeAS srl and Deep Excavation LCC
Progettista: Engineer		Paratie Plus 2011 - DeepXcav 2011
\\Ros...si_nas\ufficio\studio\Paratie\488 Messina\RFI\PALI aggA.DEEP		3/7/2011



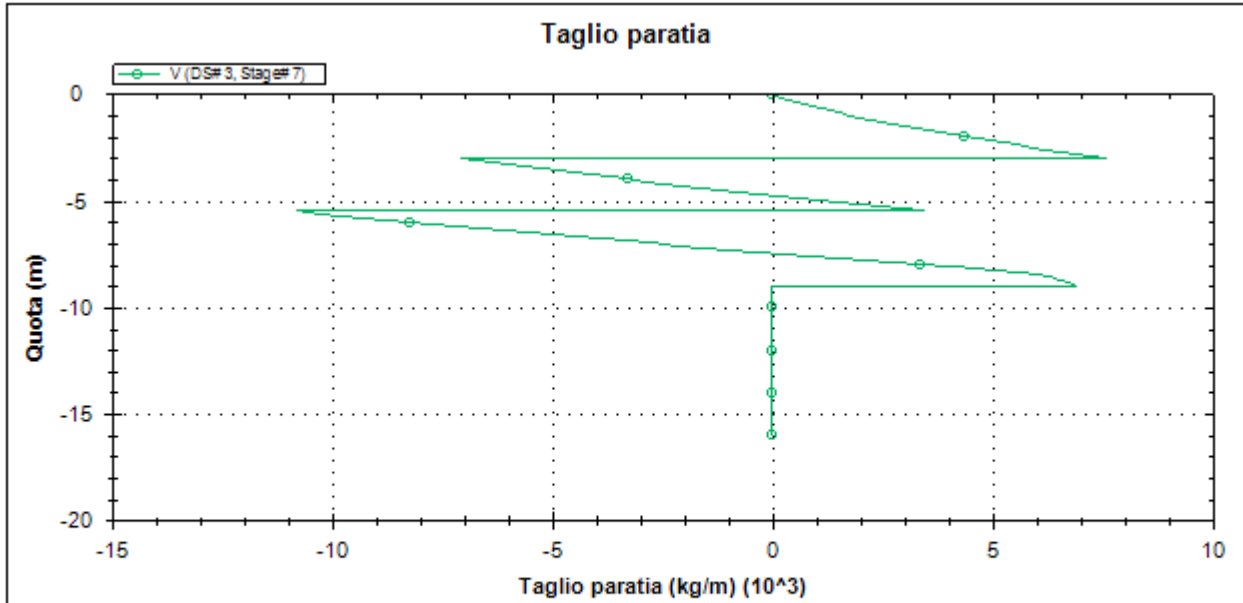
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Progettista: Engineer		Paratie Plus 2011 - DeepXcav 2011
\\Ros...si_nas\ufficio\studio\Paratie\488 Messina\RFI\PALI aggA.DEEP		3/7/2011

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

Codice documento
SS0558_F0.doc

Rev
F0

Data
20/06/2011



Società: My Company	DS: 3, sisma	CeAS srl and Deep Excavation LCC
Progettista: Engineer		Paratie Plus 2011 - DeepXcav 2011
\\Ros...si_nas\ufficio\studio\Paratie\488 Messina\RFI\PALI aggA.DEEP		3/7/2011

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011

9.3.1 VERIFICHE

Viene di seguito riportato un tabulato riassuntivo delle sollecitazioni calcolate.

	0: DM08_ITA: Comb. 1: A1+M1+R1	0: DM08_ITA: Comb. 2: A2+M2+R1	0: DM08_ITA: EQK - Seismic
Spostamento paratia (cm)	0.05	0.09	0.12
Cedimenti (cm)	0.6	0.6	0.88
Momento paratia (daN-m/m)	9062.81	13115.32	13477.31
Momento paratia (daN-m)	10875.38	15738.39	16172.77
Taglio paratia (daN/m)	18392.64	23429.35	20735.88
Taglio paratia (daN)	22071.16	28115.22	24883.06
TSF Comb.paratia	0.037	0.054	0.056
TSF M+N paratia	0.037	0.054	0.056
TSF V paratia	0.539	0.686	0.607
Max. reazione vincoli (daN/m)	16830.47	18248.74	18085.9
Max. reazione vincoli (daN)	40393.13	43796.96	43406.16
Verifica vincoli	0.25	0.271	0.273
TSF vincoli	0.25	0.271	0.269
TSF sfilamento tirante	0.149	0.203	0.273
FS fondo scavo	4.024	4.024	3.219
FS passiva (an. classica)	6.794	11.809	8.222
FS rotazione (an. classica)	4.669	7.084	4.802
FS infissione (an. classica)	5	4.189	3.444

Si procede quindi andando a verificare i pali nei confronti delle massime sollecitazioni flessionali e taglianti.

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO					
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<table border="1" style="width: 100%; border-collapse: collapse;"> <thead> <tr> <th style="text-align: left;"><i>Rev</i></th> <th style="text-align: left;"><i>Data</i></th> </tr> </thead> <tbody> <tr> <td style="text-align: left;">F0</td> <td style="text-align: left;">20/06/2011</td> </tr> </tbody> </table>	<i>Rev</i>	<i>Data</i>	F0	20/06/2011
<i>Rev</i>	<i>Data</i>						
F0	20/06/2011						

VERIFICA A FLESSIONE

$$M_{sd} = 161 \text{ KNm}$$

Flessione:

SEZIONE	diametro (cm)	100
ARMATURA	ripartita	24 ϕ 24
INDICI DI RESISTENZA	Mrd =	1.597 kNm
	IR =	9,91

VERIFICA A TAGLIO (IN ESTREMITA')

ARMATURA	ripartita	24 ϕ 24
----------	-----------	--------------

$$V_{sd} = 248 \text{ kN}$$

RISULTATI VERIFICA A TAGLIO	
Verifica delle bielle compresse	
Taglio resistente ultimo (VRcd):	315813.719
ctg(Theta):	1.00
Indice di resistenza:	0.11
Verifica con armatura trasversale	
Taglio attribuito all'armatura (VRsd):	17502.001
Armatura trasversale per unita' di lunghezza (Asw, cm ² /m):	5.14
Staffe a 2 braccia	
:	ϕ 8/19.6cm

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011

10 FONDAZIONI

10.1 ANALISI DEL SISTEMA FONDAZIONALE

Lo scatolare lato nord, a differenza dello scatolare sud, presenta un sistema fondazionale di tipo indiretto su pali; tale tipologia risulta infatti necessaria per utilizzare in prima fase i suddetti pali come berlinese di sostegno dello scavo da eseguirsi al loro interno, raggiungendo la quota di fondo scavo su cui giace la strada di servizio.

10.2 COMBINAZIONE DELLE SOLLECITAZIONI

Vengono innanzitutto presentate le diverse combinazioni utilizzate per la valutazione delle sollecitazioni.

		Combinazione	Coefficienti moltiplicativi delle sollecitazioni								
			A	B	C	D	E	F	G	H	I
S L U	S T R	Comb 1	1,3	1,5	1,35	1,35	0	0	1,5	1,5	0
		Comb 2	1,3	1,5	1,35	1,35	0	0	1,5	0,75	0
		Comb 3	1,3	1,5	1,35	1,35	1,5	1,5	0	0	0
		Comb 4	1,3	1,5	1,35	1,35	1,5	0,75	0	0	0
		Comb 6	1,3	1,5	1,35	1,35	0	0	0	0	0
	Sisma	Comb 5	1	1	0,2	0,2	0	0	1	0	1
	G E O	Comb 7	1	1,3	1,15	1,15	0	0	1,3	1,3	0
		Comb 8	1	1,3	1,15	1,15	0	0	1,3	0,65	0
		Comb 9	1	1,3	1,15	1,15	1,3	1,3	1	0	0
		Comb 10	1	1,3	1,15	1,15	1,3	0,65	1	0	0
		Comb 11	1	1,3	1,15	1,15	0	0	1	0	0

S L E	Frequente	Comb 12	1	1	0,75	0,75	0	0	1	1	0
	Quasi Per	Comb 13	1	1	0	0	0	0	1	1	0
	Frequente	Comb 14	1	1	0,75	0,75	0	0	1	0,5	0
	Quasi Per	Comb 15	1	1	0	0	0	0	1	0,5	0
	Frequente	Comb 16	1	1	0,75	0,75	1	1	0	0	0
	Quasi Per	Comb 17	1	1	0	0	1	1	0	0	0
	Frequente	Comb 18	1	1	0,75	0,75	1	0,5	0	0	0
	Quasi Per	Comb 19	1	1	0	0	1	0,5	0	0	0
	Frequente	Comb 20	1	1	0,75	0,75	0	0	0	0	0
	Quasi Per	Comb 21	1	1	0	0	0	0	0	0	0

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011

Dove nella tabella soprastante vengono utilizzate le seguenti indicizzazioni per l'identificazione delle diverse nature di sollecitazioni.

A = Pesi propri strutturali;

B = Permanenti non strutturali;

C = Accidentali da traffico;

D = Incremento di spinta per sovraccarico concentrato;

E = Spinta a riposo del terreno sul muro sinistro;

F = Spinta a riposo del terreno sul muro destro;

G = Spinta attiva del terreno sul muro sinistro;

H = Spinta attiva del terreno sul muro destro;

I = Incremento di spinta del terreno sul muro sinistro dovuto al sisma secondo le teorie di Mononobe - Okabe;

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011

10.3 MASSIME AZIONI SUI PALI

Con riferimento all'indicizzazione di seguito riportata vengono elencati i risultati delle analisi svolte, ottenuti come output numerico del software di calcolo strutturale utilizzato; in particolare, con riferimento alle combinazioni di carico già descritte, si riportano i valori delle azioni assiale e di taglio sui pali ai nodi di incastro delle aste 10 e 11, rispettivamente denominati 7 e 8.

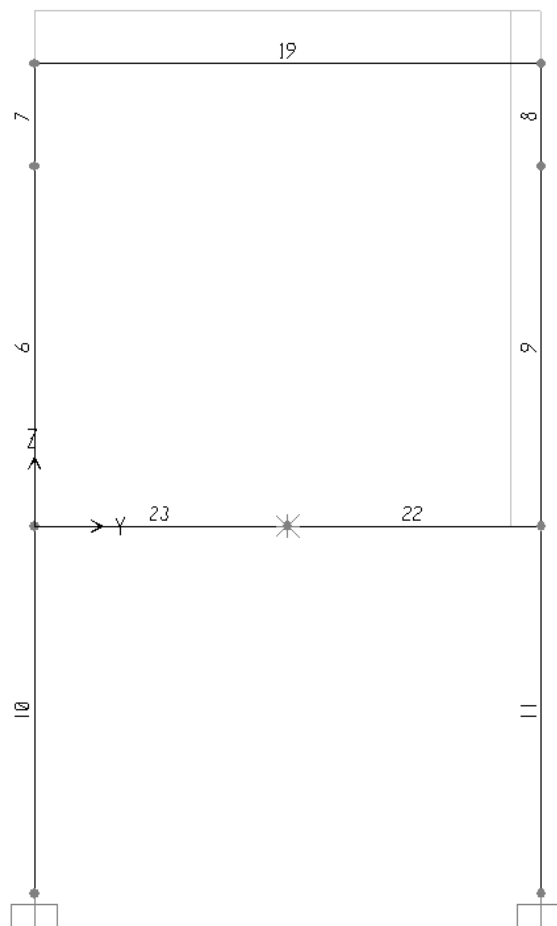


TABLE: Joint Reactions				
Joint	OutputCase	CaseType	U2	U3
Text	Text	Text	KN	KN
7	COMB1	Combination	-63,387	868,577
7	COMB2	Combination	-113,337	894,455
7	COMB3	Combination	-41,472	868,577
7	COMB4	Combination	-117,162	907,791

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011

7	COMB5	Combination	-32,649	571,438
7	COMB6	Combination	-105,915	868,577
7	COMB7	Combination	-53,162	708,724
7	COMB8	Combination	-96,452	731,151
7	COMB9	Combination	-34,169	708,724
7	COMB10	Combination	-99,768	742,709
7	COMB11	Combination	-90,02	708,724
8	COMB1	Combination	-119,15	727,347
8	COMB2	Combination	-147,836	701,469
8	COMB3	Combination	-141,065	727,347
8	COMB4	Combination	-184,534	688,133
8	COMB5	Combination	-111,021	460,627
8	COMB6	Combination	-76,622	727,347
8	COMB7	Combination	-102,332	588,417
8	COMB8	Combination	-127,193	565,989
8	COMB9	Combination	-121,325	588,417
8	COMB10	Combination	-158,998	554,432
8	COMB11	Combination	-65,474	588,417

Per ottenere i valori sul singolo palo occorre considerare l'interasse pari a 1,20 m:

Azioni massime STR (comb 4):

Carico assiale $P = 908 \cdot 1,20 = 1.090 \text{ kN}$

Azione di taglio $V = 184 \cdot 1,20 = 221 \text{ kN}$

Azioni massime SISMA (comb 5):

Carico assiale $P = 571 \cdot 1,20 = 685 \text{ kN}$

Azione di taglio $V = 111 \cdot 1,20 = 133 \text{ kN}$

Azioni massime GEO (comb 4):

Carico assiale $P = 731 \cdot 1,20 = 877 \text{ kN}$

Azione di taglio $V = 156 \cdot 1,20 = 187 \text{ kN}$

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011

10.4 VERIFICHE GEOTECNICHE

10.4.1 MODELLO DI CALCOLO

Per il calcolo della capacità portante delle fondazioni si utilizza il software di calcolo Aztec CARL 10.0 versione 10.05.b – carico limite e cedimenti.

10.4.1.1 DESCRIZIONE DEL MODELLO DI CALCOLO

Progetto: Sottopasso RFI lato Nord

Normative di riferimento

- Legge nr. 1086 del 05/11/1971.

Norme per la disciplina delle opere in conglomerato cementizio, normale e precompresso ed a struttura metallica.

- Legge nr. 64 del 02/02/1974.

Provvedimenti per le costruzioni con particolari prescrizioni per le zone sismiche.

- D.M. LL.PP. del 11/03/1988.

Norme tecniche riguardanti le indagini sui terreni e sulle rocce, la stabilità dei pendii naturali e delle scarpate, i criteri generali e le prescrizioni per la progettazione, l'esecuzione e il collaudo delle opere di sostegno delle terre e delle opere di fondazione.

- D.M. LL.PP. del 14/02/1992.

Norme tecniche per l'esecuzione delle opere in cemento armato normale e precompresso e per le strutture metalliche.

- D.M. 9 Gennaio 1996

Norme Tecniche per il calcolo, l'esecuzione ed il collaudo delle strutture in cemento armato normale e precompresso e per le strutture metalliche

- D.M. 16 Gennaio 1996

Norme Tecniche relative ai 'Criteri generali per la verifica di sicurezza delle costruzioni e dei carichi e sovraccarichi'

- D.M. 16 Gennaio 1996

Norme Tecniche per le costruzioni in zone sismiche

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011

- Circolare Ministero LL.PP. 15 Ottobre 1996 N. 252 AA.GG./S.T.C.

Istruzioni per l'applicazione delle Norme Tecniche di cui al D.M. 9 Gennaio 1996

- Circolare Ministero LL.PP. 10 Aprile 1997 N. 65/AA.GG.

Istruzioni per l'applicazione delle Norme Tecniche per le costruzioni in zone sismiche di cui al D.M. 16 Gennaio 1996

- Norme Tecniche per le Costruzioni 2008 (D.M. 14 Gennaio 2008)

- Circolare 617 del 02/02/2009

Istruzioni per l'applicazione delle Nuove Norme Tecniche per le Costruzioni di cui al D.M. 14 gennaio 2008.

Determinazione della capacità portante

carico verticale che grava sul palo va confrontato con il valore di calcolo della resistenza verticale del palo stesso. Il problema che si pone, quindi, è quello di determinare la capacità portante del palo. Determinata la capacità portante, la resistenza di calcolo verticale del palo si ottiene applicando degli opportuni coefficienti di sicurezza.

La capacità portante di un palo viene valutata come somma di due contributi: portanza di base (o di punta) e portanza per attrito laterale lungo il fusto. Cioè si assume valida l'espressione:

$$Q_T = Q_P + Q_L - W_P$$

dove:

Q_T Portanza totale del palo;

Q_P Portanza di base del palo;

Q_L Portanza per attrito laterale del palo;

W_P Peso proprio del palo.

Le due componenti Q_P e Q_L sono calcolate in modo indipendente fra loro. Risulta molto difficoltoso, tranne che in poche situazioni, stabilire quanta parte del carico viene assorbita per attrito laterale e quanta per resistenza alla base.

Nel caso di pali soggetti a trazione la resistenza allo sfilamento vale:

$$Q_T = Q_L + W_P$$

Dalla capacità portante del palo si ricava il carico ammissibile del palo Q_A applicando degli opportuni coefficienti di sicurezza rispettivamente γ_b e γ_s .

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO	
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD	<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011

I coefficienti γ_b e γ_s rappresentano rispettivamente i valori del coefficiente di sicurezza per la portanza di punta e quello per la portanza laterale.

Quindi nel caso di pali compressi abbiamo la seguente relazione:

$$Q_A = Q_p/\gamma_b + Q_l/\gamma_s - W_P$$

Nel caso invece di pali soggetti a sforzi di trazione abbiamo la seguente relazione:

$$Q_A = Q_l/\gamma_s + W_P$$

Capacità portante di punta

In generale la capacità portante di punta viene calcolata tramite l'espressione:

$$Q_P = A_P (c N_c + q_b N_q)$$

dove A_P è l'area portante efficace della punta del palo, c è la coesione, q_b è la pressione del terreno alla quota della punta del palo ed i coefficienti N_c e N_q sono i coefficienti delle formule della capacità portante corretti per tener conto degli effetti di profondità.

N_c ed N_q dipendono sia dalla geometria del palo che dalle caratteristiche del terreno angolo di attrito e coesione (ϕ e c).

In letteratura è possibile trovare diverse formule per il calcolo dei valori di N_c ed N_q .

Per pali in argilla in condizioni non drenate ($\phi=0$, $c=c_u$) si assume in genere per N_c il valore proposto da Skempton pari a 9 (valore in corrispondenza della punta del palo) mentre $N_q=1$. Diversi autori hanno proposto altri valori per il fattore N_c ma in generale le variazioni sono abbastanza contenute.

Diverso è il caso del fattore N_q per il quale diversi autori propongono dei valori spesso molto discordanti fra di loro.

In particolare da prove effettuati su pali realizzati in terreni non coesivi, si vede che la variazione della resistenza alla punta non cresce in modo lineare con la profondità, ma raggiunto un certo valore essa si mantiene pressochè costante. Questo fenomeno è stato spiegato da Vesic mettendo in conto un <<effetto arco>> che si manifesta nei dintorni del palo.

Un modo semplice per tener conto del fatto che la resistenza alla punta non può crescere indefinitamente è quello di considerare il diagramma delle pressioni verticali in corrispondenza del palo opportunamente modificato.

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011

In particolare si assume che la pressione verticale σ_v cresca linearmente (pressione geostatica) fino ad una certa profondità z_c ($\sigma_v = \sigma_c$); superata tale profondità il valore della pressione verticale si mantiene costante e pari a σ_c : in pratica si assume un diagramma bilatero per l'andamento della pressione verticale in corrispondenza del palo.

Il valore di z_c (detta anche profondità critica) dipende dal diametro del palo, D , dalla tecnologia di realizzazione (palo infisso o trivellato) dall'angolo di attrito del terreno ϕ .

Nella determinazione di z_c il valore di ϕ da considerare è funzione del valore dell'angolo di attrito prima dell'installazione del palo, ϕ' , secondo le seguenti relazioni:

Per pali infissi $\phi = 3/4 \phi' + 10$

Per pali trivellati $\phi = \phi' - 3$

A parità di diametro influisce il grado di addensamento del terreno (densità relativa D_r) e la resistenza alla punta cresce con il crescere della densità.

Nella sezione successiva descriveremo le relazioni per la determinazione di N_c ed N_q .

Capacità portante per attrito laterale

La portanza laterale è data dall'integrale esteso a tutta la superficie laterale del palo delle tensioni tangenziali palo-terreno in condizioni limiti:

$$Q_L = \text{Int}(\tau_a) dS$$

dove τ_a è dato dalla nota relazione di Coulomb:

$$\tau_a = c_a + \sigma_h \text{tg } \delta$$

dove c_a è l'adesione palo-terreno, δ è l'angolo di attrito palo-terreno, e σ_h è la tensione orizzontale alla generica profondità z . La tensione orizzontale σ_h è legata alla pressione verticale σ_v tramite il coefficiente di spinta K_s

$$\sigma_h = K_s \sigma_v$$

Indicando con C il perimetro e con L la lunghezza del palo abbiamo:

$$\text{Int}^L (C(c_a + K_s \sigma_v \text{tg } \delta) dz)$$

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011

Analisi del palo soggetto a forze orizzontali (Portanza trasversale)

La resistenza limite laterale di un palo è determinata dal minimo valore fra il carico orizzontale necessario per produrre il collasso del terreno lungo il fusto del palo ed il carico orizzontale necessario per produrre la plasticizzazione del palo. Il primo meccanismo (plasticizzazione del terreno) si verifica nel caso di pali molto rigidi in terreni poco resistenti (meccanismo di palo corto) mentre il secondo meccanismo si verifica nel caso di pali aventi rigidezze non eccessive rispetto al terreno di infissione (meccanismo di palo lungo o intermedio). Nel modello di terreno alla Winkler il terreno viene schematizzato come una serie di molle elastiche indipendenti fra di loro. Le molle che schematizzano il terreno vengono caratterizzate tramite una costante di rigidezza elastica, K_h , espressa in $\text{DaN/cm}^2/\text{cm}$ che rappresenta la pressione (in DaN/cm^2) che bisogna applicare per ottenere lo spostamento di 1 cm. La determinazione di questa costante può essere fatta o tramite prove di carico su piastra o mediante metodi analitici (convenzionali). La variazione della costante di Winkler con la profondità dipende dal tipo di terreno in cui il palo è immerso. Ad esempio nel caso di terreni coesivi in condizioni non drenate K_h assume un valore costante con la profondità mentre nel caso di terreni incoerenti la variazione di K_h è di tipo lineare (crescente con la profondità). In generale l'espressione di K_h assume una forma binomia del tipo:

$$K_h(z) = A + B z^n$$

Per l'analisi di pali caricati trasversalmente si utilizza il modello di Winkler. Il palo viene suddiviso in un determinato numero (100) di elementi tipo trave aventi area ed inerzia pari a quella della sezione trasversale del palo. In corrispondenza di ogni nodo di separazione fra i vari elementi viene inserita una molla orizzontale di opportuna rigidezza che schematizza il terreno. Il comportamento delle molle che schematizzano il terreno non è infinitamente elastico ma è di tipo elastoplastico. La singola molla reagisce fino ad un valore limite di spostamento o di reazione; una volta che è stato superato tale limite la molle non offre ulteriori incrementi di resistenza (diagramma tipo elastoplastico perfetto). Indicando con dy_e la lunghezza del tratto di influenza della molla, con D il diametro del palo la molla avrà una rigidezza pari a:

$$K_m = dy_e D K_k$$

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011

La resistenza limite del terreno rappresenta il valore limite di resistenza che il terreno può esplicitare quando il palo è soggetto ad un carico orizzontale. La resistenza limite $p_u = p_u(z)$ dipende dalle caratteristiche del terreno e dalla geometria del palo. In terreni puramente coesivi ($c = c_u$, $\phi = 0$) la resistenza cresce dal valore 0 in sommità fino ad un valore limite in corrispondenza di una profondità pari a circa 3 diametri. Il valore limite in tal caso è variabile fra 8 e 12 c_u . Nel caso di terreni dotati di attrito e coesione la resistenza limite ad una generica profondità z è rappresentata dalla relazione (Brinch Hansen):

$$P_u = q K_{pq} + c K_{pc}$$

dove:

D diametro del palo

q pressione geostatica alla profondità z

c coesione alla profondità z

K_{pq} , K_{pc} coefficienti funzione dell'angolo di attrito del terreno ϕ e del rapporto z/D .

Broms ha eseguito l'analisi considerando il caso sia di palo vincolato in testa che di palo libero immerso in un mezzo omogeneo. Nel caso di terreni coesivi Broms assume in questo caso un diagramma di resistenza nullo fino ad una profondità pari a $1,5D$ e poi valore costante pari a $9c_u D$. Nel caso di terreni incoerenti Broms assume che la resistenza laterale sia variabile con la profondità dal valore 0 (in testa) fino al valore $3\sigma_v K_p D$ (alla base) essendo K_p il coefficiente di resistenza passiva espresso da $K_p = \tan^2(45^\circ + \phi/2)$.

Geometria della fondazione

Simbologia adottata

<i>Descrizione</i>	Descrizione del palo
<i>Forma</i>	Forma del palo ((C)=Costante, (R)=Rastremato)
<i>X</i>	Ascissa del baricentro del palo espressa in [m]
<i>Y</i>	Ordinata del baricentro del palo espressa in [m]
<i>D</i>	Diametro del palo espresso in [cm]
<i>L</i>	Lunghezza del palo espressa in [m]

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011

Descrizione	Forma	X	Y	D	L
Palo 1000	(C)	0,00	0,00	100,00	12,00

Materiali palo

Calcestruzzo

Tipo	C25/30	
Resistenza caratteristica a compressione R_{ck}	30,000	[N/mm ²]
Peso specifico	24,5170	[kN/mc]
Coeff. di omogeneizzazione	15,00	

Acciaio

Tipo	B450C	
Tensione caratteristica di snervamento	450,000	[N/mm ²]

Coefficienti di sicurezza sui materiali

Coefficiente di sicurezza calcestruzzo	1.50
Fattore riduzione da resistenza cubica a cilindrica	0.83
Fattore di riduzione per carichi di lungo periodo	0.85
Coefficiente di sicurezza acciaio	0.85
Coefficiente di sicurezza sezione	1.50

Caratteristiche pali

Pali in c.a.

Armatura con ferri longitudinali e staffe

Vincolo in testa di tipo INCASTRO

Tipo di palo TRIVELLATO

Contributo sia della portanza laterale sia della portanza di punta

Descrizione terreni e falda

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011

Simbologia adottata

<i>Descrizione</i>	Descrizione terreno
γ	Peso di volume del terreno espresso in [kN/mc]
γ_{sat}	Peso di volume saturo del terreno espresso in [kN/mc]
ϕ	Angolo di attrito interno del terreno espresso in gradi
δ	Angolo di attrito palo-terreno espresso in gradi
c	Coesione del terreno espressa in [N/mm ²]
ca	Adesione del terreno espressa in [N/mm ²]
ϕ_{min}, ϕ_{med}	Angolo di attrito interno del terreno minimo e medio espresso in gradi
$\delta_{min}, \delta_{med}$	Angolo di attrito palo-terreno minimo e medio espresso in gradi
c_{min}, c_{med}	Coesione del terreno minima e media espressa in [N/mm ²]
ca_{min}, ca_{med}	Adesione del terreno minima e media espressa in [N/mm ²]

Parametri caratteristici

Descrizione	γ	γ_{sat}	ϕ	δ	c	ca
Ghiaie di Messina	19,000	23,000	38,00	38,00	0,0000	0,0000

Parametri minimi

Descrizione	ϕ_{min}	δ_{min}	c_{min}	ca_{min}
Ghiaie di Messina	38,00	38,00	0,0000	0,0000

Parametri medi

Descrizione	ϕ_{med}	δ_{med}	c_{med}	ca_{med}
Ghiaie di Messina	38,00	38,00	0,0000	0,0000

Descrizione stratigrafia

Simbologia adottata

N	Identificativo strato
$Z1$	Quota dello strato in corrispondenza del punto di sondaggio n°1 espressa in [m]
$Z2$	Quota dello strato in corrispondenza del punto di sondaggio n°2 espressa in [m]

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO					
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<table border="1" style="width: 100%; border-collapse: collapse;"> <tr> <td style="width: 50%;"><i>Rev</i></td> <td style="width: 50%;"><i>Data</i></td> </tr> <tr> <td style="text-align: center;">F0</td> <td style="text-align: center;">20/06/2011</td> </tr> </table>	<i>Rev</i>	<i>Data</i>	F0	20/06/2011
<i>Rev</i>	<i>Data</i>						
F0	20/06/2011						

Z3 Quota dello strato in corrispondenza del punto di sondaggio n°3 espressa in [m]

Terreno Terreno dello strato

Kw Costante di Winkler espressa in DaN/cm²/cm

Ks Coefficiente di spinta

α Coefficiente di espansione laterale

n°	Z1	Z2	Z3	Terreno	Kw	Ks	α
1	-30,0	-30,0	-25,0	Ghiaie di Messina	10,00	0	1,00

Normativa

N.T.C. 2008

Calcolo secondo: Approccio 1

Simbologia adottata

γ_{Gsfav}	Coefficiente parziale sfavorevole sulle azioni permanenti
γ_{Gfav}	Coefficiente parziale favorevole sulle azioni permanenti
γ_{Qsfav}	Coefficiente parziale sfavorevole sulle azioni variabili
γ_{Qfav}	Coefficiente parziale favorevole sulle azioni variabili
$\gamma_{tan\phi'}$	Coefficiente parziale di riduzione dell'angolo di attrito drenato
γ_c	Coefficiente parziale di riduzione della coesione drenata
γ_{cu}	Coefficiente parziale di riduzione della coesione non drenata
γ_{qu}	Coefficiente parziale di riduzione del carico ultimo
γ_γ	Coefficiente parziale di riduzione della resistenza a compressione uniassiale delle rocce

Coefficienti parziali combinazioni statiche

Coefficienti parziali per le azioni o per l'effetto delle azioni:

Carichi	Effetto		A1	A2
Permanenti	Favorevole	γ_{Gfav}	1,00	1,00
Permanenti	Sfavorevole	γ_{Gsfav}	1,30	1,00
Variabili	Favorevole	γ_{Qfav}	0,00	0,00

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011

Variabili	Sfavorevole	γ_{Qsfav}	1,50	1,30
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Coefficienti parziali per i parametri geotecnici del terreno:

<i>Parametri</i>		<i>M1</i>	<i>M2</i>
Tangente dell'angolo di attrito	$\gamma_{\tan\phi'}$	1,00	1,25
Coesione efficace	$\gamma_{c'}$	1,00	1,25
Resistenza non drenata	γ_{cu}	1,00	1,40
Resistenza a compressione uniassiale	γ_{qu}	1,00	1,60
Peso dell'unità di volume	γ_{γ}	1,00	1,00

Coefficienti parziali combinazioni sismiche

Coefficienti parziali per le azioni o per l'effetto delle azioni:

<i>Carichi</i>	<i>Effetto</i>		<i>A1</i>	<i>A2</i>
Permanenti	Favorevole	γ_{Gfav}	1,00	1,00
Permanenti	Sfavorevole	γ_{Gsfav}	1,00	1,00
Variabili	Favorevole	γ_{Qfav}	0,00	0,00
Variabili	Sfavorevole	γ_{Qsfav}	1,00	1,00

Coefficienti parziali per i parametri geotecnici del terreno:

<i>Parametri</i>		<i>M1</i>	<i>M2</i>
Tangente dell'angolo di attrito	$\gamma_{\tan\phi'}$	1,00	1,25
Coesione efficace	$\gamma_{c'}$	1,00	1,25
Resistenza non drenata	γ_{cu}	1,00	1,40
Resistenza a compressione uniassiale	γ_{qu}	1,00	1,60
Peso dell'unità di volume	γ_{γ}	1,00	1,00

PALI DI FONDAZIONE

CARICHI VERTICALI. Coefficienti parziali γ_R per le verifiche dei pali

Pali trivellati

R1	R2	R3
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		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD	<i>Codice documento</i> SS0558_F0.doc		<i>Rev</i> F0	<i>Data</i> 20/06/2011

Punta	γ_b	1,00	1,70	1,35
Laterale compressione	γ_s	1,00	1,45	1,15
Totale compressione	γ_t	1,00	1,60	1,30
Laterale trazione	γ_{st}	1,00	1,60	1,25

CARICHI TRASVERSALI. Coefficienti parziali γ_T per le verifiche dei pali.

	R1	R2	R3
γ_T	1,00	1,60	1,30

Coefficienti di riduzione ξ per la determinazione della resistenza caratteristica dei pali

Numero di verticali indagate 1 $\xi_3=1,70$ $\xi_4=1,70$

Coeff. di combinazione $\Psi_0= 0,70$ $\Psi_1= 0,50$ $\Psi_2= 0,20$

Per le verifiche geotecniche specifiche si rimanda all'elaborato CG0700PRBDSSC00SPS4000001B-01 "Relazione Geotecnica".

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011

11 TABULATI

11.1 ANALISI SCATOLARE COMBINAZIONI STR, SISMICA E GEO

11.1.1 Dati di input

Table: Analysis Case Definitions

Case Text	Type Text	InitialCond Text	ModalCase Text
DEAD	LinStatic	Zero	
MODAL	LinModal	Zero	
PERM	LinStatic	Zero	
SPINTARIPOSO	LinStatic	Zero	
SPINTAATTIVA	LinStatic	Zero	
SOVRACCARICO	LinStatic	Zero	
ACC	LinStatic	Zero	
FRENAMENTO	LinStatic	Zero	
RIPOSOSX	LinStatic	Zero	
RIPOSODX	LinStatic	Zero	
ATTIVASX	LinStatic	Zero	
ATTIVADX	LinStatic	Zero	
OKABESX	LinStatic	Zero	

Table: Area Section Properties, Part 1 of 4

Section Text	Material Text	MatAngle Degrees	AreaType Text	Type Text	Thickness m	BendThick m	Arc Degrees
ASEC1	CONC	0,000	Shell	Shell-Thin	1,000000	1,000000	

Table: Area Section Properties, Part 2 of 4

Section Text	InComp Yes/No	CoordSys Text	Color Text	TotalWt KN	TotalMass KN-s2/m	F11Mod Unitless	F22Mod Unitless
ASEC1			White	0,000	0,00	1,000000	1,000000

Table: Area Section Properties, Part 3 of 4

Section Text	F12Mod Unitless	M11Mod Unitless	M22Mod Unitless	M12Mod Unitless	V13Mod Unitless	V23Mod Unitless	MMod Unitless
ASEC1	1,000000	1,000000	1,000000	1,000000	1,000000	1,000000	1,000000

Table: Area Section Properties, Part 4 of 4

Section Text	WMod Unitless
ASEC1	1,000000

Table: Frame Section Assignments

Frame Text	SectionType Text	AutoSelect Text	AnalSect Text	DesignSect Text	MatProp Text
6	Circle	N.A.	PALO	PALO	Default
7	Rectangular	N.A.	CORDOLO	CORDOLO	Default
8	Rectangular	N.A.	CORDOLO	CORDOLO	Default

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
		RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD	<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0

Frame Text	SectionType Text	AutoSelect Text	AnalSect Text	DesignSect Text	MatProp Text
9	Circle	N.A.	PALO	PALO	Default
10	Circle	N.A.	PALO	PALO	Default
11	Circle	N.A.	PALO	PALO	Default
19	Rectangular	N.A.	SOLETTASUP	SOLETTASUP	Default
22	Rectangular	N.A.	SOLETTAINF	SOLETTAINF	Default
23	Rectangular	N.A.	SOLETTAINF	SOLETTAINF	Default

Table: Frame Section Properties 01 - General, Part 1 of 6

SectionName Text	Material Text	Shape Text	t3 m	t2 m	tf m	tw m
CORDOLO	CONC	Rectangular	1,400000	1,000000		
FSEC1	CONC	Rectangular	1,000000	7,500000		
FSEC2	CONC	Rectangular	1,000000	7,500000		
MUROLATERALE	CONC	Rectangular	1,000000	1,000000		
PALO	CONC	Circle	1,000000			
SOLETTAINF	CONC	Rectangular	1,000000	1,000000		
SOLETTASUP	CONC	Rectangular	0,800000	1,000000		

Table: Frame Section Properties 01 - General, Part 2 of 6

SectionName Text	t2b m	tfb m	Area m2	TorsConst m4	I33 m4	I22 m4	AS2 m2
CORDOLO			1,400000	0,261222	0,228667	0,116667	1,166667
FSEC1			7,500000	2,290006	0,625000	35,156250	6,250000
FSEC2			7,500000	2,290006	0,625000	35,156250	6,250000
MUROLATERALE			1,000000	0,140833	0,083333	0,083333	0,833333
PALO			0,785398	0,098175	0,049087	0,049087	0,706858
SOLETTAINF			1,000000	0,140833	0,083333	0,083333	0,833333
SOLETTASUP			0,800000	0,087587	0,042667	0,066667	0,666667

Table: Frame Section Properties 01 - General, Part 3 of 6

SectionName Text	AS3 m2	S33 m3	S22 m3	Z33 m3	Z22 m3	R33 m	R22 m
CORDOLO	1,166667	0,326667	0,233333	0,490000	0,350000	0,404145	0,288675
FSEC1	6,250000	1,250000	9,375000	1,875000	14,062500	0,288675	2,165064
FSEC2	6,250000	1,250000	9,375000	1,875000	14,062500	0,288675	2,165064
MUROLATERALE	0,833333	0,166667	0,166667	0,250000	0,250000	0,288675	0,288675
PALO	0,706858	0,098175	0,098175	0,166667	0,166667	0,250000	0,250000
SOLETTAINF	0,833333	0,166667	0,166667	0,250000	0,250000	0,288675	0,288675
SOLETTASUP	0,666667	0,106667	0,133333	0,160000	0,200000	0,230940	0,288675

Table: Frame Section Properties 01 - General, Part 4 of 6

SectionName Text	ConcCol Yes/No	ConcBeam Yes/No	Color Text	TotalWt KN	TotalMass KN-s2/m	FromFile Yes/No	AMod Unitless
CORDOLO	Yes	No	White	92,367	9,42	No	1,000000
FSEC1	Yes	No	Magenta	0,000	0,00	No	1,000000
FSEC2	No	No	Magenta	0,000	0,00	No	1,000000
MUROLATERALE	Yes	No	Gray8Dark	0,000	0,00	No	1,000000
PALO	Yes	No	Magenta	366,427	37,37	No	1,000000
SOLETTAINF	Yes	No	Gray8Dark	162,586	16,58	No	1,000000
SOLETTASUP	Yes	No	Gray8Dark	130,068	13,26	No	1,000000

Table: Frame Section Properties 01 - General, Part 5 of 6

SectionName	A2Mod	A3Mod	JMod	I2Mod	I3Mod	MMod	WMod
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		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011

Text	Unitless	Unitless	Unitless	Unitless	Unitless	Unitless	Unitless
CORDOLO	1,000000	1,000000	1,000000	1,000000	1,000000	1,000000	1,000000
FSEC1	1,000000	1,000000	1,000000	1,000000	1,000000	1,000000	1,000000
FSEC2	1,000000	1,000000	1,000000	1,000000	1,000000	1,000000	1,000000
MUROLATERALE	1,000000	1,000000	1,000000	1,000000	1,000000	1,000000	1,000000
PALO	1,000000	1,000000	1,000000	1,000000	1,000000	1,000000	1,000000
SOLETTAINF	1,000000	1,000000	1,000000	1,000000	1,000000	1,000000	1,000000
SOLETTASUP	1,000000	1,000000	1,000000	1,000000	1,000000	1,000000	1,000000

Table: Frame Section Properties 01 - General, Part 6 of 6

SectionName	SectInFile	FileName
Text	Text	Text
CORDOLO		
FSEC1		
FSEC2		
MUROLATERALE		
PALO		
SOLETTAINF		
SOLETTASUP		

Table: Load Case Definitions

LoadCase	DesignType	SelfWtMult	AutoLoad
Text	Text	Unitless	Text
DEAD	DEAD	1,000000	
PERM	DEAD	0,000000	
SOVRACCARICO	LIVE	0,000000	
ACC	LIVE	0,000000	
FRENAMENTO	LIVE	0,000000	
RIPOSOSX	DEAD	0,000000	
RIPOSODX	DEAD	0,000000	
ATTIVASX	DEAD	0,000000	
ATTIVADX	DEAD	0,000000	
OKABESX	QUAKE	0,000000	None

Table: Material Properties 04 - Design Concrete

Material	Fc	RebarFy	RebarFys	LtWtConc	LtWtFact
Text	KN/m2	KN/m2	KN/m2	Yes/No	Unitless
CONC	27579,03	413685,47	275790,32	No	1,000000

Table: Frame Loads - Distributed, Part 1 of 2

Frame	LoadCase	CoordSys	Type	Dir	DistType	RelDistA
Text	Text	Text	Text	Text	Text	Unitless
19	PERM	GLOBAL	Force	Z	RelDist	0,0000
19	ACC	GLOBAL	Force	Z	RelDist	0,0000
6	RIPOSODX	GLOBAL	Force	Y	RelDist	0,0000
6	ATTIVADX	GLOBAL	Force	Y	RelDist	0,0000
7	RIPOSODX	GLOBAL	Force	Y	RelDist	0,0000
7	ATTIVADX	GLOBAL	Force	Y	RelDist	0,0000
8	RIPOSOSX	GLOBAL	Force	Y	RelDist	0,0000
8	ATTIVASX	GLOBAL	Force	Y	RelDist	0,0000
8	SOVRACCARICO	GLOBAL	Force	Y	RelDist	0,0000
9	RIPOSOSX	GLOBAL	Force	Y	RelDist	0,0000
9	ATTIVASX	GLOBAL	Force	Y	RelDist	0,0000
9	SOVRACCARICO	GLOBAL	Force	Y	RelDist	0,0000

		Ponte sullo Stretto di Messina PROGETTO DEFINITIVO		
RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD		<i>Codice documento</i> SS0558_F0.doc	<i>Rev</i> F0	<i>Data</i> 20/06/2011

Table: Frame Loads - Distributed, Part 2 of 2

Frame Text	LoadCase Text	RelDistB Unitless	AbsDistA m	AbsDistB m	FOverLA KN/m	FOverLB KN/m
19	PERM	1,0000	0,00000	6,90000	-52,63	-52,63
19	ACC	1,0000	0,00000	6,90000	-25,82	-25,82
6	RIPOSODX	1,0000	0,00000	4,90000	86,16	39,61
6	ATTIVADX	1,0000	0,00000	4,90000	56,86	26,14
7	RIPOSODX	1,0000	0,00000	1,40000	39,61	26,31
7	ATTIVADX	1,0000	0,00000	1,40000	26,14	17,36
8	RIPOSOSX	1,0000	0,00000	1,40000	-26,31	-39,61
8	ATTIVASX	1,0000	0,00000	1,40000	-17,36	-26,14
8	SOVRACCARICO	1,0000	0,00000	1,40000	-52,77	-43,57
9	RIPOSOSX	1,0000	0,00000	4,90000	-39,61	-86,16
9	ATTIVASX	1,0000	0,00000	4,90000	-26,14	-56,86
9	SOVRACCARICO	1,0000	0,00000	4,90000	-43,57	-26,99

Table: Frame Loads - Point, Part 1 of 2

Frame Text	LoadCase Text	CoordSys Text	Type Text	Dir Text	DistType Text	RelDist Unitless
9	OKABESX	GLOBAL	Force	Y	RelDist	0,3571

Table: Frame Loads - Point, Part 2 of 2

Frame Text	LoadCase Text	AbsDist m	Force KN
9	OKABESX	1,75000	-649,000

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Table: Element Forces - Frames, Part 1 of 2

Frame Text	Station m	OutputCase Text	CaseType Text	P KN	V2 KN	V3 KN	T KN-m	M2 KN-m
6	0,00000	COMB1	Combination	-727,684	47,826	-2,896E-15	-1,112E-16	1,315E-14
6	2,45000	COMB1	Combination	-668,741	-132,911	7,926E-15	-1,112E-16	6,303E-15
6	4,90000	COMB1	Combination	-609,798	-257,199	1,537E-14	-1,112E-16	-2,292E-14
6	0,00000	COMB2	Combination	-754,288	-94,746	5,629E-15	-1,527E-16	2,357E-14
6	2,45000	COMB2	Combination	-695,345	-185,115	1,104E-14	-1,527E-16	2,805E-15
6	4,90000	COMB2	Combination	-636,402	-247,259	1,476E-14	-1,527E-16	-2,915E-14
6	0,00000	COMB3	Combination	-727,684	160,980	-9,671E-15	-1,112E-16	8,584E-15
6	2,45000	COMB3	Combination	-668,741	-112,891	6,727E-15	-1,112E-16	1,114E-14
6	4,90000	COMB3	Combination	-609,798	-301,225	1,800E-14	-1,112E-16	-2,020E-14
6	0,00000	COMB4	Combination	-767,998	-55,061	3,246E-15	-1,740E-16	2,436E-14
6	2,45000	COMB4	Combination	-709,055	-191,996	1,145E-14	-1,740E-16	5,844E-15
6	4,90000	COMB4	Combination	-650,112	-286,163	1,708E-14	-1,740E-16	-2,963E-14
6	0,00000	COMB5	Combination	-467,195	80,554	-4,854E-15	-1,062E-16	1,221E-14
6	2,45000	COMB5	Combination	-421,854	-102,027	6,078E-15	-1,062E-16	1,001E-14
6	4,90000	COMB5	Combination	-376,513	-227,583	1,36E-14	-1,062E-16	-1,478E-14
6	0,00000	COMB6	Combination	-727,684	-171,762	1,025E-14	-1,112E-16	2,202E-14
6	2,45000	COMB6	Combination	-668,741	-171,762	1,025E-14	-1,112E-16	-3,093E-15
6	4,90000	COMB6	Combination	-609,798	-171,762	1,025E-14	-1,112E-16	-2,821E-14
6	0,00000	COMB7	Combination	-602,228	44,533	-2,694E-15	-9,475E-17	1,103E-14
6	2,45000	COMB7	Combination	-556,888	-112,105	6,685E-15	-9,475E-17	5,545E-15
6	4,90000	COMB7	Combination	-511,547	-219,822	1,313E-14	-9,475E-17	-1,933E-14
6	0,00000	COMB8	Combination	-625,285	-79,029	4,694E-15	-1,307E-16	2,006E-14
6	2,45000	COMB8	Combination	-579,944	-157,348	9,383E-15	-1,307E-16	2,514E-15
6	4,90000	COMB8	Combination	-534,604	-211,207	1,261E-14	-1,307E-16	-2,472E-14
6	0,00000	COMB9	Combination	-602,228	142,600	-8,566E-15	-9,475E-17	7,071E-15
6	2,45000	COMB9	Combination	-556,888	-94,754	5,646E-15	-9,475E-17	9,741E-15
6	4,90000	COMB9	Combination	-511,547	-257,978	1,542E-14	-9,475E-17	-1,697E-14
6	0,00000	COMB10	Combination	-637,167	-44,635	2,629E-15	-1,492E-16	2,075E-14
6	2,45000	COMB10	Combination	-591,827	-163,312	9,735E-15	-1,492E-16	5,147E-15
6	4,90000	COMB10	Combination	-546,486	-244,924	1,462E-14	-1,492E-16	-2,514E-14
6	0,00000	COMB11	Combination	-602,228	-145,776	8,701E-15	-9,475E-17	1,872E-14
6	2,45000	COMB11	Combination	-556,888	-145,776	8,701E-15	-9,475E-17	-2,597E-15
6	4,90000	COMB11	Combination	-511,547	-145,776	8,701E-15	-9,475E-17	-2,391E-14
6	0,00000	COMB12	Combination	-490,614	42,129	-2,540E-15	-6,179E-17	7,012E-15
6	2,45000	COMB12	Combination	-445,273	-78,362	4,674E-15	-6,179E-17	3,938E-15
6	4,90000	COMB12	Combination	-399,933	-161,221	9,635E-15	-6,179E-17	-1,405E-14
6	0,00000	COMB13	Combination	-383,473	101,287	-6,065E-15	0,0000	-2,396E-15
6	2,45000	COMB13	Combination	-338,132	-19,204	1,150E-15	0,0000	3,165E-15
6	4,90000	COMB13	Combination	-292,791	-102,063	6,111E-15	0,0000	-6,190E-15
6	0,00000	COMB14	Combination	-508,350	-52,919	3,143E-15	-8,941E-17	1,395E-14
6	2,45000	COMB14	Combination	-463,010	-113,164	6,750E-15	-8,941E-17	1,606E-15
6	4,90000	COMB14	Combination	-417,669	-154,594	9,230E-15	-8,941E-17	-1,820E-14
6	0,00000	COMB15	Combination	-401,209	6,240	-3,816E-16	-2,762E-17	4,547E-15
6	2,45000	COMB15	Combination	-355,868	-54,006	3,226E-15	-2,762E-17	8,328E-16
6	4,90000	COMB15	Combination	-310,527	-95,435	5,706E-15	-2,762E-17	-1,034E-14
6	0,00000	COMB16	Combination	-490,614	117,565	-7,057E-15	-6,179E-17	3,965E-15
6	2,45000	COMB16	Combination	-445,273	-65,015	3,875E-15	-6,179E-17	7,166E-15
6	4,90000	COMB16	Combination	-399,933	-190,571	1,139E-14	-6,179E-17	-1,223E-14
6	0,00000	COMB17	Combination	-383,473	176,723	-1,058E-14	0,0000	-5,443E-15
6	2,45000	COMB17	Combination	-338,132	5,857	3,507E-16	0,0000	6,392E-15
6	4,90000	COMB17	Combination	-292,791	-131,413	7,868E-15	0,0000	-4,373E-15
6	0,00000	COMB18	Combination	-517,490	-26,462	1,554E-15	-1,036E-16	1,448E-14
6	2,45000	COMB18	Combination	-472,150	-117,752	7,020E-15	-1,036E-16	3,632E-15
6	4,90000	COMB18	Combination	-426,809	-180,530	1,078E-14	-1,036E-16	-1,852E-14
6	0,00000	COMB19	Combination	-410,349	32,696	-1,970E-15	-4,185E-17	5,077E-15
6	2,45000	COMB19	Combination	-365,008	-58,594	3,496E-15	-4,185E-17	2,859E-15
6	4,90000	COMB19	Combination	-319,668	-121,372	7,255E-15	-4,185E-17	-1,066E-14

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

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SS0558_F0.doc

Rev
F0

Data
20/06/2011

Frame Text	Station m	OutputCase Text	CaseType Text	P KN	V2 KN	V3 KN	T KN-m	M2 KN-m
6	0,00000	COMB20	Combination	-490,614	-104,262	6,225E-15	-6,179E-17	1,293E-14
6	2,45000	COMB20	Combination	-445,273	-104,262	6,225E-15	-6,179E-17	-2,325E-15
6	4,90000	COMB20	Combination	-399,933	-104,262	6,225E-15	-6,179E-17	-1,758E-14
6	0,00000	COMB21	Combination	-383,473	-45,104	2,701E-15	0,0000	3,518E-15
6	2,45000	COMB21	Combination	-338,132	-45,104	2,701E-15	0,0000	-3,099E-15
6	4,90000	COMB21	Combination	-292,791	-45,104	2,701E-15	0,0000	-9,715E-15
7	0,00000	COMB1	Combination	-609,798	-257,199	1,537E-14	-1,112E-16	-2,292E-14
7	0,70000	COMB1	Combination	-579,778	-282,342	1,687E-14	-1,112E-16	-3,422E-14
7	1,40000	COMB1	Combination	-549,759	-302,874	1,810E-14	-1,112E-16	-4,648E-14
7	0,00000	COMB2	Combination	-636,402	-247,259	1,476E-14	-1,527E-16	-2,915E-14
7	0,70000	COMB2	Combination	-606,383	-259,830	1,551E-14	-1,527E-16	-3,975E-14
7	1,40000	COMB2	Combination	-576,363	-270,096	1,613E-14	-1,527E-16	-5,083E-14
7	0,00000	COMB3	Combination	-609,798	-301,225	1,800E-14	-1,112E-16	-2,020E-14
7	0,70000	COMB3	Combination	-579,778	-339,324	2,028E-14	-1,112E-16	-3,362E-14
7	1,40000	COMB3	Combination	-549,759	-370,441	2,215E-14	-1,112E-16	-4,850E-14
7	0,00000	COMB4	Combination	-650,112	-286,163	1,708E-14	-1,740E-16	-2,963E-14
7	0,70000	COMB4	Combination	-620,093	-305,213	1,822E-14	-1,740E-16	-4,200E-14
7	1,40000	COMB4	Combination	-590,073	-320,771	1,916E-14	-1,740E-16	-5,509E-14
7	0,00000	COMB5	Combination	-376,513	-227,583	1,36E-14	-1,062E-16	-1,478E-14
7	0,70000	COMB5	Combination	-353,421	-252,982	1,512E-14	-1,062E-16	-2,485E-14
7	1,40000	COMB5	Combination	-330,329	-273,727	1,636E-14	-1,062E-16	-3,588E-14
7	0,00000	COMB6	Combination	-609,798	-171,762	1,025E-14	-1,112E-16	-2,821E-14
7	0,70000	COMB6	Combination	-579,778	-171,762	1,025E-14	-1,112E-16	-3,539E-14
7	1,40000	COMB6	Combination	-549,759	-171,762	1,025E-14	-1,112E-16	-4,256E-14
7	0,00000	COMB7	Combination	-511,547	-219,822	1,313E-14	-9,475E-17	-1,933E-14
7	0,70000	COMB7	Combination	-488,455	-241,612	1,444E-14	-9,475E-17	-2,900E-14
7	1,40000	COMB7	Combination	-465,363	-259,407	1,550E-14	-9,475E-17	-3,949E-14
7	0,00000	COMB8	Combination	-534,604	-211,207	1,261E-14	-1,307E-16	-2,472E-14
7	0,70000	COMB8	Combination	-511,512	-222,102	1,326E-14	-1,307E-16	-3,379E-14
7	1,40000	COMB8	Combination	-488,420	-230,999	1,379E-14	-1,307E-16	-4,326E-14
7	0,00000	COMB9	Combination	-511,547	-257,978	1,542E-14	-9,475E-17	-1,697E-14
7	0,70000	COMB9	Combination	-488,455	-290,997	1,740E-14	-9,475E-17	-2,848E-14
7	1,40000	COMB9	Combination	-465,363	-317,965	1,901E-14	-9,475E-17	-4,124E-14
7	0,00000	COMB10	Combination	-546,486	-244,924	1,462E-14	-1,492E-16	-2,514E-14
7	0,70000	COMB10	Combination	-523,394	-261,434	1,561E-14	-1,492E-16	-3,573E-14
7	1,40000	COMB10	Combination	-500,302	-274,918	1,642E-14	-1,492E-16	-4,695E-14
7	0,00000	COMB11	Combination	-511,547	-145,776	8,701E-15	-9,475E-17	-2,391E-14
7	0,70000	COMB11	Combination	-488,455	-145,776	8,701E-15	-9,475E-17	-3,001E-14
7	1,40000	COMB11	Combination	-465,363	-145,776	8,701E-15	-9,475E-17	-3,610E-14
7	0,00000	COMB12	Combination	-399,933	-161,221	9,635E-15	-6,179E-17	-1,405E-14
7	0,70000	COMB12	Combination	-376,841	-177,982	1,064E-14	-6,179E-17	-2,116E-14
7	1,40000	COMB12	Combination	-353,749	-191,671	1,146E-14	-6,179E-17	-2,890E-14
7	0,00000	COMB13	Combination	-292,791	-102,063	6,111E-15	0,0000	-6,190E-15
7	0,70000	COMB13	Combination	-269,700	-118,824	7,115E-15	0,0000	-1,083E-14
7	1,40000	COMB13	Combination	-246,608	-132,513	7,934E-15	0,0000	-1,611E-14
7	0,00000	COMB14	Combination	-417,669	-154,594	9,230E-15	-8,941E-17	-1,820E-14
7	0,70000	COMB14	Combination	-394,577	-162,974	9,732E-15	-8,941E-17	-2,484E-14
7	1,40000	COMB14	Combination	-371,485	-169,819	1,014E-14	-8,941E-17	-3,180E-14
7	0,00000	COMB15	Combination	-310,527	-95,435	5,706E-15	-2,762E-17	-1,034E-14
7	0,70000	COMB15	Combination	-287,436	-103,816	6,208E-15	-2,762E-17	-1,451E-14
7	1,40000	COMB15	Combination	-264,344	-110,660	6,618E-15	-2,762E-17	-1,901E-14
7	0,00000	COMB16	Combination	-399,933	-190,571	1,139E-14	-6,179E-17	-1,223E-14
7	0,70000	COMB16	Combination	-376,841	-215,971	1,291E-14	-6,179E-17	-2,076E-14
7	1,40000	COMB16	Combination	-353,749	-236,715	1,416E-14	-6,179E-17	-3,025E-14
7	0,00000	COMB17	Combination	-292,791	-131,413	7,868E-15	0,0000	-4,373E-15
7	0,70000	COMB17	Combination	-269,700	-156,813	9,389E-15	0,0000	-1,043E-14
7	1,40000	COMB17	Combination	-246,608	-177,557	1,063E-14	0,0000	-1,745E-14
7	0,00000	COMB18	Combination	-426,809	-180,530	1,078E-14	-1,036E-16	-1,852E-14
7	0,70000	COMB18	Combination	-403,717	-193,230	1,154E-14	-1,036E-16	-2,634E-14
7	1,40000	COMB18	Combination	-380,625	-203,602	1,216E-14	-1,036E-16	-3,464E-14
7	0,00000	COMB19	Combination	-319,668	-121,372	7,255E-15	-4,185E-17	-1,066E-14
7	0,70000	COMB19	Combination	-296,576	-134,072	8,015E-15	-4,185E-17	-1,601E-14
7	1,40000	COMB19	Combination	-273,484	-144,444	8,636E-15	-4,185E-17	-2,185E-14

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

Codice documento
SS0558_F0.doc

Rev
F0

Data
20/06/2011

Frame Text	Station m	OutputCase Text	CaseType Text	P KN	V2 KN	V3 KN	T KN-m	M2 KN-m
7	0,00000	COMB20	Combination	-399,933	-104,262	6,225E-15	-6,179E-17	-1,758E-14
7	0,70000	COMB20	Combination	-376,841	-104,262	6,225E-15	-6,179E-17	-2,193E-14
7	1,40000	COMB20	Combination	-353,749	-104,262	6,225E-15	-6,179E-17	-2,629E-14
7	0,00000	COMB21	Combination	-292,791	-45,104	2,701E-15	0,0000	-9,715E-15
7	0,70000	COMB21	Combination	-269,700	-45,104	2,701E-15	0,0000	-1,161E-14
7	1,40000	COMB21	Combination	-246,608	-45,104	2,701E-15	0,0000	-1,350E-14
8	0,00000	COMB1	Combination	-404,564	302,874	-1,817E-14	-1,112E-16	-1,737E-14
8	0,70000	COMB1	Combination	-434,583	234,648	-1,408E-14	-1,112E-16	-6,081E-15
8	1,40000	COMB1	Combination	-464,603	166,158	-9,981E-15	-1,112E-16	2,342E-15
8	0,00000	COMB2	Combination	-377,960	270,096	-1,622E-14	-1,527E-16	-1,106E-14
8	0,70000	COMB2	Combination	-407,979	201,869	-1,213E-14	-1,527E-16	-1,136E-15
8	1,40000	COMB2	Combination	-437,998	133,380	-8,030E-15	-1,527E-16	5,921E-15
8	0,00000	COMB3	Combination	-404,564	370,441	-2,221E-14	-1,112E-16	-1,939E-14
8	0,70000	COMB3	Combination	-434,583	291,630	-1,749E-14	-1,112E-16	-5,481E-15
8	1,40000	COMB3	Combination	-464,603	210,184	-1,262E-14	-1,112E-16	5,067E-15
8	0,00000	COMB4	Combination	-364,249	320,771	-1,926E-14	-1,740E-16	-9,825E-15
8	0,70000	COMB4	Combination	-394,269	241,960	-1,454E-14	-1,740E-16	2,012E-15
8	1,40000	COMB4	Combination	-424,288	160,514	-9,661E-15	-1,740E-16	1,049E-14
8	0,00000	COMB5	Combination	-198,518	273,727	-1,642E-14	-1,062E-16	-9,502E-15
8	0,70000	COMB5	Combination	-221,61	266,661	-1,6E-14	-1,062E-16	1,842E-15
8	1,40000	COMB5	Combination	-244,701	260,239	-1,561E-14	-1,062E-16	1,29E-14
8	0,00000	COMB6	Combination	-404,564	171,762	-1,032E-14	-1,112E-16	-1,345E-14
8	0,70000	COMB6	Combination	-434,583	124,068	-7,461E-15	-1,112E-16	-7,245E-15
8	1,40000	COMB6	Combination	-464,603	80,721	-4,865E-15	-1,112E-16	-2,946E-15
8	0,00000	COMB7	Combination	-341,678	259,407	-1,556E-14	-9,475E-17	-1,469E-14
8	0,70000	COMB7	Combination	-364,770	200,984	-1,206E-14	-9,475E-17	-5,024E-15
8	1,40000	COMB7	Combination	-387,862	142,268	-8,546E-15	-9,475E-17	2,190E-15
8	0,00000	COMB8	Combination	-318,621	230,999	-1,387E-14	-1,307E-16	-9,223E-15
8	0,70000	COMB8	Combination	-341,713	172,576	-1,037E-14	-1,307E-16	-7,385E-16
8	1,40000	COMB8	Combination	-364,805	113,861	-6,855E-15	-1,307E-16	5,292E-15
8	0,00000	COMB9	Combination	-341,678	317,965	-1,907E-14	-9,475E-17	-1,644E-14
8	0,70000	COMB9	Combination	-364,770	250,369	-1,502E-14	-9,475E-17	-4,504E-15
8	1,40000	COMB9	Combination	-387,862	180,424	-1,083E-14	-9,475E-17	4,551E-15
8	0,00000	COMB10	Combination	-306,739	274,918	-1,650E-14	-1,492E-16	-8,154E-15
8	0,70000	COMB10	Combination	-329,831	207,321	-1,246E-14	-1,492E-16	1,990E-15
8	1,40000	COMB10	Combination	-352,923	137,377	-8,269E-15	-1,492E-16	9,252E-15
8	0,00000	COMB11	Combination	-341,678	145,776	-8,756E-15	-9,475E-17	-1,130E-14
8	0,70000	COMB11	Combination	-364,770	105,148	-6,323E-15	-9,475E-17	-6,033E-15
8	1,40000	COMB11	Combination	-387,862	68,222	-4,112E-15	-9,475E-17	-2,394E-15
8	0,00000	COMB12	Combination	-273,085	191,671	-1,149E-14	-6,179E-17	-1,273E-14
8	0,70000	COMB12	Combination	-296,177	151,485	-9,088E-15	-6,179E-17	-5,523E-15
8	1,40000	COMB12	Combination	-319,269	110,642	-6,643E-15	-6,179E-17	-1,515E-17
8	0,00000	COMB13	Combination	-246,608	132,513	-7,934E-15	0,0000	-1,611E-14
8	0,70000	COMB13	Combination	-269,700	118,824	-7,115E-15	0,0000	-1,083E-14
8	1,40000	COMB13	Combination	-292,791	102,063	-6,111E-15	0,0000	-6,190E-15
8	0,00000	COMB14	Combination	-255,349	169,819	-1,019E-14	-8,941E-17	-8,523E-15
8	0,70000	COMB14	Combination	-278,441	129,633	-7,788E-15	-8,941E-17	-2,227E-15
8	1,40000	COMB14	Combination	-301,533	88,790	-5,342E-15	-8,941E-17	2,371E-15
8	0,00000	COMB15	Combination	-228,872	110,660	-6,634E-15	-2,762E-17	-1,190E-14
8	0,70000	COMB15	Combination	-251,964	96,972	-5,814E-15	-2,762E-17	-7,533E-15
8	1,40000	COMB15	Combination	-275,055	80,210	-4,811E-15	-2,762E-17	-3,804E-15
8	0,00000	COMB16	Combination	-273,085	236,715	-1,419E-14	-6,179E-17	-1,407E-14
8	0,70000	COMB16	Combination	-296,177	189,474	-1,136E-14	-6,179E-17	-5,123E-15
8	1,40000	COMB16	Combination	-319,269	139,993	-8,400E-15	-6,179E-17	1,802E-15
8	0,00000	COMB17	Combination	-246,608	177,557	-1,063E-14	0,0000	-1,745E-14
8	0,70000	COMB17	Combination	-269,700	156,813	-9,389E-15	0,0000	-1,043E-14
8	1,40000	COMB17	Combination	-292,791	131,413	-7,868E-15	0,0000	-4,373E-15
8	0,00000	COMB18	Combination	-246,209	203,602	-1,222E-14	-1,036E-16	-7,700E-15
8	0,70000	COMB18	Combination	-269,301	156,361	-9,392E-15	-1,036E-16	-1,279E-16
8	1,40000	COMB18	Combination	-292,392	106,879	-6,429E-15	-1,036E-16	5,417E-15
8	0,00000	COMB19	Combination	-219,732	144,444	-8,661E-15	-4,185E-17	-1,108E-14
8	0,70000	COMB19	Combination	-242,823	123,699	-7,419E-15	-4,185E-17	-5,434E-15
8	1,40000	COMB19	Combination	-265,915	98,300	-5,898E-15	-4,185E-17	-7,571E-16

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

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Rev
F0

Data
20/06/2011

Frame Text	Station m	OutputCase Text	CaseType Text	P KN	V2 KN	V3 KN	T KN-m	M2 KN-m
8	0,00000	COMB20	Combination	-273,085	104,262	-6,261E-15	-6,179E-17	-1,012E-14
8	0,70000	COMB20	Combination	-296,177	77,766	-4,674E-15	-6,179E-17	-6,299E-15
8	1,40000	COMB20	Combination	-319,269	53,684	-3,232E-15	-6,179E-17	-3,541E-15
8	0,00000	COMB21	Combination	-246,608	45,104	-2,701E-15	0,0000	-1,350E-14
8	0,70000	COMB21	Combination	-269,700	45,104	-2,701E-15	0,0000	-1,161E-14
8	1,40000	COMB21	Combination	-292,791	45,104	-2,701E-15	0,0000	-9,715E-15
9	0,00000	COMB1	Combination	-464,603	166,158	-9,981E-15	-1,112E-16	2,342E-15
9	2,45000	COMB1	Combination	-523,546	-88,529	5,268E-15	-1,112E-16	8,470E-15
9	4,90000	COMB1	Combination	-582,488	-372,244	2,226E-14	-1,112E-16	-2,489E-14
9	0,00000	COMB2	Combination	-437,998	133,380	-8,030E-15	-1,527E-16	5,921E-15
9	2,45000	COMB2	Combination	-496,941	-121,307	7,219E-15	-1,527E-16	7,270E-15
9	4,90000	COMB2	Combination	-555,884	-405,022	2,421E-14	-1,527E-16	-3,087E-14
9	0,00000	COMB3	Combination	-464,603	210,184	-1,262E-14	-1,112E-16	5,067E-15
9	2,45000	COMB3	Combination	-523,546	-108,549	6,467E-15	-1,112E-16	1,331E-14
9	4,90000	COMB3	Combination	-582,488	-485,398	2,903E-14	-1,112E-16	-2,946E-14
9	0,00000	COMB4	Combination	-424,288	160,514	-9,661E-15	-1,740E-16	1,049E-14
9	2,45000	COMB4	Combination	-483,231	-158,219	9,423E-15	-1,740E-16	1,149E-14
9	4,90000	COMB4	Combination	-542,174	-535,068	3,199E-14	-1,740E-16	-3,852E-14
9	0,00000	COMB5	Combination	-244,701	260,239	-1,561E-14	-1,062E-16	1,29E-14
9	2,45000	COMB5	Combination	-290,042	-408,079	2,44E-14	-1,062E-16	2,249E-14
9	4,90000	COMB5	Combination	-335,383	-423,335	2,532E-14	-1,062E-16	-3,847E-14
9	0,00000	COMB6	Combination	-464,603	80,721	-4,865E-15	-1,112E-16	-2,946E-15
9	2,45000	COMB6	Combination	-523,546	-49,678	2,942E-15	-1,112E-16	-9,255E-16
9	4,90000	COMB6	Combination	-582,488	-152,657	9,108E-15	-1,112E-16	-1,602E-14
9	0,00000	COMB7	Combination	-387,862	142,268	-8,546E-15	-9,475E-17	2,190E-15
9	2,45000	COMB7	Combination	-433,203	-76,528	4,555E-15	-9,475E-17	7,391E-15
9	4,90000	COMB7	Combination	-478,543	-320,889	1,919E-14	-9,475E-17	-2,138E-14
9	0,00000	COMB8	Combination	-364,805	113,861	-6,855E-15	-1,307E-16	5,292E-15
9	2,45000	COMB8	Combination	-410,146	-104,936	6,245E-15	-1,307E-16	6,352E-15
9	4,90000	COMB8	Combination	-455,487	-349,297	2,088E-14	-1,307E-16	-2,656E-14
9	0,00000	COMB9	Combination	-387,862	180,424	-1,083E-14	-9,475E-17	4,551E-15
9	2,45000	COMB9	Combination	-433,203	-93,879	5,594E-15	-9,475E-17	1,159E-14
9	4,90000	COMB9	Combination	-478,543	-418,956	2,506E-14	-9,475E-17	-2,534E-14
9	0,00000	COMB10	Combination	-352,923	137,377	-8,269E-15	-1,492E-16	9,252E-15
9	2,45000	COMB10	Combination	-398,264	-136,926	8,155E-15	-1,492E-16	1,001E-14
9	4,90000	COMB10	Combination	-443,604	-462,003	2,762E-14	-1,492E-16	-3,319E-14
9	0,00000	COMB11	Combination	-387,862	68,222	-4,112E-15	-9,475E-17	-2,394E-15
9	2,45000	COMB11	Combination	-433,203	-42,857	2,539E-15	-9,475E-17	-7,513E-16
9	4,90000	COMB11	Combination	-478,543	-130,580	7,791E-15	-9,475E-17	-1,369E-14
9	0,00000	COMB12	Combination	-319,269	110,642	-6,643E-15	-6,179E-17	-1,515E-17
9	2,45000	COMB12	Combination	-364,609	-44,660	2,656E-15	-6,179E-17	5,142E-15
9	4,90000	COMB12	Combination	-409,950	-222,362	1,330E-14	-6,179E-17	-1,413E-14
9	0,00000	COMB13	Combination	-292,791	102,063	-6,111E-15	0,0000	-6,190E-15
9	2,45000	COMB13	Combination	-338,132	19,204	-1,150E-15	0,0000	3,165E-15
9	4,90000	COMB13	Combination	-383,473	-101,287	6,065E-15	0,0000	-2,396E-15
9	0,00000	COMB14	Combination	-301,533	88,790	-5,342E-15	-8,941E-17	2,371E-15
9	2,45000	COMB14	Combination	-346,873	-66,512	3,957E-15	-8,941E-17	4,342E-15
9	4,90000	COMB14	Combination	-392,214	-244,214	1,460E-14	-8,941E-17	-1,811E-14
9	0,00000	COMB15	Combination	-275,055	80,210	-4,811E-15	-2,762E-17	-3,804E-15
9	2,45000	COMB15	Combination	-320,396	-2,649	1,506E-16	-2,762E-17	2,365E-15
9	4,90000	COMB15	Combination	-365,737	-123,140	7,365E-15	-2,762E-17	-6,381E-15
9	0,00000	COMB16	Combination	-319,269	139,993	-8,400E-15	-6,179E-17	1,802E-15
9	2,45000	COMB16	Combination	-364,609	-58,007	3,455E-15	-6,179E-17	8,370E-15
9	4,90000	COMB16	Combination	-409,950	-297,798	1,781E-14	-6,179E-17	-1,717E-14
9	0,00000	COMB17	Combination	-292,791	131,413	-7,868E-15	0,0000	-4,373E-15
9	2,45000	COMB17	Combination	-338,132	5,857	-3,507E-16	0,0000	6,392E-15
9	4,90000	COMB17	Combination	-383,473	-176,723	1,058E-14	0,0000	-5,443E-15
9	0,00000	COMB18	Combination	-292,392	106,879	-6,429E-15	-1,036E-16	5,417E-15
9	2,45000	COMB18	Combination	-337,733	-91,120	5,426E-15	-1,036E-16	7,158E-15
9	4,90000	COMB18	Combination	-383,074	-330,911	1,978E-14	-1,036E-16	-2,321E-14
9	0,00000	COMB19	Combination	-265,915	98,300	-5,898E-15	-4,185E-17	-7,571E-16
9	2,45000	COMB19	Combination	-311,256	-27,257	1,620E-15	-4,185E-17	5,181E-15
9	4,90000	COMB19	Combination	-356,597	-209,837	1,255E-14	-4,185E-17	-1,148E-14

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Rev
F0

Data
20/06/2011

Frame Text	Station m	OutputCase Text	CaseType Text	P KN	V2 KN	V3 KN	T KN-m	M2 KN-m
9	0,00000	COMB20	Combination	-319,269	53,684	-3,232E-15	-6,179E-17	-3,541E-15
9	2,45000	COMB20	Combination	-364,609	-18,760	1,105E-15	-6,179E-17	-1,121E-15
9	4,90000	COMB20	Combination	-409,950	-75,970	4,531E-15	-6,179E-17	-8,212E-15
9	0,00000	COMB21	Combination	-292,791	45,104	-2,701E-15	0,0000	-9,715E-15
9	2,45000	COMB21	Combination	-338,132	45,104	-2,701E-15	0,0000	-3,099E-15
9	4,90000	COMB21	Combination	-383,473	45,104	-2,701E-15	0,0000	3,518E-15
10	0,00000	COMB1	Combination	-748,286	63,387	-3,763E-15	-1,112E-16	-1,278E-14
10	2,50000	COMB1	Combination	-808,431	63,387	-3,763E-15	-1,112E-16	-3,371E-15
10	5,00000	COMB1	Combination	-868,577	63,387	-3,763E-15	-1,112E-16	6,037E-15
10	0,00000	COMB2	Combination	-774,163	113,337	-6,742E-15	-1,527E-16	-2,305E-14
10	2,50000	COMB2	Combination	-834,309	113,337	-6,742E-15	-1,527E-16	-6,197E-15
10	5,00000	COMB2	Combination	-894,455	113,337	-6,742E-15	-1,527E-16	1,066E-14
10	0,00000	COMB3	Combination	-748,286	41,472	-2,451E-15	-1,112E-16	-8,208E-15
10	2,50000	COMB3	Combination	-808,431	41,472	-2,451E-15	-1,112E-16	-2,080E-15
10	5,00000	COMB3	Combination	-868,577	41,472	-2,451E-15	-1,112E-16	4,047E-15
10	0,00000	COMB4	Combination	-787,499	117,162	-6,965E-15	-1,740E-16	-2,377E-14
10	2,50000	COMB4	Combination	-847,645	117,162	-6,965E-15	-1,740E-16	-6,363E-15
10	5,00000	COMB4	Combination	-907,791	117,162	-6,965E-15	-1,740E-16	1,105E-14
10	0,00000	COMB5	Combination	-487,606	58,934	-3,498E-15	-1,062E-16	-1,185E-14
10	2,50000	COMB5	Combination	-533,873	58,934	-3,498E-15	-1,062E-16	-3,102E-15
10	5,00000	COMB5	Combination	-580,139	58,934	-3,498E-15	-1,062E-16	5,643E-15
10	0,00000	COMB6	Combination	-748,286	105,915	-6,309E-15	-1,112E-16	-2,165E-14
10	2,50000	COMB6	Combination	-808,431	105,915	-6,309E-15	-1,112E-16	-5,875E-15
10	5,00000	COMB6	Combination	-868,577	105,915	-6,309E-15	-1,112E-16	9,898E-15
10	0,00000	COMB7	Combination	-616,192	53,162	-3,156E-15	-9,475E-17	-1,071E-14
10	2,50000	COMB7	Combination	-662,458	53,162	-3,156E-15	-9,475E-17	-2,823E-15
10	5,00000	COMB7	Combination	-708,724	53,162	-3,156E-15	-9,475E-17	5,066E-15
10	0,00000	COMB8	Combination	-638,619	96,452	-5,737E-15	-1,307E-16	-1,962E-14
10	2,50000	COMB8	Combination	-684,885	96,452	-5,737E-15	-1,307E-16	-5,272E-15
10	5,00000	COMB8	Combination	-731,151	96,452	-5,737E-15	-1,307E-16	9,071E-15
10	0,00000	COMB9	Combination	-616,192	34,169	-2,018E-15	-9,475E-17	-6,750E-15
10	2,50000	COMB9	Combination	-662,458	34,169	-2,018E-15	-9,475E-17	-1,704E-15
10	5,00000	COMB9	Combination	-708,724	34,169	-2,018E-15	-9,475E-17	3,342E-15
10	0,00000	COMB10	Combination	-650,177	99,768	-5,930E-15	-1,492E-16	-2,024E-14
10	2,50000	COMB10	Combination	-696,443	99,768	-5,930E-15	-1,492E-16	-5,416E-15
10	5,00000	COMB10	Combination	-742,709	99,768	-5,930E-15	-1,492E-16	9,410E-15
10	0,00000	COMB11	Combination	-616,192	90,020	-5,363E-15	-9,475E-17	-1,840E-14
10	2,50000	COMB11	Combination	-662,458	90,020	-5,363E-15	-9,475E-17	-4,993E-15
10	5,00000	COMB11	Combination	-708,724	90,020	-5,363E-15	-9,475E-17	8,413E-15
10	0,00000	COMB12	Combination	-509,414	33,827	-2,008E-15	-6,179E-17	-6,803E-15
10	2,50000	COMB12	Combination	-555,680	33,827	-2,008E-15	-6,179E-17	-1,784E-15
10	5,00000	COMB12	Combination	-601,946	33,827	-2,008E-15	-6,179E-17	3,235E-15
10	0,00000	COMB13	Combination	-406,525	-11,320	6,778E-16	0,0000	2,396E-15
10	2,50000	COMB13	Combination	-452,791	-11,320	6,778E-16	0,0000	7,013E-16
10	5,00000	COMB13	Combination	-499,057	-11,320	6,778E-16	0,0000	-9,931E-16
10	0,00000	COMB14	Combination	-526,666	67,127	-3,993E-15	-8,941E-17	-1,365E-14
10	2,50000	COMB14	Combination	-572,932	67,127	-3,993E-15	-8,941E-17	-3,668E-15
10	5,00000	COMB14	Combination	-619,198	67,127	-3,993E-15	-8,941E-17	6,315E-15
10	0,00000	COMB15	Combination	-423,776	21,980	-1,308E-15	-2,762E-17	-4,453E-15
10	2,50000	COMB15	Combination	-470,042	21,980	-1,308E-15	-2,762E-17	-1,183E-15
10	5,00000	COMB15	Combination	-516,309	21,980	-1,308E-15	-2,762E-17	2,087E-15
10	0,00000	COMB16	Combination	-509,414	19,217	-1,133E-15	-6,179E-17	-3,756E-15
10	2,50000	COMB16	Combination	-555,680	19,217	-1,133E-15	-6,179E-17	-9,238E-16
10	5,00000	COMB16	Combination	-601,946	19,217	-1,133E-15	-6,179E-17	1,908E-15
10	0,00000	COMB17	Combination	-406,525	-25,930	1,553E-15	0,0000	5,443E-15
10	2,50000	COMB17	Combination	-452,791	-25,930	1,553E-15	0,0000	1,562E-15
10	5,00000	COMB17	Combination	-499,057	-25,930	1,553E-15	0,0000	-2,320E-15
10	0,00000	COMB18	Combination	-535,556	69,678	-4,142E-15	-1,036E-16	-1,413E-14
10	2,50000	COMB18	Combination	-581,823	69,678	-4,142E-15	-1,036E-16	-3,779E-15
10	5,00000	COMB18	Combination	-628,089	69,678	-4,142E-15	-1,036E-16	6,576E-15
10	0,00000	COMB19	Combination	-432,667	24,531	-1,457E-15	-4,185E-17	-4,935E-15
10	2,50000	COMB19	Combination	-478,933	24,531	-1,457E-15	-4,185E-17	-1,293E-15
10	5,00000	COMB19	Combination	-525,199	24,531	-1,457E-15	-4,185E-17	2,348E-15

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

Codice documento

SS0558_F0.doc

Rev

F0

Data

20/06/2011

Frame Text	Station m	OutputCase Text	CaseType Text	P KN	V2 KN	V3 KN	T KN-m	M2 KN-m
10	0,00000	COMB20	Combination	-509,414	62,180	-3,705E-15	-6,179E-17	-1,272E-14
10	2,50000	COMB20	Combination	-555,680	62,180	-3,705E-15	-6,179E-17	-3,454E-15
10	5,00000	COMB20	Combination	-601,946	62,180	-3,705E-15	-6,179E-17	5,809E-15
10	0,00000	COMB21	Combination	-406,525	17,033	-1,020E-15	0,0000	-3,518E-15
10	2,50000	COMB21	Combination	-452,791	17,033	-1,020E-15	0,0000	-9,682E-16
10	5,00000	COMB21	Combination	-499,057	17,033	-1,020E-15	0,0000	1,581E-15
11	0,00000	COMB1	Combination	-607,055	119,150	-7,166E-15	-1,112E-16	-2,479E-14
11	2,50000	COMB1	Combination	-667,201	119,150	-7,166E-15	-1,112E-16	-6,877E-15
11	5,00000	COMB1	Combination	-727,347	119,150	-7,166E-15	-1,112E-16	1,104E-14
11	0,00000	COMB2	Combination	-581,177	147,836	-8,896E-15	-1,527E-16	-3,073E-14
11	2,50000	COMB2	Combination	-641,323	147,836	-8,896E-15	-1,527E-16	-8,494E-15
11	5,00000	COMB2	Combination	-701,469	147,836	-8,896E-15	-1,527E-16	1,375E-14
11	0,00000	COMB3	Combination	-607,055	141,065	-8,479E-15	-1,112E-16	-2,936E-14
11	2,50000	COMB3	Combination	-667,201	141,065	-8,479E-15	-1,112E-16	-8,167E-15
11	5,00000	COMB3	Combination	-727,347	141,065	-8,479E-15	-1,112E-16	1,303E-14
11	0,00000	COMB4	Combination	-567,842	184,534	-1,110E-14	-1,740E-16	-3,837E-14
11	2,50000	COMB4	Combination	-627,987	184,534	-1,110E-14	-1,740E-16	-1,062E-14
11	5,00000	COMB4	Combination	-688,133	184,534	-1,110E-14	-1,740E-16	1,713E-14
11	0,00000	COMB5	Combination	-359,394	185,416	-1,113E-14	-1,062E-16	-3,837E-14
11	2,50000	COMB5	Combination	-405,66	185,416	-1,113E-14	-1,062E-16	-1,054E-14
11	5,00000	COMB5	Combination	-451,926	185,416	-1,113E-14	-1,062E-16	1,729E-14
11	0,00000	COMB6	Combination	-607,055	76,622	-4,620E-15	-1,112E-16	-1,592E-14
11	2,50000	COMB6	Combination	-667,201	76,622	-4,620E-15	-1,112E-16	-4,373E-15
11	5,00000	COMB6	Combination	-727,347	76,622	-4,620E-15	-1,112E-16	7,177E-15
11	0,00000	COMB7	Combination	-495,884	102,332	-6,155E-15	-9,475E-17	-2,129E-14
11	2,50000	COMB7	Combination	-542,151	102,332	-6,155E-15	-9,475E-17	-5,907E-15
11	5,00000	COMB7	Combination	-588,417	102,332	-6,155E-15	-9,475E-17	9,480E-15
11	0,00000	COMB8	Combination	-473,457	127,193	-7,654E-15	-1,307E-16	-2,644E-14
11	2,50000	COMB8	Combination	-519,723	127,193	-7,654E-15	-1,307E-16	-7,308E-15
11	5,00000	COMB8	Combination	-565,989	127,193	-7,654E-15	-1,307E-16	1,183E-14
11	0,00000	COMB9	Combination	-495,884	121,325	-7,292E-15	-9,475E-17	-2,525E-14
11	2,50000	COMB9	Combination	-542,151	121,325	-7,292E-15	-9,475E-17	-7,025E-15
11	5,00000	COMB9	Combination	-588,417	121,325	-7,292E-15	-9,475E-17	1,120E-14
11	0,00000	COMB10	Combination	-461,900	158,998	-9,563E-15	-1,492E-16	-3,306E-14
11	2,50000	COMB10	Combination	-508,166	158,998	-9,563E-15	-1,492E-16	-9,149E-15
11	5,00000	COMB10	Combination	-554,432	158,998	-9,563E-15	-1,492E-16	1,476E-14
11	0,00000	COMB11	Combination	-495,884	65,474	-3,948E-15	-9,475E-17	-1,361E-14
11	2,50000	COMB11	Combination	-542,151	65,474	-3,948E-15	-9,475E-17	-3,736E-15
11	5,00000	COMB11	Combination	-588,417	65,474	-3,948E-15	-9,475E-17	6,133E-15
11	0,00000	COMB12	Combination	-430,953	67,582	-4,064E-15	-6,179E-17	-1,407E-14
11	2,50000	COMB12	Combination	-477,219	67,582	-4,064E-15	-6,179E-17	-3,909E-15
11	5,00000	COMB12	Combination	-523,485	67,582	-4,064E-15	-6,179E-17	6,252E-15
11	0,00000	COMB13	Combination	-406,525	11,320	-6,778E-16	0,0000	-2,396E-15
11	2,50000	COMB13	Combination	-452,791	11,320	-6,778E-16	0,0000	-7,013E-16
11	5,00000	COMB13	Combination	-499,057	11,320	-6,778E-16	0,0000	9,931E-16
11	0,00000	COMB14	Combination	-413,701	86,706	-5,217E-15	-8,941E-17	-1,803E-14
11	2,50000	COMB14	Combination	-459,967	86,706	-5,217E-15	-8,941E-17	-4,987E-15
11	5,00000	COMB14	Combination	-506,233	86,706	-5,217E-15	-8,941E-17	8,056E-15
11	0,00000	COMB15	Combination	-389,273	30,444	-1,831E-15	-2,762E-17	-6,357E-15
11	2,50000	COMB15	Combination	-435,539	30,444	-1,831E-15	-2,762E-17	-1,780E-15
11	5,00000	COMB15	Combination	-481,805	30,444	-1,831E-15	-2,762E-17	2,798E-15
11	0,00000	COMB16	Combination	-430,953	82,192	-4,939E-15	-6,179E-17	-1,712E-14
11	2,50000	COMB16	Combination	-477,219	82,192	-4,939E-15	-6,179E-17	-4,769E-15
11	5,00000	COMB16	Combination	-523,485	82,192	-4,939E-15	-6,179E-17	7,579E-15
11	0,00000	COMB17	Combination	-406,525	25,930	-1,553E-15	0,0000	-5,443E-15
11	2,50000	COMB17	Combination	-452,791	25,930	-1,553E-15	0,0000	-1,562E-15
11	5,00000	COMB17	Combination	-499,057	25,930	-1,553E-15	0,0000	2,320E-15
11	0,00000	COMB18	Combination	-404,811	111,171	-6,686E-15	-1,036E-16	-2,312E-14
11	2,50000	COMB18	Combination	-451,077	111,171	-6,686E-15	-1,036E-16	-6,403E-15
11	5,00000	COMB18	Combination	-497,343	111,171	-6,686E-15	-1,036E-16	1,031E-14
11	0,00000	COMB19	Combination	-380,382	54,909	-3,300E-15	-4,185E-17	-1,144E-14
11	2,50000	COMB19	Combination	-426,649	54,909	-3,300E-15	-4,185E-17	-3,195E-15
11	5,00000	COMB19	Combination	-472,915	54,909	-3,300E-15	-4,185E-17	5,054E-15

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

Codice documento
SS0558_F0.doc

Rev
F0

Data
20/06/2011

Frame Text	Station m	OutputCase Text	CaseType Text	P KN	V2 KN	V3 KN	T KN-m	M2 KN-m
11	0,00000	COMB20	Combination	-430,953	39,230	-2,367E-15	-6,179E-17	-8,156E-15
11	2,50000	COMB20	Combination	-477,219	39,230	-2,367E-15	-6,179E-17	-2,239E-15
11	5,00000	COMB20	Combination	-523,485	39,230	-2,367E-15	-6,179E-17	3,678E-15
11	0,00000	COMB21	Combination	-406,525	-17,033	1,020E-15	0,0000	3,518E-15
11	2,50000	COMB21	Combination	-452,791	-17,033	1,020E-15	0,0000	9,682E-16
11	5,00000	COMB21	Combination	-499,057	-17,033	1,020E-15	0,0000	-1,581E-15
19	0,00000	COMB1	Combination	-302,874	-549,759	3,224E-17	-4,411E-16	1,112E-16
19	0,49286	COMB1	Combination	-302,874	-481,593	3,224E-17	-4,411E-16	9,534E-17
19	0,98571	COMB1	Combination	-302,874	-413,427	3,224E-17	-4,411E-16	7,945E-17
19	1,47857	COMB1	Combination	-302,874	-345,261	3,224E-17	-4,411E-16	6,356E-17
19	1,97143	COMB1	Combination	-302,874	-277,095	3,224E-17	-4,411E-16	4,767E-17
19	2,46429	COMB1	Combination	-302,874	-208,930	3,224E-17	-4,411E-16	3,178E-17
19	2,95714	COMB1	Combination	-302,874	-140,764	3,224E-17	-4,411E-16	1,589E-17
19	3,45000	COMB1	Combination	-302,874	-72,598	3,224E-17	-4,411E-16	0,0000
19	3,94286	COMB1	Combination	-302,874	-4,432	3,224E-17	-4,411E-16	-1,589E-17
19	4,43571	COMB1	Combination	-302,874	63,734	3,224E-17	-4,411E-16	-3,178E-17
19	4,92857	COMB1	Combination	-302,874	131,900	3,224E-17	-4,411E-16	-4,767E-17
19	5,42143	COMB1	Combination	-302,874	200,066	3,224E-17	-4,411E-16	-6,356E-17
19	5,91429	COMB1	Combination	-302,874	268,232	3,224E-17	-4,411E-16	-7,945E-17
19	6,40714	COMB1	Combination	-302,874	336,398	3,224E-17	-4,411E-16	-9,534E-17
19	6,90000	COMB1	Combination	-302,874	404,564	3,224E-17	-4,411E-16	-1,112E-16
19	0,00000	COMB2	Combination	-270,096	-576,363	4,425E-17	-6,057E-16	1,527E-16
19	0,49286	COMB2	Combination	-270,096	-508,197	4,425E-17	-6,057E-16	1,308E-16
19	0,98571	COMB2	Combination	-270,096	-440,031	4,425E-17	-6,057E-16	1,090E-16
19	1,47857	COMB2	Combination	-270,096	-371,865	4,425E-17	-6,057E-16	8,723E-17
19	1,97143	COMB2	Combination	-270,096	-303,699	4,425E-17	-6,057E-16	6,542E-17
19	2,46429	COMB2	Combination	-270,096	-235,534	4,425E-17	-6,057E-16	4,362E-17
19	2,95714	COMB2	Combination	-270,096	-167,368	4,425E-17	-6,057E-16	2,181E-17
19	3,45000	COMB2	Combination	-270,096	-99,202	4,425E-17	-6,057E-16	0,0000
19	3,94286	COMB2	Combination	-270,096	-31,036	4,425E-17	-6,057E-16	-2,181E-17
19	4,43571	COMB2	Combination	-270,096	37,130	4,425E-17	-6,057E-16	-4,362E-17
19	4,92857	COMB2	Combination	-270,096	105,296	4,425E-17	-6,057E-16	-6,542E-17
19	5,42143	COMB2	Combination	-270,096	173,462	4,425E-17	-6,057E-16	-8,723E-17
19	5,91429	COMB2	Combination	-270,096	241,628	4,425E-17	-6,057E-16	-1,090E-16
19	6,40714	COMB2	Combination	-270,096	309,794	4,425E-17	-6,057E-16	-1,308E-16
19	6,90000	COMB2	Combination	-270,096	377,960	4,425E-17	-6,057E-16	-1,527E-16
19	0,00000	COMB3	Combination	-370,441	-549,759	3,224E-17	-4,411E-16	1,112E-16
19	0,49286	COMB3	Combination	-370,441	-481,593	3,224E-17	-4,411E-16	9,534E-17
19	0,98571	COMB3	Combination	-370,441	-413,427	3,224E-17	-4,411E-16	7,945E-17
19	1,47857	COMB3	Combination	-370,441	-345,261	3,224E-17	-4,411E-16	6,356E-17
19	1,97143	COMB3	Combination	-370,441	-277,095	3,224E-17	-4,411E-16	4,767E-17
19	2,46429	COMB3	Combination	-370,441	-208,930	3,224E-17	-4,411E-16	3,178E-17
19	2,95714	COMB3	Combination	-370,441	-140,764	3,224E-17	-4,411E-16	1,589E-17
19	3,45000	COMB3	Combination	-370,441	-72,598	3,224E-17	-4,411E-16	0,0000
19	3,94286	COMB3	Combination	-370,441	-4,432	3,224E-17	-4,411E-16	-1,589E-17
19	4,43571	COMB3	Combination	-370,441	63,734	3,224E-17	-4,411E-16	-3,178E-17
19	4,92857	COMB3	Combination	-370,441	131,900	3,224E-17	-4,411E-16	-4,767E-17
19	5,42143	COMB3	Combination	-370,441	200,066	3,224E-17	-4,411E-16	-6,356E-17
19	5,91429	COMB3	Combination	-370,441	268,232	3,224E-17	-4,411E-16	-7,945E-17
19	6,40714	COMB3	Combination	-370,441	336,398	3,224E-17	-4,411E-16	-9,534E-17
19	6,90000	COMB3	Combination	-370,441	404,564	3,224E-17	-4,411E-16	-1,112E-16
19	0,00000	COMB4	Combination	-320,771	-590,073	5,044E-17	-6,906E-16	1,740E-16
19	0,49286	COMB4	Combination	-320,771	-521,907	5,044E-17	-6,906E-16	1,491E-16
19	0,98571	COMB4	Combination	-320,771	-453,741	5,044E-17	-6,906E-16	1,243E-16
19	1,47857	COMB4	Combination	-320,771	-385,576	5,044E-17	-6,906E-16	9,943E-17
19	1,97143	COMB4	Combination	-320,771	-317,410	5,044E-17	-6,906E-16	7,457E-17
19	2,46429	COMB4	Combination	-320,771	-249,244	5,044E-17	-6,906E-16	4,971E-17
19	2,95714	COMB4	Combination	-320,771	-181,078	5,044E-17	-6,906E-16	2,486E-17
19	3,45000	COMB4	Combination	-320,771	-112,912	5,044E-17	-6,906E-16	0,0000
19	3,94286	COMB4	Combination	-320,771	-44,746	5,044E-17	-6,906E-16	-2,486E-17
19	4,43571	COMB4	Combination	-320,771	23,420	5,044E-17	-6,906E-16	-4,971E-17
19	4,92857	COMB4	Combination	-320,771	91,586	5,044E-17	-6,906E-16	-7,457E-17
19	5,42143	COMB4	Combination	-320,771	159,752	5,044E-17	-6,906E-16	-9,943E-17

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

Codice documento
SS0558_F0.doc

Rev
F0

Data
20/06/2011

Frame Text	Station m	OutputCase Text	CaseType Text	P KN	V2 KN	V3 KN	T KN-m	M2 KN-m
19	5,91429	COMB4	Combination	-320,771	227,918	5,044E-17	-6,906E-16	-1,243E-16
19	6,40714	COMB4	Combination	-320,771	296,084	5,044E-17	-6,906E-16	-1,491E-16
19	6,90000	COMB4	Combination	-320,771	364,249	5,044E-17	-6,906E-16	-1,740E-16
19	0,00000	COMB5	Combination	-247,204	-273,727	-330,329	3,077E-17	-4,241E-16
19	0,49286	COMB5	Combination	-247,204	-273,727	-292,555	3,077E-17	-4,241E-16
19	0,98571	COMB5	Combination	-247,204	-273,727	-254,78	3,077E-17	-4,241E-16
19	1,47857	COMB5	Combination	-247,204	-273,727	-217,005	3,077E-17	-4,241E-16
19	1,97143	COMB5	Combination	-247,204	-273,727	-179,23	3,077E-17	-4,241E-16
19	2,46429	COMB5	Combination	-247,204	-273,727	-141,455	3,077E-17	-4,241E-16
19	2,95714	COMB5	Combination	-247,204	-273,727	-103,681	3,077E-17	-4,241E-16
19	3,45000	COMB5	Combination	-247,204	-273,727	-65,906	3,077E-17	-4,241E-16
19	3,94286	COMB5	Combination	-247,204	-273,727	-28,131	3,077E-17	-4,241E-16
19	4,43571	COMB5	Combination	-247,204	-273,727	9,644	3,077E-17	-4,241E-16
19	4,92857	COMB5	Combination	-247,204	-273,727	47,419	3,077E-17	-4,241E-16
19	5,42143	COMB5	Combination	-247,204	-273,727	85,193	3,077E-17	-4,241E-16
19	5,91429	COMB5	Combination	-247,204	-273,727	122,968	3,077E-17	-4,241E-16
19	6,40714	COMB5	Combination	-247,204	-273,727	160,743	3,077E-17	-4,241E-16
19	6,90000	COMB5	Combination	-247,204	-273,727	198,518	3,077E-17	-4,241E-16
19	0,00000	COMB6	Combination	-171,762	-549,759	3,224E-17	-4,411E-16	1,112E-16
19	0,49286	COMB6	Combination	-171,762	-481,593	3,224E-17	-4,411E-16	9,534E-17
19	0,98571	COMB6	Combination	-171,762	-413,427	3,224E-17	-4,411E-16	7,945E-17
19	1,47857	COMB6	Combination	-171,762	-345,261	3,224E-17	-4,411E-16	6,356E-17
19	1,97143	COMB6	Combination	-171,762	-277,095	3,224E-17	-4,411E-16	4,767E-17
19	2,46429	COMB6	Combination	-171,762	-208,930	3,224E-17	-4,411E-16	3,178E-17
19	2,95714	COMB6	Combination	-171,762	-140,764	3,224E-17	-4,411E-16	1,589E-17
19	3,45000	COMB6	Combination	-171,762	-72,598	3,224E-17	-4,411E-16	0,0000
19	3,94286	COMB6	Combination	-171,762	-4,432	3,224E-17	-4,411E-16	-1,589E-17
19	4,43571	COMB6	Combination	-171,762	63,734	3,224E-17	-4,411E-16	-3,178E-17
19	4,92857	COMB6	Combination	-171,762	131,900	3,224E-17	-4,411E-16	-4,767E-17
19	5,42143	COMB6	Combination	-171,762	200,066	3,224E-17	-4,411E-16	-6,356E-17
19	5,91429	COMB6	Combination	-171,762	268,232	3,224E-17	-4,411E-16	-7,945E-17
19	6,40714	COMB6	Combination	-171,762	336,398	3,224E-17	-4,411E-16	-9,534E-17
19	6,90000	COMB6	Combination	-171,762	404,564	3,224E-17	-4,411E-16	-1,112E-16
19	0,00000	COMB7	Combination	-259,407	-465,363	2,746E-17	-3,757E-16	9,475E-17
19	0,49286	COMB7	Combination	-259,407	-407,717	2,746E-17	-3,757E-16	8,122E-17
19	0,98571	COMB7	Combination	-259,407	-350,071	2,746E-17	-3,757E-16	6,768E-17
19	1,47857	COMB7	Combination	-259,407	-292,426	2,746E-17	-3,757E-16	5,414E-17
19	1,97143	COMB7	Combination	-259,407	-234,780	2,746E-17	-3,757E-16	4,061E-17
19	2,46429	COMB7	Combination	-259,407	-177,134	2,746E-17	-3,757E-16	2,707E-17
19	2,95714	COMB7	Combination	-259,407	-119,488	2,746E-17	-3,757E-16	1,354E-17
19	3,45000	COMB7	Combination	-259,407	-61,842	2,746E-17	-3,757E-16	0,0000
19	3,94286	COMB7	Combination	-259,407	-4,197	2,746E-17	-3,757E-16	-1,354E-17
19	4,43571	COMB7	Combination	-259,407	53,449	2,746E-17	-3,757E-16	-2,707E-17
19	4,92857	COMB7	Combination	-259,407	111,095	2,746E-17	-3,757E-16	-4,061E-17
19	5,42143	COMB7	Combination	-259,407	168,741	2,746E-17	-3,757E-16	-5,414E-17
19	5,91429	COMB7	Combination	-259,407	226,387	2,746E-17	-3,757E-16	-6,768E-17
19	6,40714	COMB7	Combination	-259,407	284,032	2,746E-17	-3,757E-16	-8,122E-17
19	6,90000	COMB7	Combination	-259,407	341,678	2,746E-17	-3,757E-16	-9,475E-17
19	0,00000	COMB8	Combination	-230,999	-488,420	3,787E-17	-5,184E-16	1,307E-16
19	0,49286	COMB8	Combination	-230,999	-430,774	3,787E-17	-5,184E-16	1,120E-16
19	0,98571	COMB8	Combination	-230,999	-373,128	3,787E-17	-5,184E-16	9,332E-17
19	1,47857	COMB8	Combination	-230,999	-315,483	3,787E-17	-5,184E-16	7,466E-17
19	1,97143	COMB8	Combination	-230,999	-257,837	3,787E-17	-5,184E-16	5,599E-17
19	2,46429	COMB8	Combination	-230,999	-200,191	3,787E-17	-5,184E-16	3,733E-17
19	2,95714	COMB8	Combination	-230,999	-142,545	3,787E-17	-5,184E-16	1,866E-17
19	3,45000	COMB8	Combination	-230,999	-84,899	3,787E-17	-5,184E-16	0,0000
19	3,94286	COMB8	Combination	-230,999	-27,254	3,787E-17	-5,184E-16	-1,866E-17
19	4,43571	COMB8	Combination	-230,999	30,392	3,787E-17	-5,184E-16	-3,733E-17
19	4,92857	COMB8	Combination	-230,999	88,038	3,787E-17	-5,184E-16	-5,599E-17
19	5,42143	COMB8	Combination	-230,999	145,684	3,787E-17	-5,184E-16	-7,466E-17
19	5,91429	COMB8	Combination	-230,999	203,330	3,787E-17	-5,184E-16	-9,332E-17
19	6,40714	COMB8	Combination	-230,999	260,975	3,787E-17	-5,184E-16	-1,120E-16
19	6,90000	COMB8	Combination	-230,999	318,621	3,787E-17	-5,184E-16	-1,307E-16

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Data
20/06/2011

Frame Text	Station m	OutputCase Text	CaseType Text	P KN	V2 KN	V3 KN	T KN-m	M2 KN-m
19	0,00000	COMB9	Combination	-317,965	-465,363	2,746E-17	-3,757E-16	9,475E-17
19	0,49286	COMB9	Combination	-317,965	-407,717	2,746E-17	-3,757E-16	8,122E-17
19	0,98571	COMB9	Combination	-317,965	-350,071	2,746E-17	-3,757E-16	6,768E-17
19	1,47857	COMB9	Combination	-317,965	-292,426	2,746E-17	-3,757E-16	5,414E-17
19	1,97143	COMB9	Combination	-317,965	-234,780	2,746E-17	-3,757E-16	4,061E-17
19	2,46429	COMB9	Combination	-317,965	-177,134	2,746E-17	-3,757E-16	2,707E-17
19	2,95714	COMB9	Combination	-317,965	-119,488	2,746E-17	-3,757E-16	1,354E-17
19	3,45000	COMB9	Combination	-317,965	-61,842	2,746E-17	-3,757E-16	0,0000
19	3,94286	COMB9	Combination	-317,965	-4,197	2,746E-17	-3,757E-16	-1,354E-17
19	4,43571	COMB9	Combination	-317,965	53,449	2,746E-17	-3,757E-16	-2,707E-17
19	4,92857	COMB9	Combination	-317,965	111,095	2,746E-17	-3,757E-16	-4,061E-17
19	5,42143	COMB9	Combination	-317,965	168,741	2,746E-17	-3,757E-16	-5,414E-17
19	5,91429	COMB9	Combination	-317,965	226,387	2,746E-17	-3,757E-16	-6,768E-17
19	6,40714	COMB9	Combination	-317,965	284,032	2,746E-17	-3,757E-16	-8,122E-17
19	6,90000	COMB9	Combination	-317,965	341,678	2,746E-17	-3,757E-16	-9,475E-17
19	0,00000	COMB10	Combination	-274,918	-500,302	4,323E-17	-5,920E-16	1,492E-16
19	0,49286	COMB10	Combination	-274,918	-442,656	4,323E-17	-5,920E-16	1,278E-16
19	0,98571	COMB10	Combination	-274,918	-385,010	4,323E-17	-5,920E-16	1,065E-16
19	1,47857	COMB10	Combination	-274,918	-327,365	4,323E-17	-5,920E-16	8,523E-17
19	1,97143	COMB10	Combination	-274,918	-269,719	4,323E-17	-5,920E-16	6,392E-17
19	2,46429	COMB10	Combination	-274,918	-212,073	4,323E-17	-5,920E-16	4,262E-17
19	2,95714	COMB10	Combination	-274,918	-154,427	4,323E-17	-5,920E-16	2,131E-17
19	3,45000	COMB10	Combination	-274,918	-96,781	4,323E-17	-5,920E-16	0,0000
19	3,94286	COMB10	Combination	-274,918	-39,136	4,323E-17	-5,920E-16	-2,131E-17
19	4,43571	COMB10	Combination	-274,918	18,510	4,323E-17	-5,920E-16	-4,262E-17
19	4,92857	COMB10	Combination	-274,918	76,156	4,323E-17	-5,920E-16	-6,392E-17
19	5,42143	COMB10	Combination	-274,918	133,802	4,323E-17	-5,920E-16	-8,523E-17
19	5,91429	COMB10	Combination	-274,918	191,448	4,323E-17	-5,920E-16	-1,065E-16
19	6,40714	COMB10	Combination	-274,918	249,093	4,323E-17	-5,920E-16	-1,278E-16
19	6,90000	COMB10	Combination	-274,918	306,739	4,323E-17	-5,920E-16	-1,492E-16
19	0,00000	COMB11	Combination	-145,776	-465,363	2,746E-17	-3,757E-16	9,475E-17
19	0,49286	COMB11	Combination	-145,776	-407,717	2,746E-17	-3,757E-16	8,122E-17
19	0,98571	COMB11	Combination	-145,776	-350,071	2,746E-17	-3,757E-16	6,768E-17
19	1,47857	COMB11	Combination	-145,776	-292,426	2,746E-17	-3,757E-16	5,414E-17
19	1,97143	COMB11	Combination	-145,776	-234,780	2,746E-17	-3,757E-16	4,061E-17
19	2,46429	COMB11	Combination	-145,776	-177,134	2,746E-17	-3,757E-16	2,707E-17
19	2,95714	COMB11	Combination	-145,776	-119,488	2,746E-17	-3,757E-16	1,354E-17
19	3,45000	COMB11	Combination	-145,776	-61,842	2,746E-17	-3,757E-16	0,0000
19	3,94286	COMB11	Combination	-145,776	-4,197	2,746E-17	-3,757E-16	-1,354E-17
19	4,43571	COMB11	Combination	-145,776	53,449	2,746E-17	-3,757E-16	-2,707E-17
19	4,92857	COMB11	Combination	-145,776	111,095	2,746E-17	-3,757E-16	-4,061E-17
19	5,42143	COMB11	Combination	-145,776	168,741	2,746E-17	-3,757E-16	-5,414E-17
19	5,91429	COMB11	Combination	-145,776	226,387	2,746E-17	-3,757E-16	-6,768E-17
19	6,40714	COMB11	Combination	-145,776	284,032	2,746E-17	-3,757E-16	-8,122E-17
19	6,90000	COMB11	Combination	-145,776	341,678	2,746E-17	-3,757E-16	-9,475E-17
19	0,00000	COMB12	Combination	-191,671	-353,749	1,791E-17	-2,450E-16	6,179E-17
19	0,49286	COMB12	Combination	-191,671	-308,975	1,791E-17	-2,450E-16	5,297E-17
19	0,98571	COMB12	Combination	-191,671	-264,201	1,791E-17	-2,450E-16	4,414E-17
19	1,47857	COMB12	Combination	-191,671	-219,427	1,791E-17	-2,450E-16	3,531E-17
19	1,97143	COMB12	Combination	-191,671	-174,654	1,791E-17	-2,450E-16	2,648E-17
19	2,46429	COMB12	Combination	-191,671	-129,880	1,791E-17	-2,450E-16	1,766E-17
19	2,95714	COMB12	Combination	-191,671	-85,106	1,791E-17	-2,450E-16	8,828E-18
19	3,45000	COMB12	Combination	-191,671	-40,332	1,791E-17	-2,450E-16	0,0000
19	3,94286	COMB12	Combination	-191,671	4,442	1,791E-17	-2,450E-16	-8,828E-18
19	4,43571	COMB12	Combination	-191,671	49,216	1,791E-17	-2,450E-16	-1,766E-17
19	4,92857	COMB12	Combination	-191,671	93,990	1,791E-17	-2,450E-16	-2,648E-17
19	5,42143	COMB12	Combination	-191,671	138,763	1,791E-17	-2,450E-16	-3,531E-17
19	5,91429	COMB12	Combination	-191,671	183,537	1,791E-17	-2,450E-16	-4,414E-17
19	6,40714	COMB12	Combination	-191,671	228,311	1,791E-17	-2,450E-16	-5,297E-17
19	6,90000	COMB12	Combination	-191,671	273,085	1,791E-17	-2,450E-16	-6,179E-17
19	0,00000	COMB13	Combination	-132,513	-246,608	0,000	0,0000	0,0000
19	0,49286	COMB13	Combination	-132,513	-211,378	0,000	0,0000	0,0000
19	0,98571	COMB13	Combination	-132,513	-176,148	0,000	0,0000	0,0000

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Data
20/06/2011

Frame Text	Station m	OutputCase Text	CaseType Text	P KN	V2 KN	V3 KN	T KN-m	M2 KN-m
19	1,47857	COMB13	Combination	-132,513	-140,919	0,000	0,0000	0,0000
19	1,97143	COMB13	Combination	-132,513	-105,689	0,000	0,0000	0,0000
19	2,46429	COMB13	Combination	-132,513	-70,459	0,000	0,0000	0,0000
19	2,95714	COMB13	Combination	-132,513	-35,230	0,000	0,0000	0,0000
19	3,45000	COMB13	Combination	-132,513	6,395E-14	0,000	0,0000	0,0000
19	3,94286	COMB13	Combination	-132,513	35,230	0,000	0,0000	0,0000
19	4,43571	COMB13	Combination	-132,513	70,459	0,000	0,0000	0,0000
19	4,92857	COMB13	Combination	-132,513	105,689	0,000	0,0000	0,0000
19	5,42143	COMB13	Combination	-132,513	140,919	0,000	0,0000	0,0000
19	5,91429	COMB13	Combination	-132,513	176,148	0,000	0,0000	0,0000
19	6,40714	COMB13	Combination	-132,513	211,378	0,000	0,0000	0,0000
19	6,90000	COMB13	Combination	-132,513	246,608	0,000	0,0000	0,0000
19	0,00000	COMB14	Combination	-169,819	-371,485	2,592E-17	-3,548E-16	8,941E-17
19	0,49286	COMB14	Combination	-169,819	-326,711	2,592E-17	-3,548E-16	7,664E-17
19	0,98571	COMB14	Combination	-169,819	-281,937	2,592E-17	-3,548E-16	6,386E-17
19	1,47857	COMB14	Combination	-169,819	-237,164	2,592E-17	-3,548E-16	5,109E-17
19	1,97143	COMB14	Combination	-169,819	-192,390	2,592E-17	-3,548E-16	3,832E-17
19	2,46429	COMB14	Combination	-169,819	-147,616	2,592E-17	-3,548E-16	2,555E-17
19	2,95714	COMB14	Combination	-169,819	-102,842	2,592E-17	-3,548E-16	1,277E-17
19	3,45000	COMB14	Combination	-169,819	-58,068	2,592E-17	-3,548E-16	0,0000
19	3,94286	COMB14	Combination	-169,819	-13,294	2,592E-17	-3,548E-16	-1,277E-17
19	4,43571	COMB14	Combination	-169,819	31,480	2,592E-17	-3,548E-16	-2,555E-17
19	4,92857	COMB14	Combination	-169,819	76,253	2,592E-17	-3,548E-16	-3,832E-17
19	5,42143	COMB14	Combination	-169,819	121,027	2,592E-17	-3,548E-16	-5,109E-17
19	5,91429	COMB14	Combination	-169,819	165,801	2,592E-17	-3,548E-16	-6,386E-17
19	6,40714	COMB14	Combination	-169,819	210,575	2,592E-17	-3,548E-16	-7,664E-17
19	6,90000	COMB14	Combination	-169,819	255,349	2,592E-17	-3,548E-16	-8,941E-17
19	0,00000	COMB15	Combination	-110,660	-264,344	8,005E-18	-1,098E-16	2,762E-17
19	0,49286	COMB15	Combination	-110,660	-229,114	8,005E-18	-1,098E-16	2,367E-17
19	0,98571	COMB15	Combination	-110,660	-193,884	8,005E-18	-1,098E-16	1,973E-17
19	1,47857	COMB15	Combination	-110,660	-158,655	8,005E-18	-1,098E-16	1,578E-17
19	1,97143	COMB15	Combination	-110,660	-123,425	8,005E-18	-1,098E-16	1,184E-17
19	2,46429	COMB15	Combination	-110,660	-88,195	8,005E-18	-1,098E-16	7,890E-18
19	2,95714	COMB15	Combination	-110,660	-52,966	8,005E-18	-1,098E-16	3,945E-18
19	3,45000	COMB15	Combination	-110,660	-17,736	8,005E-18	-1,098E-16	0,0000
19	3,94286	COMB15	Combination	-110,660	17,494	8,005E-18	-1,098E-16	-3,945E-18
19	4,43571	COMB15	Combination	-110,660	52,723	8,005E-18	-1,098E-16	-7,890E-18
19	4,92857	COMB15	Combination	-110,660	87,953	8,005E-18	-1,098E-16	-1,184E-17
19	5,42143	COMB15	Combination	-110,660	123,183	8,005E-18	-1,098E-16	-1,578E-17
19	5,91429	COMB15	Combination	-110,660	158,412	8,005E-18	-1,098E-16	-1,973E-17
19	6,40714	COMB15	Combination	-110,660	193,642	8,005E-18	-1,098E-16	-2,367E-17
19	6,90000	COMB15	Combination	-110,660	228,872	8,005E-18	-1,098E-16	-2,762E-17
19	0,00000	COMB16	Combination	-236,715	-353,749	1,791E-17	-2,450E-16	6,179E-17
19	0,49286	COMB16	Combination	-236,715	-308,975	1,791E-17	-2,450E-16	5,297E-17
19	0,98571	COMB16	Combination	-236,715	-264,201	1,791E-17	-2,450E-16	4,414E-17
19	1,47857	COMB16	Combination	-236,715	-219,427	1,791E-17	-2,450E-16	3,531E-17
19	1,97143	COMB16	Combination	-236,715	-174,654	1,791E-17	-2,450E-16	2,648E-17
19	2,46429	COMB16	Combination	-236,715	-129,880	1,791E-17	-2,450E-16	1,766E-17
19	2,95714	COMB16	Combination	-236,715	-85,106	1,791E-17	-2,450E-16	8,828E-18
19	3,45000	COMB16	Combination	-236,715	-40,332	1,791E-17	-2,450E-16	0,0000
19	3,94286	COMB16	Combination	-236,715	4,442	1,791E-17	-2,450E-16	-8,828E-18
19	4,43571	COMB16	Combination	-236,715	49,216	1,791E-17	-2,450E-16	-1,766E-17
19	4,92857	COMB16	Combination	-236,715	93,990	1,791E-17	-2,450E-16	-2,648E-17
19	5,42143	COMB16	Combination	-236,715	138,763	1,791E-17	-2,450E-16	-3,531E-17
19	5,91429	COMB16	Combination	-236,715	183,537	1,791E-17	-2,450E-16	-4,414E-17
19	6,40714	COMB16	Combination	-236,715	228,311	1,791E-17	-2,450E-16	-5,297E-17
19	6,90000	COMB16	Combination	-236,715	273,085	1,791E-17	-2,450E-16	-6,179E-17
19	0,00000	COMB17	Combination	-177,557	-246,608	0,000	0,0000	0,0000
19	0,49286	COMB17	Combination	-177,557	-211,378	0,000	0,0000	0,0000
19	0,98571	COMB17	Combination	-177,557	-176,148	0,000	0,0000	0,0000
19	1,47857	COMB17	Combination	-177,557	-140,919	0,000	0,0000	0,0000
19	1,97143	COMB17	Combination	-177,557	-105,689	0,000	0,0000	0,0000
19	2,46429	COMB17	Combination	-177,557	-70,459	0,000	0,0000	0,0000

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

Codice documento
SS0558_F0.doc

Rev
F0

Data
20/06/2011

Frame Text	Station m	OutputCase Text	CaseType Text	P KN	V2 KN	V3 KN	T KN-m	M2 KN-m
19	2,95714	COMB17	Combination	-177,557	-35,230	0,000	0,0000	0,0000
19	3,45000	COMB17	Combination	-177,557	1,066E-13	0,000	0,0000	0,0000
19	3,94286	COMB17	Combination	-177,557	35,230	0,000	0,0000	0,0000
19	4,43571	COMB17	Combination	-177,557	70,459	0,000	0,0000	0,0000
19	4,92857	COMB17	Combination	-177,557	105,689	0,000	0,0000	0,0000
19	5,42143	COMB17	Combination	-177,557	140,919	0,000	0,0000	0,0000
19	5,91429	COMB17	Combination	-177,557	176,148	0,000	0,0000	0,0000
19	6,40714	COMB17	Combination	-177,557	211,378	0,000	0,0000	0,0000
19	6,90000	COMB17	Combination	-177,557	246,608	0,000	0,0000	0,0000
19	0,00000	COMB18	Combination	-203,602	-380,625	3,004E-17	-4,114E-16	1,036E-16
19	0,49286	COMB18	Combination	-203,602	-335,851	3,004E-17	-4,114E-16	8,884E-17
19	0,98571	COMB18	Combination	-203,602	-291,077	3,004E-17	-4,114E-16	7,403E-17
19	1,47857	COMB18	Combination	-203,602	-246,304	3,004E-17	-4,114E-16	5,922E-17
19	1,97143	COMB18	Combination	-203,602	-201,530	3,004E-17	-4,114E-16	4,442E-17
19	2,46429	COMB18	Combination	-203,602	-156,756	3,004E-17	-4,114E-16	2,961E-17
19	2,95714	COMB18	Combination	-203,602	-111,982	3,004E-17	-4,114E-16	1,481E-17
19	3,45000	COMB18	Combination	-203,602	-67,208	3,004E-17	-4,114E-16	0,0000
19	3,94286	COMB18	Combination	-203,602	-22,434	3,004E-17	-4,114E-16	-1,481E-17
19	4,43571	COMB18	Combination	-203,602	22,340	3,004E-17	-4,114E-16	-2,961E-17
19	4,92857	COMB18	Combination	-203,602	67,113	3,004E-17	-4,114E-16	-4,442E-17
19	5,42143	COMB18	Combination	-203,602	111,887	3,004E-17	-4,114E-16	-5,922E-17
19	5,91429	COMB18	Combination	-203,602	156,661	3,004E-17	-4,114E-16	-7,403E-17
19	6,40714	COMB18	Combination	-203,602	201,435	3,004E-17	-4,114E-16	-8,884E-17
19	6,90000	COMB18	Combination	-203,602	246,209	3,004E-17	-4,114E-16	-1,036E-16
19	0,00000	COMB19	Combination	-144,444	-273,484	1,213E-17	-1,663E-16	4,185E-17
19	0,49286	COMB19	Combination	-144,444	-238,254	1,213E-17	-1,663E-16	3,587E-17
19	0,98571	COMB19	Combination	-144,444	-203,025	1,213E-17	-1,663E-16	2,989E-17
19	1,47857	COMB19	Combination	-144,444	-167,795	1,213E-17	-1,663E-16	2,391E-17
19	1,97143	COMB19	Combination	-144,444	-132,565	1,213E-17	-1,663E-16	1,793E-17
19	2,46429	COMB19	Combination	-144,444	-97,335	1,213E-17	-1,663E-16	1,196E-17
19	2,95714	COMB19	Combination	-144,444	-62,106	1,213E-17	-1,663E-16	5,978E-18
19	3,45000	COMB19	Combination	-144,444	-26,876	1,213E-17	-1,663E-16	0,0000
19	3,94286	COMB19	Combination	-144,444	8,354	1,213E-17	-1,663E-16	-5,978E-18
19	4,43571	COMB19	Combination	-144,444	43,583	1,213E-17	-1,663E-16	-1,196E-17
19	4,92857	COMB19	Combination	-144,444	78,813	1,213E-17	-1,663E-16	-1,793E-17
19	5,42143	COMB19	Combination	-144,444	114,043	1,213E-17	-1,663E-16	-2,391E-17
19	5,91429	COMB19	Combination	-144,444	149,272	1,213E-17	-1,663E-16	-2,989E-17
19	6,40714	COMB19	Combination	-144,444	184,502	1,213E-17	-1,663E-16	-3,587E-17
19	6,90000	COMB19	Combination	-144,444	219,732	1,213E-17	-1,663E-16	-4,185E-17
19	0,00000	COMB20	Combination	-104,262	-353,749	1,791E-17	-2,450E-16	6,179E-17
19	0,49286	COMB20	Combination	-104,262	-308,975	1,791E-17	-2,450E-16	5,297E-17
19	0,98571	COMB20	Combination	-104,262	-264,201	1,791E-17	-2,450E-16	4,414E-17
19	1,47857	COMB20	Combination	-104,262	-219,427	1,791E-17	-2,450E-16	3,531E-17
19	1,97143	COMB20	Combination	-104,262	-174,654	1,791E-17	-2,450E-16	2,648E-17
19	2,46429	COMB20	Combination	-104,262	-129,880	1,791E-17	-2,450E-16	1,766E-17
19	2,95714	COMB20	Combination	-104,262	-85,106	1,791E-17	-2,450E-16	8,828E-18
19	3,45000	COMB20	Combination	-104,262	-40,332	1,791E-17	-2,450E-16	0,0000
19	3,94286	COMB20	Combination	-104,262	4,442	1,791E-17	-2,450E-16	-8,828E-18
19	4,43571	COMB20	Combination	-104,262	49,216	1,791E-17	-2,450E-16	-1,766E-17
19	4,92857	COMB20	Combination	-104,262	93,990	1,791E-17	-2,450E-16	-2,648E-17
19	5,42143	COMB20	Combination	-104,262	138,763	1,791E-17	-2,450E-16	-3,531E-17
19	5,91429	COMB20	Combination	-104,262	183,537	1,791E-17	-2,450E-16	-4,414E-17
19	6,40714	COMB20	Combination	-104,262	228,311	1,791E-17	-2,450E-16	-5,297E-17
19	6,90000	COMB20	Combination	-104,262	273,085	1,791E-17	-2,450E-16	-6,179E-17
19	0,00000	COMB21	Combination	-45,104	-246,608	0,000	0,0000	0,0000
19	0,49286	COMB21	Combination	-45,104	-211,378	0,000	0,0000	0,0000
19	0,98571	COMB21	Combination	-45,104	-176,148	0,000	0,0000	0,0000
19	1,47857	COMB21	Combination	-45,104	-140,919	0,000	0,0000	0,0000
19	1,97143	COMB21	Combination	-45,104	-105,689	0,000	0,0000	0,0000
19	2,46429	COMB21	Combination	-45,104	-70,459	0,000	0,0000	0,0000
19	2,95714	COMB21	Combination	-45,104	-35,230	0,000	0,0000	0,0000
19	3,45000	COMB21	Combination	-45,104	2,074E-14	0,000	0,0000	0,0000
19	3,94286	COMB21	Combination	-45,104	35,230	0,000	0,0000	0,0000

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

Codice documento
SS0558_F0.doc

Rev
F0

Data
20/06/2011

Frame Text	Station m	OutputCase Text	CaseType Text	P KN	V2 KN	V3 KN	T KN-m	M2 KN-m
19	4,43571	COMB21	Combination	-45,104	70,459	0,000	0,0000	0,0000
19	4,92857	COMB21	Combination	-45,104	105,689	0,000	0,0000	0,0000
19	5,42143	COMB21	Combination	-45,104	140,919	0,000	0,0000	0,0000
19	5,91429	COMB21	Combination	-45,104	176,148	0,000	0,0000	0,0000
19	6,40714	COMB21	Combination	-45,104	211,378	0,000	0,0000	0,0000
19	6,90000	COMB21	Combination	-45,104	246,608	0,000	0,0000	0,0000
22	0,00000	COMB1	Combination	-491,394	-25,410	0,000	9,978E-17	0,0000
22	0,09857	COMB1	Combination	-491,394	-22,390	0,000	9,978E-17	0,0000
22	0,09857	COMB1	Combination	-491,394	-24,121	0,000	9,978E-17	0,0000
22	0,19714	COMB1	Combination	-491,394	-21,101	0,000	9,978E-17	0,0000
22	0,19714	COMB1	Combination	-491,394	-22,875	0,000	9,978E-17	0,0000
22	0,29571	COMB1	Combination	-491,394	-19,856	0,000	9,978E-17	0,0000
22	0,29571	COMB1	Combination	-491,394	-21,672	0,000	9,978E-17	0,0000
22	0,39429	COMB1	Combination	-491,394	-18,653	0,000	9,978E-17	0,0000
22	0,39429	COMB1	Combination	-491,394	-20,512	0,000	9,978E-17	0,0000
22	0,49286	COMB1	Combination	-491,394	-17,493	0,000	9,978E-17	0,0000
22	0,49286	COMB1	Combination	-491,394	-19,394	0,000	9,978E-17	0,0000
22	0,59143	COMB1	Combination	-491,394	-16,375	0,000	9,978E-17	0,0000
22	0,59143	COMB1	Combination	-491,394	-18,317	0,000	9,978E-17	0,0000
22	0,69000	COMB1	Combination	-491,394	-15,298	0,000	9,978E-17	0,0000
22	0,69000	COMB1	Combination	-491,394	-17,281	0,000	9,978E-17	0,0000
22	0,78857	COMB1	Combination	-491,394	-14,262	0,000	9,978E-17	0,0000
22	0,78857	COMB1	Combination	-491,394	-16,285	0,000	9,978E-17	0,0000
22	0,88714	COMB1	Combination	-491,394	-13,266	0,000	9,978E-17	0,0000
22	0,88714	COMB1	Combination	-491,394	-15,328	0,000	9,978E-17	0,0000
22	0,98571	COMB1	Combination	-491,394	-12,309	0,000	9,978E-17	0,0000
22	0,98571	COMB1	Combination	-491,394	-14,409	0,000	9,978E-17	0,0000
22	1,08429	COMB1	Combination	-491,394	-11,390	0,000	9,978E-17	0,0000
22	1,08429	COMB1	Combination	-491,394	-13,528	0,000	9,978E-17	0,0000
22	1,18286	COMB1	Combination	-491,394	-10,509	0,000	9,978E-17	0,0000
22	1,18286	COMB1	Combination	-491,394	-12,683	0,000	9,978E-17	0,0000
22	1,28143	COMB1	Combination	-491,394	-9,663	0,000	9,978E-17	0,0000
22	1,28143	COMB1	Combination	-491,394	-11,873	0,000	9,978E-17	0,0000
22	1,38000	COMB1	Combination	-491,394	-8,853	0,000	9,978E-17	0,0000
22	1,38000	COMB1	Combination	-491,394	-11,097	0,000	9,978E-17	0,0000
22	1,47857	COMB1	Combination	-491,394	-8,077	0,000	9,978E-17	0,0000
22	1,47857	COMB1	Combination	-491,394	-10,354	0,000	9,978E-17	0,0000
22	1,57714	COMB1	Combination	-491,394	-7,334	0,000	9,978E-17	0,0000
22	1,57714	COMB1	Combination	-491,394	-9,642	0,000	9,978E-17	0,0000
22	1,67571	COMB1	Combination	-491,394	-6,623	0,000	9,978E-17	0,0000
22	1,67571	COMB1	Combination	-491,394	-8,962	0,000	9,978E-17	0,0000
22	1,77429	COMB1	Combination	-491,394	-5,942	0,000	9,978E-17	0,0000
22	1,77429	COMB1	Combination	-491,394	-8,310	0,000	9,978E-17	0,0000
22	1,87286	COMB1	Combination	-491,394	-5,291	0,000	9,978E-17	0,0000
22	1,87286	COMB1	Combination	-491,394	-7,687	0,000	9,978E-17	0,0000
22	1,97143	COMB1	Combination	-491,394	-4,667	0,000	9,978E-17	0,0000
22	1,97143	COMB1	Combination	-491,394	-7,090	0,000	9,978E-17	0,0000
22	2,07000	COMB1	Combination	-491,394	-4,070	0,000	9,978E-17	0,0000
22	2,07000	COMB1	Combination	-491,394	-6,518	0,000	9,978E-17	0,0000
22	2,16857	COMB1	Combination	-491,394	-3,499	0,000	9,978E-17	0,0000
22	2,16857	COMB1	Combination	-491,394	-5,971	0,000	9,978E-17	0,0000
22	2,26714	COMB1	Combination	-491,394	-2,951	0,000	9,978E-17	0,0000
22	2,26714	COMB1	Combination	-491,394	-5,446	0,000	9,978E-17	0,0000
22	2,36571	COMB1	Combination	-491,394	-2,426	0,000	9,978E-17	0,0000
22	2,36571	COMB1	Combination	-491,394	-4,942	0,000	9,978E-17	0,0000
22	2,46429	COMB1	Combination	-491,394	-1,922	0,000	9,978E-17	0,0000
22	2,46429	COMB1	Combination	-491,394	-4,458	0,000	9,978E-17	0,0000
22	2,56286	COMB1	Combination	-491,394	-1,438	0,000	9,978E-17	0,0000
22	2,56286	COMB1	Combination	-491,394	-3,992	0,000	9,978E-17	0,0000
22	2,66143	COMB1	Combination	-491,394	-0,972	0,000	9,978E-17	0,0000
22	2,66143	COMB1	Combination	-491,394	-3,543	0,000	9,978E-17	0,0000
22	2,76000	COMB1	Combination	-491,394	-0,523	0,000	9,978E-17	0,0000
22	2,76000	COMB1	Combination	-491,394	-3,109	0,000	9,978E-17	0,0000

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

Codice documento
SS0558_F0.doc

Rev
F0

Data
20/06/2011

Frame Text	Station m	OutputCase Text	CaseType Text	P KN	V2 KN	V3 KN	T KN-m	M2 KN-m
22	2,85857	COMB1	Combination	-491,394	-0,090	0,000	9,978E-17	0,0000
22	2,85857	COMB1	Combination	-491,394	-2,689	0,000	9,978E-17	0,0000
22	2,95714	COMB1	Combination	-491,394	0,330	0,000	9,978E-17	0,0000
22	2,95714	COMB1	Combination	-491,394	-2,282	0,000	9,978E-17	0,0000
22	3,05571	COMB1	Combination	-491,394	0,737	0,000	9,978E-17	0,0000
22	3,05571	COMB1	Combination	-491,394	-1,886	0,000	9,978E-17	0,0000
22	3,15429	COMB1	Combination	-491,394	1,133	0,000	9,978E-17	0,0000
22	3,15429	COMB1	Combination	-491,394	-1,499	0,000	9,978E-17	0,0000
22	3,25286	COMB1	Combination	-491,394	1,520	0,000	9,978E-17	0,0000
22	3,25286	COMB1	Combination	-491,394	-1,121	0,000	9,978E-17	0,0000
22	3,35143	COMB1	Combination	-491,394	1,899	0,000	9,978E-17	0,0000
22	3,35143	COMB1	Combination	-491,394	-0,749	0,000	9,978E-17	0,0000
22	3,45000	COMB1	Combination	-491,394	2,271	0,000	9,978E-17	0,0000
22	0,00000	COMB2	Combination	-552,858	-26,104	0,000	1,372E-16	0,0000
22	0,09857	COMB2	Combination	-552,858	-23,084	0,000	1,372E-16	0,0000
22	0,09857	COMB2	Combination	-552,858	-24,751	0,000	1,372E-16	0,0000
22	0,19714	COMB2	Combination	-552,858	-21,732	0,000	1,372E-16	0,0000
22	0,19714	COMB2	Combination	-552,858	-23,445	0,000	1,372E-16	0,0000
22	0,29571	COMB2	Combination	-552,858	-20,425	0,000	1,372E-16	0,0000
22	0,29571	COMB2	Combination	-552,858	-22,183	0,000	1,372E-16	0,0000
22	0,39429	COMB2	Combination	-552,858	-19,164	0,000	1,372E-16	0,0000
22	0,39429	COMB2	Combination	-552,858	-20,966	0,000	1,372E-16	0,0000
22	0,49286	COMB2	Combination	-552,858	-17,947	0,000	1,372E-16	0,0000
22	0,49286	COMB2	Combination	-552,858	-19,794	0,000	1,372E-16	0,0000
22	0,59143	COMB2	Combination	-552,858	-16,774	0,000	1,372E-16	0,0000
22	0,59143	COMB2	Combination	-552,858	-18,665	0,000	1,372E-16	0,0000
22	0,69000	COMB2	Combination	-552,858	-15,645	0,000	1,372E-16	0,0000
22	0,69000	COMB2	Combination	-552,858	-17,578	0,000	1,372E-16	0,0000
22	0,78857	COMB2	Combination	-552,858	-14,559	0,000	1,372E-16	0,0000
22	0,78857	COMB2	Combination	-552,858	-16,534	0,000	1,372E-16	0,0000
22	0,88714	COMB2	Combination	-552,858	-13,515	0,000	1,372E-16	0,0000
22	0,88714	COMB2	Combination	-552,858	-15,531	0,000	1,372E-16	0,0000
22	0,98571	COMB2	Combination	-552,858	-12,512	0,000	1,372E-16	0,0000
22	0,98571	COMB2	Combination	-552,858	-14,568	0,000	1,372E-16	0,0000
22	1,08429	COMB2	Combination	-552,858	-11,549	0,000	1,372E-16	0,0000
22	1,08429	COMB2	Combination	-552,858	-13,645	0,000	1,372E-16	0,0000
22	1,18286	COMB2	Combination	-552,858	-10,625	0,000	1,372E-16	0,0000
22	1,18286	COMB2	Combination	-552,858	-12,759	0,000	1,372E-16	0,0000
22	1,28143	COMB2	Combination	-552,858	-9,740	0,000	1,372E-16	0,0000
22	1,28143	COMB2	Combination	-552,858	-11,911	0,000	1,372E-16	0,0000
22	1,38000	COMB2	Combination	-552,858	-8,892	0,000	1,372E-16	0,0000
22	1,38000	COMB2	Combination	-552,858	-11,099	0,000	1,372E-16	0,0000
22	1,47857	COMB2	Combination	-552,858	-8,080	0,000	1,372E-16	0,0000
22	1,47857	COMB2	Combination	-552,858	-10,322	0,000	1,372E-16	0,0000
22	1,57714	COMB2	Combination	-552,858	-7,303	0,000	1,372E-16	0,0000
22	1,57714	COMB2	Combination	-552,858	-9,578	0,000	1,372E-16	0,0000
22	1,67571	COMB2	Combination	-552,858	-6,559	0,000	1,372E-16	0,0000
22	1,67571	COMB2	Combination	-552,858	-8,867	0,000	1,372E-16	0,0000
22	1,77429	COMB2	Combination	-552,858	-5,848	0,000	1,372E-16	0,0000
22	1,77429	COMB2	Combination	-552,858	-8,187	0,000	1,372E-16	0,0000
22	1,87286	COMB2	Combination	-552,858	-5,168	0,000	1,372E-16	0,0000
22	1,87286	COMB2	Combination	-552,858	-7,537	0,000	1,372E-16	0,0000
22	1,97143	COMB2	Combination	-552,858	-4,517	0,000	1,372E-16	0,0000
22	1,97143	COMB2	Combination	-552,858	-6,915	0,000	1,372E-16	0,0000
22	2,07000	COMB2	Combination	-552,858	-3,896	0,000	1,372E-16	0,0000
22	2,07000	COMB2	Combination	-552,858	-6,320	0,000	1,372E-16	0,0000
22	2,16857	COMB2	Combination	-552,858	-3,301	0,000	1,372E-16	0,0000
22	2,16857	COMB2	Combination	-552,858	-5,751	0,000	1,372E-16	0,0000
22	2,26714	COMB2	Combination	-552,858	-2,732	0,000	1,372E-16	0,0000
22	2,26714	COMB2	Combination	-552,858	-5,207	0,000	1,372E-16	0,0000
22	2,36571	COMB2	Combination	-552,858	-2,187	0,000	1,372E-16	0,0000
22	2,36571	COMB2	Combination	-552,858	-4,685	0,000	1,372E-16	0,0000
22	2,46429	COMB2	Combination	-552,858	-1,665	0,000	1,372E-16	0,0000

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

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SS0558_F0.doc

Rev
F0

Data
20/06/2011

Frame Text	Station m	OutputCase Text	CaseType Text	P KN	V2 KN	V3 KN	T KN-m	M2 KN-m
22	2,46429	COMB2	Combination	-552,858	-4,184	0,000	1,372E-16	0,0000
22	2,56286	COMB2	Combination	-552,858	-1,165	0,000	1,372E-16	0,0000
22	2,56286	COMB2	Combination	-552,858	-3,704	0,000	1,372E-16	0,0000
22	2,66143	COMB2	Combination	-552,858	-0,684	0,000	1,372E-16	0,0000
22	2,66143	COMB2	Combination	-552,858	-3,242	0,000	1,372E-16	0,0000
22	2,76000	COMB2	Combination	-552,858	-0,222	0,000	1,372E-16	0,0000
22	2,76000	COMB2	Combination	-552,858	-2,797	0,000	1,372E-16	0,0000
22	2,85857	COMB2	Combination	-552,858	0,223	0,000	1,372E-16	0,0000
22	2,85857	COMB2	Combination	-552,858	-2,367	0,000	1,372E-16	0,0000
22	2,95714	COMB2	Combination	-552,858	0,652	0,000	1,372E-16	0,0000
22	2,95714	COMB2	Combination	-552,858	-1,952	0,000	1,372E-16	0,0000
22	3,05571	COMB2	Combination	-552,858	1,067	0,000	1,372E-16	0,0000
22	3,05571	COMB2	Combination	-552,858	-1,550	0,000	1,372E-16	0,0000
22	3,15429	COMB2	Combination	-552,858	1,470	0,000	1,372E-16	0,0000
22	3,15429	COMB2	Combination	-552,858	-1,158	0,000	1,372E-16	0,0000
22	3,25286	COMB2	Combination	-552,858	1,861	0,000	1,372E-16	0,0000
22	3,25286	COMB2	Combination	-552,858	-0,776	0,000	1,372E-16	0,0000
22	3,35143	COMB2	Combination	-552,858	2,243	0,000	1,372E-16	0,0000
22	3,35143	COMB2	Combination	-552,858	-0,403	0,000	1,372E-16	0,0000
22	3,45000	COMB2	Combination	-552,858	2,617	0,000	1,372E-16	0,0000
22	0,00000	COMB3	Combination	-626,463	-25,410	0,000	9,978E-17	0,0000
22	0,09857	COMB3	Combination	-626,463	-22,390	0,000	9,978E-17	0,0000
22	0,09857	COMB3	Combination	-626,463	-24,121	0,000	9,978E-17	0,0000
22	0,19714	COMB3	Combination	-626,463	-21,101	0,000	9,978E-17	0,0000
22	0,19714	COMB3	Combination	-626,463	-22,875	0,000	9,978E-17	0,0000
22	0,29571	COMB3	Combination	-626,463	-19,856	0,000	9,978E-17	0,0000
22	0,29571	COMB3	Combination	-626,463	-21,672	0,000	9,978E-17	0,0000
22	0,39429	COMB3	Combination	-626,463	-18,653	0,000	9,978E-17	0,0000
22	0,39429	COMB3	Combination	-626,463	-20,512	0,000	9,978E-17	0,0000
22	0,49286	COMB3	Combination	-626,463	-17,493	0,000	9,978E-17	0,0000
22	0,49286	COMB3	Combination	-626,463	-19,394	0,000	9,978E-17	0,0000
22	0,59143	COMB3	Combination	-626,463	-16,375	0,000	9,978E-17	0,0000
22	0,59143	COMB3	Combination	-626,463	-18,317	0,000	9,978E-17	0,0000
22	0,69000	COMB3	Combination	-626,463	-15,298	0,000	9,978E-17	0,0000
22	0,69000	COMB3	Combination	-626,463	-17,281	0,000	9,978E-17	0,0000
22	0,78857	COMB3	Combination	-626,463	-14,262	0,000	9,978E-17	0,0000
22	0,78857	COMB3	Combination	-626,463	-16,285	0,000	9,978E-17	0,0000
22	0,88714	COMB3	Combination	-626,463	-13,266	0,000	9,978E-17	0,0000
22	0,88714	COMB3	Combination	-626,463	-15,328	0,000	9,978E-17	0,0000
22	0,98571	COMB3	Combination	-626,463	-12,309	0,000	9,978E-17	0,0000
22	0,98571	COMB3	Combination	-626,463	-14,409	0,000	9,978E-17	0,0000
22	1,08429	COMB3	Combination	-626,463	-11,390	0,000	9,978E-17	0,0000
22	1,08429	COMB3	Combination	-626,463	-13,528	0,000	9,978E-17	0,0000
22	1,18286	COMB3	Combination	-626,463	-10,509	0,000	9,978E-17	0,0000
22	1,18286	COMB3	Combination	-626,463	-12,683	0,000	9,978E-17	0,0000
22	1,28143	COMB3	Combination	-626,463	-9,663	0,000	9,978E-17	0,0000
22	1,28143	COMB3	Combination	-626,463	-11,873	0,000	9,978E-17	0,0000
22	1,38000	COMB3	Combination	-626,463	-8,853	0,000	9,978E-17	0,0000
22	1,38000	COMB3	Combination	-626,463	-11,097	0,000	9,978E-17	0,0000
22	1,47857	COMB3	Combination	-626,463	-8,077	0,000	9,978E-17	0,0000
22	1,47857	COMB3	Combination	-626,463	-10,354	0,000	9,978E-17	0,0000
22	1,57714	COMB3	Combination	-626,463	-7,334	0,000	9,978E-17	0,0000
22	1,57714	COMB3	Combination	-626,463	-9,642	0,000	9,978E-17	0,0000
22	1,67571	COMB3	Combination	-626,463	-6,623	0,000	9,978E-17	0,0000
22	1,67571	COMB3	Combination	-626,463	-8,962	0,000	9,978E-17	0,0000
22	1,77429	COMB3	Combination	-626,463	-5,942	0,000	9,978E-17	0,0000
22	1,77429	COMB3	Combination	-626,463	-8,310	0,000	9,978E-17	0,0000
22	1,87286	COMB3	Combination	-626,463	-5,291	0,000	9,978E-17	0,0000
22	1,87286	COMB3	Combination	-626,463	-7,687	0,000	9,978E-17	0,0000
22	1,97143	COMB3	Combination	-626,463	-4,667	0,000	9,978E-17	0,0000
22	1,97143	COMB3	Combination	-626,463	-7,090	0,000	9,978E-17	0,0000
22	2,07000	COMB3	Combination	-626,463	-4,070	0,000	9,978E-17	0,0000
22	2,07000	COMB3	Combination	-626,463	-6,518	0,000	9,978E-17	0,0000

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

Codice documento
SS0558_F0.doc

Rev
F0

Data
20/06/2011

Frame Text	Station m	OutputCase Text	CaseType Text	P KN	V2 KN	V3 KN	T KN-m	M2 KN-m
22	2,16857	COMB3	Combination	-626,463	-3,499	0,000	9,978E-17	0,0000
22	2,16857	COMB3	Combination	-626,463	-5,971	0,000	9,978E-17	0,0000
22	2,26714	COMB3	Combination	-626,463	-2,951	0,000	9,978E-17	0,0000
22	2,26714	COMB3	Combination	-626,463	-5,446	0,000	9,978E-17	0,0000
22	2,36571	COMB3	Combination	-626,463	-2,426	0,000	9,978E-17	0,0000
22	2,36571	COMB3	Combination	-626,463	-4,942	0,000	9,978E-17	0,0000
22	2,46429	COMB3	Combination	-626,463	-1,922	0,000	9,978E-17	0,0000
22	2,46429	COMB3	Combination	-626,463	-4,458	0,000	9,978E-17	0,0000
22	2,56286	COMB3	Combination	-626,463	-1,438	0,000	9,978E-17	0,0000
22	2,56286	COMB3	Combination	-626,463	-3,992	0,000	9,978E-17	0,0000
22	2,66143	COMB3	Combination	-626,463	-0,972	0,000	9,978E-17	0,0000
22	2,66143	COMB3	Combination	-626,463	-3,543	0,000	9,978E-17	0,0000
22	2,76000	COMB3	Combination	-626,463	-0,523	0,000	9,978E-17	0,0000
22	2,76000	COMB3	Combination	-626,463	-3,109	0,000	9,978E-17	0,0000
22	2,85857	COMB3	Combination	-626,463	-0,090	0,000	9,978E-17	0,0000
22	2,85857	COMB3	Combination	-626,463	-2,689	0,000	9,978E-17	0,0000
22	2,95714	COMB3	Combination	-626,463	0,330	0,000	9,978E-17	0,0000
22	2,95714	COMB3	Combination	-626,463	-2,282	0,000	9,978E-17	0,0000
22	3,05571	COMB3	Combination	-626,463	0,737	0,000	9,978E-17	0,0000
22	3,05571	COMB3	Combination	-626,463	-1,886	0,000	9,978E-17	0,0000
22	3,15429	COMB3	Combination	-626,463	1,133	0,000	9,978E-17	0,0000
22	3,15429	COMB3	Combination	-626,463	-1,499	0,000	9,978E-17	0,0000
22	3,25286	COMB3	Combination	-626,463	1,520	0,000	9,978E-17	0,0000
22	3,25286	COMB3	Combination	-626,463	-1,121	0,000	9,978E-17	0,0000
22	3,35143	COMB3	Combination	-626,463	1,899	0,000	9,978E-17	0,0000
22	3,35143	COMB3	Combination	-626,463	-0,749	0,000	9,978E-17	0,0000
22	3,45000	COMB3	Combination	-626,463	2,271	0,000	9,978E-17	0,0000
22	0,00000	COMB4	Combination	-719,602	-26,461	0,000	1,564E-16	0,0000
22	0,09857	COMB4	Combination	-719,602	-23,442	0,000	1,564E-16	0,0000
22	0,09857	COMB4	Combination	-719,602	-25,076	0,000	1,564E-16	0,0000
22	0,19714	COMB4	Combination	-719,602	-22,057	0,000	1,564E-16	0,0000
22	0,19714	COMB4	Combination	-719,602	-23,738	0,000	1,564E-16	0,0000
22	0,29571	COMB4	Combination	-719,602	-20,719	0,000	1,564E-16	0,0000
22	0,29571	COMB4	Combination	-719,602	-22,446	0,000	1,564E-16	0,0000
22	0,39429	COMB4	Combination	-719,602	-19,427	0,000	1,564E-16	0,0000
22	0,39429	COMB4	Combination	-719,602	-21,200	0,000	1,564E-16	0,0000
22	0,49286	COMB4	Combination	-719,602	-18,181	0,000	1,564E-16	0,0000
22	0,49286	COMB4	Combination	-719,602	-20,000	0,000	1,564E-16	0,0000
22	0,59143	COMB4	Combination	-719,602	-16,980	0,000	1,564E-16	0,0000
22	0,59143	COMB4	Combination	-719,602	-18,843	0,000	1,564E-16	0,0000
22	0,69000	COMB4	Combination	-719,602	-15,824	0,000	1,564E-16	0,0000
22	0,69000	COMB4	Combination	-719,602	-17,731	0,000	1,564E-16	0,0000
22	0,78857	COMB4	Combination	-719,602	-14,712	0,000	1,564E-16	0,0000
22	0,78857	COMB4	Combination	-719,602	-16,662	0,000	1,564E-16	0,0000
22	0,88714	COMB4	Combination	-719,602	-13,643	0,000	1,564E-16	0,0000
22	0,88714	COMB4	Combination	-719,602	-15,635	0,000	1,564E-16	0,0000
22	0,98571	COMB4	Combination	-719,602	-12,616	0,000	1,564E-16	0,0000
22	0,98571	COMB4	Combination	-719,602	-14,650	0,000	1,564E-16	0,0000
22	1,08429	COMB4	Combination	-719,602	-11,630	0,000	1,564E-16	0,0000
22	1,08429	COMB4	Combination	-719,602	-13,705	0,000	1,564E-16	0,0000
22	1,18286	COMB4	Combination	-719,602	-10,685	0,000	1,564E-16	0,0000
22	1,18286	COMB4	Combination	-719,602	-12,799	0,000	1,564E-16	0,0000
22	1,28143	COMB4	Combination	-719,602	-9,779	0,000	1,564E-16	0,0000
22	1,28143	COMB4	Combination	-719,602	-11,931	0,000	1,564E-16	0,0000
22	1,38000	COMB4	Combination	-719,602	-8,912	0,000	1,564E-16	0,0000
22	1,38000	COMB4	Combination	-719,602	-11,100	0,000	1,564E-16	0,0000
22	1,47857	COMB4	Combination	-719,602	-8,081	0,000	1,564E-16	0,0000
22	1,47857	COMB4	Combination	-719,602	-10,306	0,000	1,564E-16	0,0000
22	1,57714	COMB4	Combination	-719,602	-7,286	0,000	1,564E-16	0,0000
22	1,57714	COMB4	Combination	-719,602	-9,545	0,000	1,564E-16	0,0000
22	1,67571	COMB4	Combination	-719,602	-6,526	0,000	1,564E-16	0,0000
22	1,67571	COMB4	Combination	-719,602	-8,819	0,000	1,564E-16	0,0000
22	1,77429	COMB4	Combination	-719,602	-5,799	0,000	1,564E-16	0,0000

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

Codice documento
SS0558_F0.doc

Rev
F0

Data
20/06/2011

Frame Text	Station m	OutputCase Text	CaseType Text	P KN	V2 KN	V3 KN	T KN-m	M2 KN-m
22	1,77429	COMB4	Combination	-719,602	-8,124	0,000	1,564E-16	0,0000
22	1,87286	COMB4	Combination	-719,602	-5,104	0,000	1,564E-16	0,0000
22	1,87286	COMB4	Combination	-719,602	-7,460	0,000	1,564E-16	0,0000
22	1,97143	COMB4	Combination	-719,602	-4,440	0,000	1,564E-16	0,0000
22	1,97143	COMB4	Combination	-719,602	-6,825	0,000	1,564E-16	0,0000
22	2,07000	COMB4	Combination	-719,602	-3,806	0,000	1,564E-16	0,0000
22	2,07000	COMB4	Combination	-719,602	-6,218	0,000	1,564E-16	0,0000
22	2,16857	COMB4	Combination	-719,602	-3,199	0,000	1,564E-16	0,0000
22	2,16857	COMB4	Combination	-719,602	-5,638	0,000	1,564E-16	0,0000
22	2,26714	COMB4	Combination	-719,602	-2,619	0,000	1,564E-16	0,0000
22	2,26714	COMB4	Combination	-719,602	-5,083	0,000	1,564E-16	0,0000
22	2,36571	COMB4	Combination	-719,602	-2,064	0,000	1,564E-16	0,0000
22	2,36571	COMB4	Combination	-719,602	-4,552	0,000	1,564E-16	0,0000
22	2,46429	COMB4	Combination	-719,602	-1,533	0,000	1,564E-16	0,0000
22	2,46429	COMB4	Combination	-719,602	-4,043	0,000	1,564E-16	0,0000
22	2,56286	COMB4	Combination	-719,602	-1,024	0,000	1,564E-16	0,0000
22	2,56286	COMB4	Combination	-719,602	-3,555	0,000	1,564E-16	0,0000
22	2,66143	COMB4	Combination	-719,602	-0,536	0,000	1,564E-16	0,0000
22	2,66143	COMB4	Combination	-719,602	-3,087	0,000	1,564E-16	0,0000
22	2,76000	COMB4	Combination	-719,602	-0,067	0,000	1,564E-16	0,0000
22	2,76000	COMB4	Combination	-719,602	-2,636	0,000	1,564E-16	0,0000
22	2,85857	COMB4	Combination	-719,602	0,384	0,000	1,564E-16	0,0000
22	2,85857	COMB4	Combination	-719,602	-2,202	0,000	1,564E-16	0,0000
22	2,95714	COMB4	Combination	-719,602	0,818	0,000	1,564E-16	0,0000
22	2,95714	COMB4	Combination	-719,602	-1,782	0,000	1,564E-16	0,0000
22	3,05571	COMB4	Combination	-719,602	1,237	0,000	1,564E-16	0,0000
22	3,05571	COMB4	Combination	-719,602	-1,376	0,000	1,564E-16	0,0000
22	3,15429	COMB4	Combination	-719,602	1,643	0,000	1,564E-16	0,0000
22	3,15429	COMB4	Combination	-719,602	-0,982	0,000	1,564E-16	0,0000
22	3,25286	COMB4	Combination	-719,602	2,037	0,000	1,564E-16	0,0000
22	3,25286	COMB4	Combination	-719,602	-0,599	0,000	1,564E-16	0,0000
22	3,35143	COMB4	Combination	-719,602	2,421	0,000	1,564E-16	0,0000
22	3,35143	COMB4	Combination	-719,602	-0,224	0,000	1,564E-16	0,0000
22	3,45000	COMB4	Combination	-719,602	2,795	0,000	1,564E-16	0,0000
22	0,00000	COMB5	Combination	-608,751	-24,524	0	9,719E-17	0
22	0,09857	COMB5	Combination	-608,751	-22,201	0	9,719E-17	0
22	0,09857	COMB5	Combination	-608,751	-23,269	0	9,719E-17	0
22	0,19714	COMB5	Combination	-608,751	-20,947	0	9,719E-17	0
22	0,19714	COMB5	Combination	-608,751	-22,057	0	9,719E-17	0
22	0,29571	COMB5	Combination	-608,751	-19,734	0	9,719E-17	0
22	0,29571	COMB5	Combination	-608,751	-20,886	0	9,719E-17	0
22	0,39429	COMB5	Combination	-608,751	-18,564	0	9,719E-17	0
22	0,39429	COMB5	Combination	-608,751	-19,757	0	9,719E-17	0
22	0,49286	COMB5	Combination	-608,751	-17,434	0	9,719E-17	0
22	0,49286	COMB5	Combination	-608,751	-18,669	0	9,719E-17	0
22	0,59143	COMB5	Combination	-608,751	-16,346	0	9,719E-17	0
22	0,59143	COMB5	Combination	-608,751	-17,62	0	9,719E-17	0
22	0,69000	COMB5	Combination	-608,751	-15,298	0	9,719E-17	0
22	0,69000	COMB5	Combination	-608,751	-16,612	0	9,719E-17	0
22	0,78857	COMB5	Combination	-608,751	-14,289	0	9,719E-17	0
22	0,78857	COMB5	Combination	-608,751	-15,642	0	9,719E-17	0
22	0,88714	COMB5	Combination	-608,751	-13,32	0	9,719E-17	0
22	0,88714	COMB5	Combination	-608,751	-14,711	0	9,719E-17	0
22	0,98571	COMB5	Combination	-608,751	-12,388	0	9,719E-17	0
22	0,98571	COMB5	Combination	-608,751	-13,816	0	9,719E-17	0
22	1,08429	COMB5	Combination	-608,751	-11,493	0	9,719E-17	0
22	1,08429	COMB5	Combination	-608,751	-12,958	0	9,719E-17	0
22	1,18286	COMB5	Combination	-608,751	-10,635	0	9,719E-17	0
22	1,18286	COMB5	Combination	-608,751	-12,135	0	9,719E-17	0
22	1,28143	COMB5	Combination	-608,751	-9,812	0	9,719E-17	0
22	1,28143	COMB5	Combination	-608,751	-11,346	0	9,719E-17	0
22	1,38000	COMB5	Combination	-608,751	-9,023	0	9,719E-17	0
22	1,38000	COMB5	Combination	-608,751	-10,59	0	9,719E-17	0

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

Codice documento
SS0558_F0.doc

Rev
F0

Data
20/06/2011

Frame Text	Station m	OutputCase Text	CaseType Text	P KN	V2 KN	V3 KN	T KN-m	M2 KN-m
22	1,47857	COMB5	Combination	-608,751	-8,268	0	9,719E-17	0
22	1,47857	COMB5	Combination	-608,751	-9,867	0	9,719E-17	0
22	1,57714	COMB5	Combination	-608,751	-7,544	0	9,719E-17	0
22	1,57714	COMB5	Combination	-608,751	-9,174	0	9,719E-17	0
22	1,67571	COMB5	Combination	-608,751	-6,851	0	9,719E-17	0
22	1,67571	COMB5	Combination	-608,751	-8,51	0	9,719E-17	0
22	1,77429	COMB5	Combination	-608,751	-6,188	0	9,719E-17	0
22	1,77429	COMB5	Combination	-608,751	-7,876	0	9,719E-17	0
22	1,87286	COMB5	Combination	-608,751	-5,553	0	9,719E-17	0
22	1,87286	COMB5	Combination	-608,751	-7,268	0	9,719E-17	0
22	1,97143	COMB5	Combination	-608,751	-4,945	0	9,719E-17	0
22	1,97143	COMB5	Combination	-608,751	-6,686	0	9,719E-17	0
22	2,07000	COMB5	Combination	-608,751	-4,363	0	9,719E-17	0
22	2,07000	COMB5	Combination	-608,751	-6,129	0	9,719E-17	0
22	2,16857	COMB5	Combination	-608,751	-3,806	0	9,719E-17	0
22	2,16857	COMB5	Combination	-608,751	-5,594	0	9,719E-17	0
22	2,26714	COMB5	Combination	-608,751	-3,272	0	9,719E-17	0
22	2,26714	COMB5	Combination	-608,751	-5,082	0	9,719E-17	0
22	2,36571	COMB5	Combination	-608,751	-2,759	0	9,719E-17	0
22	2,36571	COMB5	Combination	-608,751	-4,59	0	9,719E-17	0
22	2,46429	COMB5	Combination	-608,751	-2,268	0	9,719E-17	0
22	2,46429	COMB5	Combination	-608,751	-4,117	0	9,719E-17	0
22	2,56286	COMB5	Combination	-608,751	-1,795	0	9,719E-17	0
22	2,56286	COMB5	Combination	-608,751	-3,662	0	9,719E-17	0
22	2,66143	COMB5	Combination	-608,751	-1,34	0	9,719E-17	0
22	2,66143	COMB5	Combination	-608,751	-3,223	0	9,719E-17	0
22	2,76000	COMB5	Combination	-608,751	-0,901	0	9,719E-17	0
22	2,76000	COMB5	Combination	-608,751	-2,799	0	9,719E-17	0
22	2,85857	COMB5	Combination	-608,751	-0,476	0	9,719E-17	0
22	2,85857	COMB5	Combination	-608,751	-2,388	0	9,719E-17	0
22	2,95714	COMB5	Combination	-608,751	-0,066	0	9,719E-17	0
22	2,95714	COMB5	Combination	-608,751	-1,989	0	9,719E-17	0
22	3,05571	COMB5	Combination	-608,751	0,333	0	9,719E-17	0
22	3,05571	COMB5	Combination	-608,751	-1,601	0	9,719E-17	0
22	3,15429	COMB5	Combination	-608,751	0,722	0	9,719E-17	0
22	3,15429	COMB5	Combination	-608,751	-1,222	0	9,719E-17	0
22	3,25286	COMB5	Combination	-608,751	1,101	0	9,719E-17	0
22	3,25286	COMB5	Combination	-608,751	-0,85	0	9,719E-17	0
22	3,35143	COMB5	Combination	-608,751	1,473	0	9,719E-17	0
22	3,35143	COMB5	Combination	-608,751	-0,484	0	9,719E-17	0
22	3,45000	COMB5	Combination	-608,751	1,838	0	9,719E-17	0
22	0,00000	COMB6	Combination	-229,278	-25,410	0,000	9,978E-17	0,0000
22	0,09857	COMB6	Combination	-229,278	-22,390	0,000	9,978E-17	0,0000
22	0,09857	COMB6	Combination	-229,278	-24,121	0,000	9,978E-17	0,0000
22	0,19714	COMB6	Combination	-229,278	-21,101	0,000	9,978E-17	0,0000
22	0,19714	COMB6	Combination	-229,278	-22,875	0,000	9,978E-17	0,0000
22	0,29571	COMB6	Combination	-229,278	-19,856	0,000	9,978E-17	0,0000
22	0,29571	COMB6	Combination	-229,278	-21,672	0,000	9,978E-17	0,0000
22	0,39429	COMB6	Combination	-229,278	-18,653	0,000	9,978E-17	0,0000
22	0,39429	COMB6	Combination	-229,278	-20,512	0,000	9,978E-17	0,0000
22	0,49286	COMB6	Combination	-229,278	-17,493	0,000	9,978E-17	0,0000
22	0,49286	COMB6	Combination	-229,278	-19,394	0,000	9,978E-17	0,0000
22	0,59143	COMB6	Combination	-229,278	-16,375	0,000	9,978E-17	0,0000
22	0,59143	COMB6	Combination	-229,278	-18,317	0,000	9,978E-17	0,0000
22	0,69000	COMB6	Combination	-229,278	-15,298	0,000	9,978E-17	0,0000
22	0,69000	COMB6	Combination	-229,278	-17,281	0,000	9,978E-17	0,0000
22	0,78857	COMB6	Combination	-229,278	-14,262	0,000	9,978E-17	0,0000
22	0,78857	COMB6	Combination	-229,278	-16,285	0,000	9,978E-17	0,0000
22	0,88714	COMB6	Combination	-229,278	-13,266	0,000	9,978E-17	0,0000
22	0,88714	COMB6	Combination	-229,278	-15,328	0,000	9,978E-17	0,0000
22	0,98571	COMB6	Combination	-229,278	-12,309	0,000	9,978E-17	0,0000
22	0,98571	COMB6	Combination	-229,278	-14,409	0,000	9,978E-17	0,0000
22	1,08429	COMB6	Combination	-229,278	-11,390	0,000	9,978E-17	0,0000

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

Codice documento
SS0558_F0.doc

Rev
F0

Data
20/06/2011

Frame Text	Station m	OutputCase Text	CaseType Text	P KN	V2 KN	V3 KN	T KN-m	M2 KN-m
22	1,08429	COMB6	Combination	-229,278	-13,528	0,000	9,978E-17	0,0000
22	1,18286	COMB6	Combination	-229,278	-10,509	0,000	9,978E-17	0,0000
22	1,18286	COMB6	Combination	-229,278	-12,683	0,000	9,978E-17	0,0000
22	1,28143	COMB6	Combination	-229,278	-9,663	0,000	9,978E-17	0,0000
22	1,28143	COMB6	Combination	-229,278	-11,873	0,000	9,978E-17	0,0000
22	1,38000	COMB6	Combination	-229,278	-8,853	0,000	9,978E-17	0,0000
22	1,38000	COMB6	Combination	-229,278	-11,097	0,000	9,978E-17	0,0000
22	1,47857	COMB6	Combination	-229,278	-8,077	0,000	9,978E-17	0,0000
22	1,47857	COMB6	Combination	-229,278	-10,354	0,000	9,978E-17	0,0000
22	1,57714	COMB6	Combination	-229,278	-7,334	0,000	9,978E-17	0,0000
22	1,57714	COMB6	Combination	-229,278	-9,642	0,000	9,978E-17	0,0000
22	1,67571	COMB6	Combination	-229,278	-6,623	0,000	9,978E-17	0,0000
22	1,67571	COMB6	Combination	-229,278	-8,962	0,000	9,978E-17	0,0000
22	1,77429	COMB6	Combination	-229,278	-5,942	0,000	9,978E-17	0,0000
22	1,77429	COMB6	Combination	-229,278	-8,310	0,000	9,978E-17	0,0000
22	1,87286	COMB6	Combination	-229,278	-5,291	0,000	9,978E-17	0,0000
22	1,87286	COMB6	Combination	-229,278	-7,687	0,000	9,978E-17	0,0000
22	1,97143	COMB6	Combination	-229,278	-4,667	0,000	9,978E-17	0,0000
22	1,97143	COMB6	Combination	-229,278	-7,090	0,000	9,978E-17	0,0000
22	2,07000	COMB6	Combination	-229,278	-4,070	0,000	9,978E-17	0,0000
22	2,07000	COMB6	Combination	-229,278	-6,518	0,000	9,978E-17	0,0000
22	2,16857	COMB6	Combination	-229,278	-3,499	0,000	9,978E-17	0,0000
22	2,16857	COMB6	Combination	-229,278	-5,971	0,000	9,978E-17	0,0000
22	2,26714	COMB6	Combination	-229,278	-2,951	0,000	9,978E-17	0,0000
22	2,26714	COMB6	Combination	-229,278	-5,446	0,000	9,978E-17	0,0000
22	2,36571	COMB6	Combination	-229,278	-2,426	0,000	9,978E-17	0,0000
22	2,36571	COMB6	Combination	-229,278	-4,942	0,000	9,978E-17	0,0000
22	2,46429	COMB6	Combination	-229,278	-1,922	0,000	9,978E-17	0,0000
22	2,46429	COMB6	Combination	-229,278	-4,458	0,000	9,978E-17	0,0000
22	2,56286	COMB6	Combination	-229,278	-1,438	0,000	9,978E-17	0,0000
22	2,56286	COMB6	Combination	-229,278	-3,992	0,000	9,978E-17	0,0000
22	2,66143	COMB6	Combination	-229,278	-0,972	0,000	9,978E-17	0,0000
22	2,66143	COMB6	Combination	-229,278	-3,543	0,000	9,978E-17	0,0000
22	2,76000	COMB6	Combination	-229,278	-0,523	0,000	9,978E-17	0,0000
22	2,76000	COMB6	Combination	-229,278	-3,109	0,000	9,978E-17	0,0000
22	2,85857	COMB6	Combination	-229,278	-0,090	0,000	9,978E-17	0,0000
22	2,85857	COMB6	Combination	-229,278	-2,689	0,000	9,978E-17	0,0000
22	2,95714	COMB6	Combination	-229,278	0,330	0,000	9,978E-17	0,0000
22	2,95714	COMB6	Combination	-229,278	-2,282	0,000	9,978E-17	0,0000
22	3,05571	COMB6	Combination	-229,278	0,737	0,000	9,978E-17	0,0000
22	3,05571	COMB6	Combination	-229,278	-1,886	0,000	9,978E-17	0,0000
22	3,15429	COMB6	Combination	-229,278	1,133	0,000	9,978E-17	0,0000
22	3,15429	COMB6	Combination	-229,278	-1,499	0,000	9,978E-17	0,0000
22	3,25286	COMB6	Combination	-229,278	1,520	0,000	9,978E-17	0,0000
22	3,25286	COMB6	Combination	-229,278	-1,121	0,000	9,978E-17	0,0000
22	3,35143	COMB6	Combination	-229,278	1,899	0,000	9,978E-17	0,0000
22	3,35143	COMB6	Combination	-229,278	-0,749	0,000	9,978E-17	0,0000
22	3,45000	COMB6	Combination	-229,278	2,271	0,000	9,978E-17	0,0000
22	0,00000	COMB7	Combination	-423,222	-18,026	0,000	8,499E-17	0,0000
22	0,09857	COMB7	Combination	-423,222	-15,704	0,000	8,499E-17	0,0000
22	0,09857	COMB7	Combination	-423,222	-17,106	0,000	8,499E-17	0,0000
22	0,19714	COMB7	Combination	-423,222	-14,783	0,000	8,499E-17	0,0000
22	0,19714	COMB7	Combination	-423,222	-16,216	0,000	8,499E-17	0,0000
22	0,29571	COMB7	Combination	-423,222	-13,893	0,000	8,499E-17	0,0000
22	0,29571	COMB7	Combination	-423,222	-15,357	0,000	8,499E-17	0,0000
22	0,39429	COMB7	Combination	-423,222	-13,034	0,000	8,499E-17	0,0000
22	0,39429	COMB7	Combination	-423,222	-14,528	0,000	8,499E-17	0,0000
22	0,49286	COMB7	Combination	-423,222	-12,205	0,000	8,499E-17	0,0000
22	0,49286	COMB7	Combination	-423,222	-13,730	0,000	8,499E-17	0,0000
22	0,59143	COMB7	Combination	-423,222	-11,407	0,000	8,499E-17	0,0000
22	0,59143	COMB7	Combination	-423,222	-12,961	0,000	8,499E-17	0,0000
22	0,69000	COMB7	Combination	-423,222	-10,638	0,000	8,499E-17	0,0000
22	0,69000	COMB7	Combination	-423,222	-12,221	0,000	8,499E-17	0,0000

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

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SS0558_F0.doc

Rev
F0

Data
20/06/2011

Frame Text	Station m	OutputCase Text	CaseType Text	P KN	V2 KN	V3 KN	T KN-m	M2 KN-m
22	0,78857	COMB7	Combination	-423,222	-9,898	0,000	8,499E-17	0,0000
22	0,78857	COMB7	Combination	-423,222	-11,509	0,000	8,499E-17	0,0000
22	0,88714	COMB7	Combination	-423,222	-9,187	0,000	8,499E-17	0,0000
22	0,88714	COMB7	Combination	-423,222	-10,826	0,000	8,499E-17	0,0000
22	0,98571	COMB7	Combination	-423,222	-8,504	0,000	8,499E-17	0,0000
22	0,98571	COMB7	Combination	-423,222	-10,170	0,000	8,499E-17	0,0000
22	1,08429	COMB7	Combination	-423,222	-7,848	0,000	8,499E-17	0,0000
22	1,08429	COMB7	Combination	-423,222	-9,541	0,000	8,499E-17	0,0000
22	1,18286	COMB7	Combination	-423,222	-7,219	0,000	8,499E-17	0,0000
22	1,18286	COMB7	Combination	-423,222	-8,938	0,000	8,499E-17	0,0000
22	1,28143	COMB7	Combination	-423,222	-6,615	0,000	8,499E-17	0,0000
22	1,28143	COMB7	Combination	-423,222	-8,360	0,000	8,499E-17	0,0000
22	1,38000	COMB7	Combination	-423,222	-6,037	0,000	8,499E-17	0,0000
22	1,38000	COMB7	Combination	-423,222	-7,807	0,000	8,499E-17	0,0000
22	1,47857	COMB7	Combination	-423,222	-5,484	0,000	8,499E-17	0,0000
22	1,47857	COMB7	Combination	-423,222	-7,277	0,000	8,499E-17	0,0000
22	1,57714	COMB7	Combination	-423,222	-4,954	0,000	8,499E-17	0,0000
22	1,57714	COMB7	Combination	-423,222	-6,770	0,000	8,499E-17	0,0000
22	1,67571	COMB7	Combination	-423,222	-4,447	0,000	8,499E-17	0,0000
22	1,67571	COMB7	Combination	-423,222	-6,285	0,000	8,499E-17	0,0000
22	1,77429	COMB7	Combination	-423,222	-3,962	0,000	8,499E-17	0,0000
22	1,77429	COMB7	Combination	-423,222	-5,821	0,000	8,499E-17	0,0000
22	1,87286	COMB7	Combination	-423,222	-3,498	0,000	8,499E-17	0,0000
22	1,87286	COMB7	Combination	-423,222	-5,377	0,000	8,499E-17	0,0000
22	1,97143	COMB7	Combination	-423,222	-3,055	0,000	8,499E-17	0,0000
22	1,97143	COMB7	Combination	-423,222	-4,953	0,000	8,499E-17	0,0000
22	2,07000	COMB7	Combination	-423,222	-2,630	0,000	8,499E-17	0,0000
22	2,07000	COMB7	Combination	-423,222	-4,547	0,000	8,499E-17	0,0000
22	2,16857	COMB7	Combination	-423,222	-2,224	0,000	8,499E-17	0,0000
22	2,16857	COMB7	Combination	-423,222	-4,158	0,000	8,499E-17	0,0000
22	2,26714	COMB7	Combination	-423,222	-1,835	0,000	8,499E-17	0,0000
22	2,26714	COMB7	Combination	-423,222	-3,785	0,000	8,499E-17	0,0000
22	2,36571	COMB7	Combination	-423,222	-1,463	0,000	8,499E-17	0,0000
22	2,36571	COMB7	Combination	-423,222	-3,428	0,000	8,499E-17	0,0000
22	2,46429	COMB7	Combination	-423,222	-1,106	0,000	8,499E-17	0,0000
22	2,46429	COMB7	Combination	-423,222	-3,086	0,000	8,499E-17	0,0000
22	2,56286	COMB7	Combination	-423,222	-0,763	0,000	8,499E-17	0,0000
22	2,56286	COMB7	Combination	-423,222	-2,757	0,000	8,499E-17	0,0000
22	2,66143	COMB7	Combination	-423,222	-0,434	0,000	8,499E-17	0,0000
22	2,66143	COMB7	Combination	-423,222	-2,440	0,000	8,499E-17	0,0000
22	2,76000	COMB7	Combination	-423,222	-0,117	0,000	8,499E-17	0,0000
22	2,76000	COMB7	Combination	-423,222	-2,134	0,000	8,499E-17	0,0000
22	2,85857	COMB7	Combination	-423,222	0,188	0,000	8,499E-17	0,0000
22	2,85857	COMB7	Combination	-423,222	-1,839	0,000	8,499E-17	0,0000
22	2,95714	COMB7	Combination	-423,222	0,483	0,000	8,499E-17	0,0000
22	2,95714	COMB7	Combination	-423,222	-1,554	0,000	8,499E-17	0,0000
22	3,05571	COMB7	Combination	-423,222	0,769	0,000	8,499E-17	0,0000
22	3,05571	COMB7	Combination	-423,222	-1,276	0,000	8,499E-17	0,0000
22	3,15429	COMB7	Combination	-423,222	1,046	0,000	8,499E-17	0,0000
22	3,15429	COMB7	Combination	-423,222	-1,006	0,000	8,499E-17	0,0000
22	3,25286	COMB7	Combination	-423,222	1,316	0,000	8,499E-17	0,0000
22	3,25286	COMB7	Combination	-423,222	-0,742	0,000	8,499E-17	0,0000
22	3,35143	COMB7	Combination	-423,222	1,580	0,000	8,499E-17	0,0000
22	3,35143	COMB7	Combination	-423,222	-0,484	0,000	8,499E-17	0,0000
22	3,45000	COMB7	Combination	-423,222	1,839	0,000	8,499E-17	0,0000
22	0,00000	COMB8	Combination	-476,490	-18,628	0,000	1,174E-16	0,0000
22	0,09857	COMB8	Combination	-476,490	-16,305	0,000	1,174E-16	0,0000
22	0,09857	COMB8	Combination	-476,490	-17,652	0,000	1,174E-16	0,0000
22	0,19714	COMB8	Combination	-476,490	-15,329	0,000	1,174E-16	0,0000
22	0,19714	COMB8	Combination	-476,490	-16,709	0,000	1,174E-16	0,0000
22	0,29571	COMB8	Combination	-476,490	-14,387	0,000	1,174E-16	0,0000
22	0,29571	COMB8	Combination	-476,490	-15,799	0,000	1,174E-16	0,0000
22	0,39429	COMB8	Combination	-476,490	-13,477	0,000	1,174E-16	0,0000

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

Codice documento

SS0558_F0.doc

Rev

F0

Data

20/06/2011

Frame Text	Station m	OutputCase Text	CaseType Text	P KN	V2 KN	V3 KN	T KN-m	M2 KN-m
22	0,39429	COMB8	Combination	-476,490	-14,922	0,000	1,174E-16	0,0000
22	0,49286	COMB8	Combination	-476,490	-12,599	0,000	1,174E-16	0,0000
22	0,49286	COMB8	Combination	-476,490	-14,076	0,000	1,174E-16	0,0000
22	0,59143	COMB8	Combination	-476,490	-11,753	0,000	1,174E-16	0,0000
22	0,59143	COMB8	Combination	-476,490	-13,261	0,000	1,174E-16	0,0000
22	0,69000	COMB8	Combination	-476,490	-10,939	0,000	1,174E-16	0,0000
22	0,69000	COMB8	Combination	-476,490	-12,478	0,000	1,174E-16	0,0000
22	0,78857	COMB8	Combination	-476,490	-10,155	0,000	1,174E-16	0,0000
22	0,78857	COMB8	Combination	-476,490	-11,725	0,000	1,174E-16	0,0000
22	0,88714	COMB8	Combination	-476,490	-9,402	0,000	1,174E-16	0,0000
22	0,88714	COMB8	Combination	-476,490	-11,002	0,000	1,174E-16	0,0000
22	0,98571	COMB8	Combination	-476,490	-8,679	0,000	1,174E-16	0,0000
22	0,98571	COMB8	Combination	-476,490	-10,308	0,000	1,174E-16	0,0000
22	1,08429	COMB8	Combination	-476,490	-7,985	0,000	1,174E-16	0,0000
22	1,08429	COMB8	Combination	-476,490	-9,642	0,000	1,174E-16	0,0000
22	1,18286	COMB8	Combination	-476,490	-7,320	0,000	1,174E-16	0,0000
22	1,18286	COMB8	Combination	-476,490	-9,004	0,000	1,174E-16	0,0000
22	1,28143	COMB8	Combination	-476,490	-6,682	0,000	1,174E-16	0,0000
22	1,28143	COMB8	Combination	-476,490	-8,394	0,000	1,174E-16	0,0000
22	1,38000	COMB8	Combination	-476,490	-6,071	0,000	1,174E-16	0,0000
22	1,38000	COMB8	Combination	-476,490	-7,809	0,000	1,174E-16	0,0000
22	1,47857	COMB8	Combination	-476,490	-5,486	0,000	1,174E-16	0,0000
22	1,47857	COMB8	Combination	-476,490	-7,249	0,000	1,174E-16	0,0000
22	1,57714	COMB8	Combination	-476,490	-4,927	0,000	1,174E-16	0,0000
22	1,57714	COMB8	Combination	-476,490	-6,714	0,000	1,174E-16	0,0000
22	1,67571	COMB8	Combination	-476,490	-4,392	0,000	1,174E-16	0,0000
22	1,67571	COMB8	Combination	-476,490	-6,203	0,000	1,174E-16	0,0000
22	1,77429	COMB8	Combination	-476,490	-3,880	0,000	1,174E-16	0,0000
22	1,77429	COMB8	Combination	-476,490	-5,714	0,000	1,174E-16	0,0000
22	1,87286	COMB8	Combination	-476,490	-3,392	0,000	1,174E-16	0,0000
22	1,87286	COMB8	Combination	-476,490	-5,247	0,000	1,174E-16	0,0000
22	1,97143	COMB8	Combination	-476,490	-2,925	0,000	1,174E-16	0,0000
22	1,97143	COMB8	Combination	-476,490	-4,801	0,000	1,174E-16	0,0000
22	2,07000	COMB8	Combination	-476,490	-2,479	0,000	1,174E-16	0,0000
22	2,07000	COMB8	Combination	-476,490	-4,375	0,000	1,174E-16	0,0000
22	2,16857	COMB8	Combination	-476,490	-2,052	0,000	1,174E-16	0,0000
22	2,16857	COMB8	Combination	-476,490	-3,968	0,000	1,174E-16	0,0000
22	2,26714	COMB8	Combination	-476,490	-1,645	0,000	1,174E-16	0,0000
22	2,26714	COMB8	Combination	-476,490	-3,578	0,000	1,174E-16	0,0000
22	2,36571	COMB8	Combination	-476,490	-1,256	0,000	1,174E-16	0,0000
22	2,36571	COMB8	Combination	-476,490	-3,206	0,000	1,174E-16	0,0000
22	2,46429	COMB8	Combination	-476,490	-0,883	0,000	1,174E-16	0,0000
22	2,46429	COMB8	Combination	-476,490	-2,849	0,000	1,174E-16	0,0000
22	2,56286	COMB8	Combination	-476,490	-0,526	0,000	1,174E-16	0,0000
22	2,56286	COMB8	Combination	-476,490	-2,507	0,000	1,174E-16	0,0000
22	2,66143	COMB8	Combination	-476,490	-0,184	0,000	1,174E-16	0,0000
22	2,66143	COMB8	Combination	-476,490	-2,179	0,000	1,174E-16	0,0000
22	2,76000	COMB8	Combination	-476,490	0,144	0,000	1,174E-16	0,0000
22	2,76000	COMB8	Combination	-476,490	-1,864	0,000	1,174E-16	0,0000
22	2,85857	COMB8	Combination	-476,490	0,459	0,000	1,174E-16	0,0000
22	2,85857	COMB8	Combination	-476,490	-1,560	0,000	1,174E-16	0,0000
22	2,95714	COMB8	Combination	-476,490	0,762	0,000	1,174E-16	0,0000
22	2,95714	COMB8	Combination	-476,490	-1,268	0,000	1,174E-16	0,0000
22	3,05571	COMB8	Combination	-476,490	1,055	0,000	1,174E-16	0,0000
22	3,05571	COMB8	Combination	-476,490	-0,985	0,000	1,174E-16	0,0000
22	3,15429	COMB8	Combination	-476,490	1,338	0,000	1,174E-16	0,0000
22	3,15429	COMB8	Combination	-476,490	-0,710	0,000	1,174E-16	0,0000
22	3,25286	COMB8	Combination	-476,490	1,612	0,000	1,174E-16	0,0000
22	3,25286	COMB8	Combination	-476,490	-0,444	0,000	1,174E-16	0,0000
22	3,35143	COMB8	Combination	-476,490	1,879	0,000	1,174E-16	0,0000
22	3,35143	COMB8	Combination	-476,490	-0,184	0,000	1,174E-16	0,0000
22	3,45000	COMB8	Combination	-476,490	2,139	0,000	1,174E-16	0,0000
22	0,00000	COMB9	Combination	-540,281	-18,026	0,000	8,499E-17	0,0000

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

Codice documento
SS0558_F0.doc

Rev
F0

Data
20/06/2011

Frame Text	Station m	OutputCase Text	CaseType Text	P KN	V2 KN	V3 KN	T KN-m	M2 KN-m
22	0,09857	COMB9	Combination	-540,281	-15,704	0,000	8,499E-17	0,0000
22	0,09857	COMB9	Combination	-540,281	-17,106	0,000	8,499E-17	0,0000
22	0,19714	COMB9	Combination	-540,281	-14,783	0,000	8,499E-17	0,0000
22	0,19714	COMB9	Combination	-540,281	-16,216	0,000	8,499E-17	0,0000
22	0,29571	COMB9	Combination	-540,281	-13,893	0,000	8,499E-17	0,0000
22	0,29571	COMB9	Combination	-540,281	-15,357	0,000	8,499E-17	0,0000
22	0,39429	COMB9	Combination	-540,281	-13,034	0,000	8,499E-17	0,0000
22	0,39429	COMB9	Combination	-540,281	-14,528	0,000	8,499E-17	0,0000
22	0,49286	COMB9	Combination	-540,281	-12,205	0,000	8,499E-17	0,0000
22	0,49286	COMB9	Combination	-540,281	-13,730	0,000	8,499E-17	0,0000
22	0,59143	COMB9	Combination	-540,281	-11,407	0,000	8,499E-17	0,0000
22	0,59143	COMB9	Combination	-540,281	-12,961	0,000	8,499E-17	0,0000
22	0,69000	COMB9	Combination	-540,281	-10,638	0,000	8,499E-17	0,0000
22	0,69000	COMB9	Combination	-540,281	-12,221	0,000	8,499E-17	0,0000
22	0,78857	COMB9	Combination	-540,281	-9,898	0,000	8,499E-17	0,0000
22	0,78857	COMB9	Combination	-540,281	-11,509	0,000	8,499E-17	0,0000
22	0,88714	COMB9	Combination	-540,281	-9,187	0,000	8,499E-17	0,0000
22	0,88714	COMB9	Combination	-540,281	-10,826	0,000	8,499E-17	0,0000
22	0,98571	COMB9	Combination	-540,281	-8,504	0,000	8,499E-17	0,0000
22	0,98571	COMB9	Combination	-540,281	-10,170	0,000	8,499E-17	0,0000
22	1,08429	COMB9	Combination	-540,281	-7,848	0,000	8,499E-17	0,0000
22	1,08429	COMB9	Combination	-540,281	-9,541	0,000	8,499E-17	0,0000
22	1,18286	COMB9	Combination	-540,281	-7,219	0,000	8,499E-17	0,0000
22	1,18286	COMB9	Combination	-540,281	-8,938	0,000	8,499E-17	0,0000
22	1,28143	COMB9	Combination	-540,281	-6,615	0,000	8,499E-17	0,0000
22	1,28143	COMB9	Combination	-540,281	-8,360	0,000	8,499E-17	0,0000
22	1,38000	COMB9	Combination	-540,281	-6,037	0,000	8,499E-17	0,0000
22	1,38000	COMB9	Combination	-540,281	-7,807	0,000	8,499E-17	0,0000
22	1,47857	COMB9	Combination	-540,281	-5,484	0,000	8,499E-17	0,0000
22	1,47857	COMB9	Combination	-540,281	-7,277	0,000	8,499E-17	0,0000
22	1,57714	COMB9	Combination	-540,281	-4,954	0,000	8,499E-17	0,0000
22	1,57714	COMB9	Combination	-540,281	-6,770	0,000	8,499E-17	0,0000
22	1,67571	COMB9	Combination	-540,281	-4,447	0,000	8,499E-17	0,0000
22	1,67571	COMB9	Combination	-540,281	-6,285	0,000	8,499E-17	0,0000
22	1,77429	COMB9	Combination	-540,281	-3,962	0,000	8,499E-17	0,0000
22	1,77429	COMB9	Combination	-540,281	-5,821	0,000	8,499E-17	0,0000
22	1,87286	COMB9	Combination	-540,281	-3,498	0,000	8,499E-17	0,0000
22	1,87286	COMB9	Combination	-540,281	-5,377	0,000	8,499E-17	0,0000
22	1,97143	COMB9	Combination	-540,281	-3,055	0,000	8,499E-17	0,0000
22	1,97143	COMB9	Combination	-540,281	-4,953	0,000	8,499E-17	0,0000
22	2,07000	COMB9	Combination	-540,281	-2,630	0,000	8,499E-17	0,0000
22	2,07000	COMB9	Combination	-540,281	-4,547	0,000	8,499E-17	0,0000
22	2,16857	COMB9	Combination	-540,281	-2,224	0,000	8,499E-17	0,0000
22	2,16857	COMB9	Combination	-540,281	-4,158	0,000	8,499E-17	0,0000
22	2,26714	COMB9	Combination	-540,281	-1,835	0,000	8,499E-17	0,0000
22	2,26714	COMB9	Combination	-540,281	-3,785	0,000	8,499E-17	0,0000
22	2,36571	COMB9	Combination	-540,281	-1,463	0,000	8,499E-17	0,0000
22	2,36571	COMB9	Combination	-540,281	-3,428	0,000	8,499E-17	0,0000
22	2,46429	COMB9	Combination	-540,281	-1,106	0,000	8,499E-17	0,0000
22	2,46429	COMB9	Combination	-540,281	-3,086	0,000	8,499E-17	0,0000
22	2,56286	COMB9	Combination	-540,281	-0,763	0,000	8,499E-17	0,0000
22	2,56286	COMB9	Combination	-540,281	-2,757	0,000	8,499E-17	0,0000
22	2,66143	COMB9	Combination	-540,281	-0,434	0,000	8,499E-17	0,0000
22	2,66143	COMB9	Combination	-540,281	-2,440	0,000	8,499E-17	0,0000
22	2,76000	COMB9	Combination	-540,281	-0,117	0,000	8,499E-17	0,0000
22	2,76000	COMB9	Combination	-540,281	-2,134	0,000	8,499E-17	0,0000
22	2,85857	COMB9	Combination	-540,281	0,188	0,000	8,499E-17	0,0000
22	2,85857	COMB9	Combination	-540,281	-1,839	0,000	8,499E-17	0,0000
22	2,95714	COMB9	Combination	-540,281	0,483	0,000	8,499E-17	0,0000
22	2,95714	COMB9	Combination	-540,281	-1,554	0,000	8,499E-17	0,0000
22	3,05571	COMB9	Combination	-540,281	0,769	0,000	8,499E-17	0,0000
22	3,05571	COMB9	Combination	-540,281	-1,276	0,000	8,499E-17	0,0000
22	3,15429	COMB9	Combination	-540,281	1,046	0,000	8,499E-17	0,0000

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

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SS0558_F0.doc

Rev
F0

Data
20/06/2011

Frame Text	Station m	OutputCase Text	CaseType Text	P KN	V2 KN	V3 KN	T KN-m	M2 KN-m
22	3,15429	COMB9	Combination	-540,281	-1,006	0,000	8,499E-17	0,0000
22	3,25286	COMB9	Combination	-540,281	1,316	0,000	8,499E-17	0,0000
22	3,25286	COMB9	Combination	-540,281	-0,742	0,000	8,499E-17	0,0000
22	3,35143	COMB9	Combination	-540,281	1,580	0,000	8,499E-17	0,0000
22	3,35143	COMB9	Combination	-540,281	-0,484	0,000	8,499E-17	0,0000
22	3,45000	COMB9	Combination	-540,281	1,839	0,000	8,499E-17	0,0000
22	0,00000	COMB10	Combination	-621,001	-18,938	0,000	1,341E-16	0,0000
22	0,09857	COMB10	Combination	-621,001	-16,615	0,000	1,341E-16	0,0000
22	0,09857	COMB10	Combination	-621,001	-17,934	0,000	1,341E-16	0,0000
22	0,19714	COMB10	Combination	-621,001	-15,611	0,000	1,341E-16	0,0000
22	0,19714	COMB10	Combination	-621,001	-16,964	0,000	1,341E-16	0,0000
22	0,29571	COMB10	Combination	-621,001	-14,641	0,000	1,341E-16	0,0000
22	0,29571	COMB10	Combination	-621,001	-16,027	0,000	1,341E-16	0,0000
22	0,39429	COMB10	Combination	-621,001	-13,705	0,000	1,341E-16	0,0000
22	0,39429	COMB10	Combination	-621,001	-15,124	0,000	1,341E-16	0,0000
22	0,49286	COMB10	Combination	-621,001	-12,802	0,000	1,341E-16	0,0000
22	0,49286	COMB10	Combination	-621,001	-14,254	0,000	1,341E-16	0,0000
22	0,59143	COMB10	Combination	-621,001	-11,932	0,000	1,341E-16	0,0000
22	0,59143	COMB10	Combination	-621,001	-13,417	0,000	1,341E-16	0,0000
22	0,69000	COMB10	Combination	-621,001	-11,094	0,000	1,341E-16	0,0000
22	0,69000	COMB10	Combination	-621,001	-12,611	0,000	1,341E-16	0,0000
22	0,78857	COMB10	Combination	-621,001	-10,288	0,000	1,341E-16	0,0000
22	0,78857	COMB10	Combination	-621,001	-11,836	0,000	1,341E-16	0,0000
22	0,88714	COMB10	Combination	-621,001	-9,514	0,000	1,341E-16	0,0000
22	0,88714	COMB10	Combination	-621,001	-11,092	0,000	1,341E-16	0,0000
22	0,98571	COMB10	Combination	-621,001	-8,770	0,000	1,341E-16	0,0000
22	0,98571	COMB10	Combination	-621,001	-10,379	0,000	1,341E-16	0,0000
22	1,08429	COMB10	Combination	-621,001	-8,056	0,000	1,341E-16	0,0000
22	1,08429	COMB10	Combination	-621,001	-9,694	0,000	1,341E-16	0,0000
22	1,18286	COMB10	Combination	-621,001	-7,372	0,000	1,341E-16	0,0000
22	1,18286	COMB10	Combination	-621,001	-9,039	0,000	1,341E-16	0,0000
22	1,28143	COMB10	Combination	-621,001	-6,716	0,000	1,341E-16	0,0000
22	1,28143	COMB10	Combination	-621,001	-8,411	0,000	1,341E-16	0,0000
22	1,38000	COMB10	Combination	-621,001	-6,088	0,000	1,341E-16	0,0000
22	1,38000	COMB10	Combination	-621,001	-7,810	0,000	1,341E-16	0,0000
22	1,47857	COMB10	Combination	-621,001	-5,487	0,000	1,341E-16	0,0000
22	1,47857	COMB10	Combination	-621,001	-7,235	0,000	1,341E-16	0,0000
22	1,57714	COMB10	Combination	-621,001	-4,913	0,000	1,341E-16	0,0000
22	1,57714	COMB10	Combination	-621,001	-6,686	0,000	1,341E-16	0,0000
22	1,67571	COMB10	Combination	-621,001	-4,363	0,000	1,341E-16	0,0000
22	1,67571	COMB10	Combination	-621,001	-6,161	0,000	1,341E-16	0,0000
22	1,77429	COMB10	Combination	-621,001	-3,838	0,000	1,341E-16	0,0000
22	1,77429	COMB10	Combination	-621,001	-5,659	0,000	1,341E-16	0,0000
22	1,87286	COMB10	Combination	-621,001	-3,337	0,000	1,341E-16	0,0000
22	1,87286	COMB10	Combination	-621,001	-5,181	0,000	1,341E-16	0,0000
22	1,97143	COMB10	Combination	-621,001	-2,858	0,000	1,341E-16	0,0000
22	1,97143	COMB10	Combination	-621,001	-4,723	0,000	1,341E-16	0,0000
22	2,07000	COMB10	Combination	-621,001	-2,401	0,000	1,341E-16	0,0000
22	2,07000	COMB10	Combination	-621,001	-4,287	0,000	1,341E-16	0,0000
22	2,16857	COMB10	Combination	-621,001	-1,964	0,000	1,341E-16	0,0000
22	2,16857	COMB10	Combination	-621,001	-3,870	0,000	1,341E-16	0,0000
22	2,26714	COMB10	Combination	-621,001	-1,547	0,000	1,341E-16	0,0000
22	2,26714	COMB10	Combination	-621,001	-3,471	0,000	1,341E-16	0,0000
22	2,36571	COMB10	Combination	-621,001	-1,149	0,000	1,341E-16	0,0000
22	2,36571	COMB10	Combination	-621,001	-3,091	0,000	1,341E-16	0,0000
22	2,46429	COMB10	Combination	-621,001	-0,768	0,000	1,341E-16	0,0000
22	2,46429	COMB10	Combination	-621,001	-2,727	0,000	1,341E-16	0,0000
22	2,56286	COMB10	Combination	-621,001	-0,404	0,000	1,341E-16	0,0000
22	2,56286	COMB10	Combination	-621,001	-2,378	0,000	1,341E-16	0,0000
22	2,66143	COMB10	Combination	-621,001	-0,056	0,000	1,341E-16	0,0000
22	2,66143	COMB10	Combination	-621,001	-2,044	0,000	1,341E-16	0,0000
22	2,76000	COMB10	Combination	-621,001	0,278	0,000	1,341E-16	0,0000
22	2,76000	COMB10	Combination	-621,001	-1,724	0,000	1,341E-16	0,0000

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

Codice documento
SS0558_F0.doc

Rev
F0

Data
20/06/2011

Frame Text	Station m	OutputCase Text	CaseType Text	P KN	V2 KN	V3 KN	T KN-m	M2 KN-m
22	2,85857	COMB10	Combination	-621,001	0,598	0,000	1,341E-16	0,0000
22	2,85857	COMB10	Combination	-621,001	-1,416	0,000	1,341E-16	0,0000
22	2,95714	COMB10	Combination	-621,001	0,906	0,000	1,341E-16	0,0000
22	2,95714	COMB10	Combination	-621,001	-1,120	0,000	1,341E-16	0,0000
22	3,05571	COMB10	Combination	-621,001	1,202	0,000	1,341E-16	0,0000
22	3,05571	COMB10	Combination	-621,001	-0,834	0,000	1,341E-16	0,0000
22	3,15429	COMB10	Combination	-621,001	1,488	0,000	1,341E-16	0,0000
22	3,15429	COMB10	Combination	-621,001	-0,558	0,000	1,341E-16	0,0000
22	3,25286	COMB10	Combination	-621,001	1,765	0,000	1,341E-16	0,0000
22	3,25286	COMB10	Combination	-621,001	-0,290	0,000	1,341E-16	0,0000
22	3,35143	COMB10	Combination	-621,001	2,033	0,000	1,341E-16	0,0000
22	3,35143	COMB10	Combination	-621,001	-0,029	0,000	1,341E-16	0,0000
22	3,45000	COMB10	Combination	-621,001	2,293	0,000	1,341E-16	0,0000
22	0,00000	COMB11	Combination	-196,055	-18,026	0,000	8,499E-17	0,0000
22	0,09857	COMB11	Combination	-196,055	-15,704	0,000	8,499E-17	0,0000
22	0,09857	COMB11	Combination	-196,055	-17,106	0,000	8,499E-17	0,0000
22	0,19714	COMB11	Combination	-196,055	-14,783	0,000	8,499E-17	0,0000
22	0,19714	COMB11	Combination	-196,055	-16,216	0,000	8,499E-17	0,0000
22	0,29571	COMB11	Combination	-196,055	-13,893	0,000	8,499E-17	0,0000
22	0,29571	COMB11	Combination	-196,055	-15,357	0,000	8,499E-17	0,0000
22	0,39429	COMB11	Combination	-196,055	-13,034	0,000	8,499E-17	0,0000
22	0,39429	COMB11	Combination	-196,055	-14,528	0,000	8,499E-17	0,0000
22	0,49286	COMB11	Combination	-196,055	-12,205	0,000	8,499E-17	0,0000
22	0,49286	COMB11	Combination	-196,055	-13,730	0,000	8,499E-17	0,0000
22	0,59143	COMB11	Combination	-196,055	-11,407	0,000	8,499E-17	0,0000
22	0,59143	COMB11	Combination	-196,055	-12,961	0,000	8,499E-17	0,0000
22	0,69000	COMB11	Combination	-196,055	-10,638	0,000	8,499E-17	0,0000
22	0,69000	COMB11	Combination	-196,055	-12,221	0,000	8,499E-17	0,0000
22	0,78857	COMB11	Combination	-196,055	-9,898	0,000	8,499E-17	0,0000
22	0,78857	COMB11	Combination	-196,055	-11,509	0,000	8,499E-17	0,0000
22	0,88714	COMB11	Combination	-196,055	-9,187	0,000	8,499E-17	0,0000
22	0,88714	COMB11	Combination	-196,055	-10,826	0,000	8,499E-17	0,0000
22	0,98571	COMB11	Combination	-196,055	-8,504	0,000	8,499E-17	0,0000
22	0,98571	COMB11	Combination	-196,055	-10,170	0,000	8,499E-17	0,0000
22	1,08429	COMB11	Combination	-196,055	-7,848	0,000	8,499E-17	0,0000
22	1,08429	COMB11	Combination	-196,055	-9,541	0,000	8,499E-17	0,0000
22	1,18286	COMB11	Combination	-196,055	-7,219	0,000	8,499E-17	0,0000
22	1,18286	COMB11	Combination	-196,055	-8,938	0,000	8,499E-17	0,0000
22	1,28143	COMB11	Combination	-196,055	-6,615	0,000	8,499E-17	0,0000
22	1,28143	COMB11	Combination	-196,055	-8,360	0,000	8,499E-17	0,0000
22	1,38000	COMB11	Combination	-196,055	-6,037	0,000	8,499E-17	0,0000
22	1,38000	COMB11	Combination	-196,055	-7,807	0,000	8,499E-17	0,0000
22	1,47857	COMB11	Combination	-196,055	-5,484	0,000	8,499E-17	0,0000
22	1,47857	COMB11	Combination	-196,055	-7,277	0,000	8,499E-17	0,0000
22	1,57714	COMB11	Combination	-196,055	-4,954	0,000	8,499E-17	0,0000
22	1,57714	COMB11	Combination	-196,055	-6,770	0,000	8,499E-17	0,0000
22	1,67571	COMB11	Combination	-196,055	-4,447	0,000	8,499E-17	0,0000
22	1,67571	COMB11	Combination	-196,055	-6,285	0,000	8,499E-17	0,0000
22	1,77429	COMB11	Combination	-196,055	-3,962	0,000	8,499E-17	0,0000
22	1,77429	COMB11	Combination	-196,055	-5,821	0,000	8,499E-17	0,0000
22	1,87286	COMB11	Combination	-196,055	-3,498	0,000	8,499E-17	0,0000
22	1,87286	COMB11	Combination	-196,055	-5,377	0,000	8,499E-17	0,0000
22	1,97143	COMB11	Combination	-196,055	-3,055	0,000	8,499E-17	0,0000
22	1,97143	COMB11	Combination	-196,055	-4,953	0,000	8,499E-17	0,0000
22	2,07000	COMB11	Combination	-196,055	-2,630	0,000	8,499E-17	0,0000
22	2,07000	COMB11	Combination	-196,055	-4,547	0,000	8,499E-17	0,0000
22	2,16857	COMB11	Combination	-196,055	-2,224	0,000	8,499E-17	0,0000
22	2,16857	COMB11	Combination	-196,055	-4,158	0,000	8,499E-17	0,0000
22	2,26714	COMB11	Combination	-196,055	-1,835	0,000	8,499E-17	0,0000
22	2,26714	COMB11	Combination	-196,055	-3,785	0,000	8,499E-17	0,0000
22	2,36571	COMB11	Combination	-196,055	-1,463	0,000	8,499E-17	0,0000
22	2,36571	COMB11	Combination	-196,055	-3,428	0,000	8,499E-17	0,0000
22	2,46429	COMB11	Combination	-196,055	-1,106	0,000	8,499E-17	0,0000

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

Codice documento
SS0558_F0.doc

Rev
F0

Data
20/06/2011

Frame Text	Station m	OutputCase Text	CaseType Text	P KN	V2 KN	V3 KN	T KN-m	M2 KN-m
22	2,46429	COMB11	Combination	-196,055	-3,086	0,000	8,499E-17	0,0000
22	2,56286	COMB11	Combination	-196,055	-0,763	0,000	8,499E-17	0,0000
22	2,56286	COMB11	Combination	-196,055	-2,757	0,000	8,499E-17	0,0000
22	2,66143	COMB11	Combination	-196,055	-0,434	0,000	8,499E-17	0,0000
22	2,66143	COMB11	Combination	-196,055	-2,440	0,000	8,499E-17	0,0000
22	2,76000	COMB11	Combination	-196,055	-0,117	0,000	8,499E-17	0,0000
22	2,76000	COMB11	Combination	-196,055	-2,134	0,000	8,499E-17	0,0000
22	2,85857	COMB11	Combination	-196,055	0,188	0,000	8,499E-17	0,0000
22	2,85857	COMB11	Combination	-196,055	-1,839	0,000	8,499E-17	0,0000
22	2,95714	COMB11	Combination	-196,055	0,483	0,000	8,499E-17	0,0000
22	2,95714	COMB11	Combination	-196,055	-1,554	0,000	8,499E-17	0,0000
22	3,05571	COMB11	Combination	-196,055	0,769	0,000	8,499E-17	0,0000
22	3,05571	COMB11	Combination	-196,055	-1,276	0,000	8,499E-17	0,0000
22	3,15429	COMB11	Combination	-196,055	1,046	0,000	8,499E-17	0,0000
22	3,15429	COMB11	Combination	-196,055	-1,006	0,000	8,499E-17	0,0000
22	3,25286	COMB11	Combination	-196,055	1,316	0,000	8,499E-17	0,0000
22	3,25286	COMB11	Combination	-196,055	-0,742	0,000	8,499E-17	0,0000
22	3,35143	COMB11	Combination	-196,055	1,580	0,000	8,499E-17	0,0000
22	3,35143	COMB11	Combination	-196,055	-0,484	0,000	8,499E-17	0,0000
22	3,45000	COMB11	Combination	-196,055	1,839	0,000	8,499E-17	0,0000
22	0,00000	COMB12	Combination	-289,944	-21,606	0,000	5,543E-17	0,0000
22	0,09857	COMB12	Combination	-289,944	-19,283	0,000	5,543E-17	0,0000
22	0,09857	COMB12	Combination	-289,944	-20,526	0,000	5,543E-17	0,0000
22	0,19714	COMB12	Combination	-289,944	-18,204	0,000	5,543E-17	0,0000
22	0,19714	COMB12	Combination	-289,944	-19,483	0,000	5,543E-17	0,0000
22	0,29571	COMB12	Combination	-289,944	-17,160	0,000	5,543E-17	0,0000
22	0,29571	COMB12	Combination	-289,944	-18,475	0,000	5,543E-17	0,0000
22	0,39429	COMB12	Combination	-289,944	-16,153	0,000	5,543E-17	0,0000
22	0,39429	COMB12	Combination	-289,944	-17,503	0,000	5,543E-17	0,0000
22	0,49286	COMB12	Combination	-289,944	-15,181	0,000	5,543E-17	0,0000
22	0,49286	COMB12	Combination	-289,944	-16,566	0,000	5,543E-17	0,0000
22	0,59143	COMB12	Combination	-289,944	-14,244	0,000	5,543E-17	0,0000
22	0,59143	COMB12	Combination	-289,944	-15,664	0,000	5,543E-17	0,0000
22	0,69000	COMB12	Combination	-289,944	-13,341	0,000	5,543E-17	0,0000
22	0,69000	COMB12	Combination	-289,944	-14,796	0,000	5,543E-17	0,0000
22	0,78857	COMB12	Combination	-289,944	-12,473	0,000	5,543E-17	0,0000
22	0,78857	COMB12	Combination	-289,944	-13,961	0,000	5,543E-17	0,0000
22	0,88714	COMB12	Combination	-289,944	-11,638	0,000	5,543E-17	0,0000
22	0,88714	COMB12	Combination	-289,944	-13,158	0,000	5,543E-17	0,0000
22	0,98571	COMB12	Combination	-289,944	-10,836	0,000	5,543E-17	0,0000
22	0,98571	COMB12	Combination	-289,944	-12,388	0,000	5,543E-17	0,0000
22	1,08429	COMB12	Combination	-289,944	-10,065	0,000	5,543E-17	0,0000
22	1,08429	COMB12	Combination	-289,944	-11,649	0,000	5,543E-17	0,0000
22	1,18286	COMB12	Combination	-289,944	-9,326	0,000	5,543E-17	0,0000
22	1,18286	COMB12	Combination	-289,944	-10,939	0,000	5,543E-17	0,0000
22	1,28143	COMB12	Combination	-289,944	-8,617	0,000	5,543E-17	0,0000
22	1,28143	COMB12	Combination	-289,944	-10,259	0,000	5,543E-17	0,0000
22	1,38000	COMB12	Combination	-289,944	-7,937	0,000	5,543E-17	0,0000
22	1,38000	COMB12	Combination	-289,944	-9,608	0,000	5,543E-17	0,0000
22	1,47857	COMB12	Combination	-289,944	-7,285	0,000	5,543E-17	0,0000
22	1,47857	COMB12	Combination	-289,944	-8,983	0,000	5,543E-17	0,0000
22	1,57714	COMB12	Combination	-289,944	-6,661	0,000	5,543E-17	0,0000
22	1,57714	COMB12	Combination	-289,944	-8,385	0,000	5,543E-17	0,0000
22	1,67571	COMB12	Combination	-289,944	-6,062	0,000	5,543E-17	0,0000
22	1,67571	COMB12	Combination	-289,944	-7,812	0,000	5,543E-17	0,0000
22	1,77429	COMB12	Combination	-289,944	-5,490	0,000	5,543E-17	0,0000
22	1,77429	COMB12	Combination	-289,944	-7,264	0,000	5,543E-17	0,0000
22	1,87286	COMB12	Combination	-289,944	-4,941	0,000	5,543E-17	0,0000
22	1,87286	COMB12	Combination	-289,944	-6,738	0,000	5,543E-17	0,0000
22	1,97143	COMB12	Combination	-289,944	-4,415	0,000	5,543E-17	0,0000
22	1,97143	COMB12	Combination	-289,944	-6,234	0,000	5,543E-17	0,0000
22	2,07000	COMB12	Combination	-289,944	-3,911	0,000	5,543E-17	0,0000
22	2,07000	COMB12	Combination	-289,944	-5,751	0,000	5,543E-17	0,0000

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

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SS0558_F0.doc

Rev

F0

Data

20/06/2011

Frame Text	Station m	OutputCase Text	CaseType Text	P KN	V2 KN	V3 KN	T KN-m	M2 KN-m
22	2,16857	COMB12	Combination	-289,944	-3,428	0,000	5,543E-17	0,0000
22	2,16857	COMB12	Combination	-289,944	-5,288	0,000	5,543E-17	0,0000
22	2,26714	COMB12	Combination	-289,944	-2,965	0,000	5,543E-17	0,0000
22	2,26714	COMB12	Combination	-289,944	-4,842	0,000	5,543E-17	0,0000
22	2,36571	COMB12	Combination	-289,944	-2,520	0,000	5,543E-17	0,0000
22	2,36571	COMB12	Combination	-289,944	-4,414	0,000	5,543E-17	0,0000
22	2,46429	COMB12	Combination	-289,944	-2,092	0,000	5,543E-17	0,0000
22	2,46429	COMB12	Combination	-289,944	-4,002	0,000	5,543E-17	0,0000
22	2,56286	COMB12	Combination	-289,944	-1,680	0,000	5,543E-17	0,0000
22	2,56286	COMB12	Combination	-289,944	-3,605	0,000	5,543E-17	0,0000
22	2,66143	COMB12	Combination	-289,944	-1,282	0,000	5,543E-17	0,0000
22	2,66143	COMB12	Combination	-289,944	-3,220	0,000	5,543E-17	0,0000
22	2,76000	COMB12	Combination	-289,944	-0,898	0,000	5,543E-17	0,0000
22	2,76000	COMB12	Combination	-289,944	-2,848	0,000	5,543E-17	0,0000
22	2,85857	COMB12	Combination	-289,944	-0,526	0,000	5,543E-17	0,0000
22	2,85857	COMB12	Combination	-289,944	-2,487	0,000	5,543E-17	0,0000
22	2,95714	COMB12	Combination	-289,944	-0,165	0,000	5,543E-17	0,0000
22	2,95714	COMB12	Combination	-289,944	-2,136	0,000	5,543E-17	0,0000
22	3,05571	COMB12	Combination	-289,944	0,187	0,000	5,543E-17	0,0000
22	3,05571	COMB12	Combination	-289,944	-1,792	0,000	5,543E-17	0,0000
22	3,15429	COMB12	Combination	-289,944	0,531	0,000	5,543E-17	0,0000
22	3,15429	COMB12	Combination	-289,944	-1,456	0,000	5,543E-17	0,0000
22	3,25286	COMB12	Combination	-289,944	0,867	0,000	5,543E-17	0,0000
22	3,25286	COMB12	Combination	-289,944	-1,125	0,000	5,543E-17	0,0000
22	3,35143	COMB12	Combination	-289,944	1,198	0,000	5,543E-17	0,0000
22	3,35143	COMB12	Combination	-289,944	-0,798	0,000	5,543E-17	0,0000
22	3,45000	COMB12	Combination	-289,944	1,524	0,000	5,543E-17	0,0000
22	0,00000	COMB13	Combination	-112,607	-23,624	0,000	0,0000	0,0000
22	0,09857	COMB13	Combination	-112,607	-21,301	0,000	0,0000	0,0000
22	0,09857	COMB13	Combination	-112,607	-22,485	0,000	0,0000	0,0000
22	0,19714	COMB13	Combination	-112,607	-20,162	0,000	0,0000	0,0000
22	0,19714	COMB13	Combination	-112,607	-21,383	0,000	0,0000	0,0000
22	0,29571	COMB13	Combination	-112,607	-19,060	0,000	0,0000	0,0000
22	0,29571	COMB13	Combination	-112,607	-20,319	0,000	0,0000	0,0000
22	0,39429	COMB13	Combination	-112,607	-17,997	0,000	0,0000	0,0000
22	0,39429	COMB13	Combination	-112,607	-19,293	0,000	0,0000	0,0000
22	0,49286	COMB13	Combination	-112,607	-16,970	0,000	0,0000	0,0000
22	0,49286	COMB13	Combination	-112,607	-18,304	0,000	0,0000	0,0000
22	0,59143	COMB13	Combination	-112,607	-15,981	0,000	0,0000	0,0000
22	0,59143	COMB13	Combination	-112,607	-17,350	0,000	0,0000	0,0000
22	0,69000	COMB13	Combination	-112,607	-15,028	0,000	0,0000	0,0000
22	0,69000	COMB13	Combination	-112,607	-16,433	0,000	0,0000	0,0000
22	0,78857	COMB13	Combination	-112,607	-14,110	0,000	0,0000	0,0000
22	0,78857	COMB13	Combination	-112,607	-15,550	0,000	0,0000	0,0000
22	0,88714	COMB13	Combination	-112,607	-13,228	0,000	0,0000	0,0000
22	0,88714	COMB13	Combination	-112,607	-14,702	0,000	0,0000	0,0000
22	0,98571	COMB13	Combination	-112,607	-12,379	0,000	0,0000	0,0000
22	0,98571	COMB13	Combination	-112,607	-13,887	0,000	0,0000	0,0000
22	1,08429	COMB13	Combination	-112,607	-11,564	0,000	0,0000	0,0000
22	1,08429	COMB13	Combination	-112,607	-13,104	0,000	0,0000	0,0000
22	1,18286	COMB13	Combination	-112,607	-10,782	0,000	0,0000	0,0000
22	1,18286	COMB13	Combination	-112,607	-12,353	0,000	0,0000	0,0000
22	1,28143	COMB13	Combination	-112,607	-10,030	0,000	0,0000	0,0000
22	1,28143	COMB13	Combination	-112,607	-11,632	0,000	0,0000	0,0000
22	1,38000	COMB13	Combination	-112,607	-9,309	0,000	0,0000	0,0000
22	1,38000	COMB13	Combination	-112,607	-10,941	0,000	0,0000	0,0000
22	1,47857	COMB13	Combination	-112,607	-8,618	0,000	0,0000	0,0000
22	1,47857	COMB13	Combination	-112,607	-10,277	0,000	0,0000	0,0000
22	1,57714	COMB13	Combination	-112,607	-7,955	0,000	0,0000	0,0000
22	1,57714	COMB13	Combination	-112,607	-9,641	0,000	0,0000	0,0000
22	1,67571	COMB13	Combination	-112,607	-7,319	0,000	0,0000	0,0000
22	1,67571	COMB13	Combination	-112,607	-9,031	0,000	0,0000	0,0000
22	1,77429	COMB13	Combination	-112,607	-6,709	0,000	0,0000	0,0000

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

Codice documento

SS0558_F0.doc

Rev

F0

Data

20/06/2011

Frame Text	Station m	OutputCase Text	CaseType Text	P KN	V2 KN	V3 KN	T KN-m	M2 KN-m
22	1,77429	COMB13	Combination	-112,607	-8,446	0,000	0,0000	0,0000
22	1,87286	COMB13	Combination	-112,607	-6,123	0,000	0,0000	0,0000
22	1,87286	COMB13	Combination	-112,607	-7,884	0,000	0,0000	0,0000
22	1,97143	COMB13	Combination	-112,607	-5,561	0,000	0,0000	0,0000
22	1,97143	COMB13	Combination	-112,607	-7,344	0,000	0,0000	0,0000
22	2,07000	COMB13	Combination	-112,607	-5,022	0,000	0,0000	0,0000
22	2,07000	COMB13	Combination	-112,607	-6,826	0,000	0,0000	0,0000
22	2,16857	COMB13	Combination	-112,607	-4,503	0,000	0,0000	0,0000
22	2,16857	COMB13	Combination	-112,607	-6,326	0,000	0,0000	0,0000
22	2,26714	COMB13	Combination	-112,607	-4,004	0,000	0,0000	0,0000
22	2,26714	COMB13	Combination	-112,607	-5,845	0,000	0,0000	0,0000
22	2,36571	COMB13	Combination	-112,607	-3,523	0,000	0,0000	0,0000
22	2,36571	COMB13	Combination	-112,607	-5,381	0,000	0,0000	0,0000
22	2,46429	COMB13	Combination	-112,607	-3,058	0,000	0,0000	0,0000
22	2,46429	COMB13	Combination	-112,607	-4,932	0,000	0,0000	0,0000
22	2,56286	COMB13	Combination	-112,607	-2,610	0,000	0,0000	0,0000
22	2,56286	COMB13	Combination	-112,607	-4,497	0,000	0,0000	0,0000
22	2,66143	COMB13	Combination	-112,607	-2,175	0,000	0,0000	0,0000
22	2,66143	COMB13	Combination	-112,607	-4,075	0,000	0,0000	0,0000
22	2,76000	COMB13	Combination	-112,607	-1,753	0,000	0,0000	0,0000
22	2,76000	COMB13	Combination	-112,607	-3,664	0,000	0,0000	0,0000
22	2,85857	COMB13	Combination	-112,607	-1,341	0,000	0,0000	0,0000
22	2,85857	COMB13	Combination	-112,607	-3,263	0,000	0,0000	0,0000
22	2,95714	COMB13	Combination	-112,607	-0,940	0,000	0,0000	0,0000
22	2,95714	COMB13	Combination	-112,607	-2,869	0,000	0,0000	0,0000
22	3,05571	COMB13	Combination	-112,607	-0,547	0,000	0,0000	0,0000
22	3,05571	COMB13	Combination	-112,607	-2,483	0,000	0,0000	0,0000
22	3,15429	COMB13	Combination	-112,607	-0,160	0,000	0,0000	0,0000
22	3,15429	COMB13	Combination	-112,607	-2,102	0,000	0,0000	0,0000
22	3,25286	COMB13	Combination	-112,607	0,221	0,000	0,0000	0,0000
22	3,25286	COMB13	Combination	-112,607	-1,724	0,000	0,0000	0,0000
22	3,35143	COMB13	Combination	-112,607	0,599	0,000	0,0000	0,0000
22	3,35143	COMB13	Combination	-112,607	-1,349	0,000	0,0000	0,0000
22	3,45000	COMB13	Combination	-112,607	0,974	0,000	0,0000	0,0000
22	0,00000	COMB14	Combination	-330,920	-22,068	0,000	8,036E-17	0,0000
22	0,09857	COMB14	Combination	-330,920	-19,746	0,000	8,036E-17	0,0000
22	0,09857	COMB14	Combination	-330,920	-20,947	0,000	8,036E-17	0,0000
22	0,19714	COMB14	Combination	-330,920	-18,624	0,000	8,036E-17	0,0000
22	0,19714	COMB14	Combination	-330,920	-19,862	0,000	8,036E-17	0,0000
22	0,29571	COMB14	Combination	-330,920	-17,540	0,000	8,036E-17	0,0000
22	0,29571	COMB14	Combination	-330,920	-18,816	0,000	8,036E-17	0,0000
22	0,39429	COMB14	Combination	-330,920	-16,493	0,000	8,036E-17	0,0000
22	0,39429	COMB14	Combination	-330,920	-17,806	0,000	8,036E-17	0,0000
22	0,49286	COMB14	Combination	-330,920	-15,483	0,000	8,036E-17	0,0000
22	0,49286	COMB14	Combination	-330,920	-16,833	0,000	8,036E-17	0,0000
22	0,59143	COMB14	Combination	-330,920	-14,510	0,000	8,036E-17	0,0000
22	0,59143	COMB14	Combination	-330,920	-15,896	0,000	8,036E-17	0,0000
22	0,69000	COMB14	Combination	-330,920	-13,573	0,000	8,036E-17	0,0000
22	0,69000	COMB14	Combination	-330,920	-14,994	0,000	8,036E-17	0,0000
22	0,78857	COMB14	Combination	-330,920	-12,671	0,000	8,036E-17	0,0000
22	0,78857	COMB14	Combination	-330,920	-14,127	0,000	8,036E-17	0,0000
22	0,88714	COMB14	Combination	-330,920	-11,804	0,000	8,036E-17	0,0000
22	0,88714	COMB14	Combination	-330,920	-13,294	0,000	8,036E-17	0,0000
22	0,98571	COMB14	Combination	-330,920	-10,971	0,000	8,036E-17	0,0000
22	0,98571	COMB14	Combination	-330,920	-12,494	0,000	8,036E-17	0,0000
22	1,08429	COMB14	Combination	-330,920	-10,171	0,000	8,036E-17	0,0000
22	1,08429	COMB14	Combination	-330,920	-11,726	0,000	8,036E-17	0,0000
22	1,18286	COMB14	Combination	-330,920	-9,404	0,000	8,036E-17	0,0000
22	1,18286	COMB14	Combination	-330,920	-10,990	0,000	8,036E-17	0,0000
22	1,28143	COMB14	Combination	-330,920	-8,668	0,000	8,036E-17	0,0000
22	1,28143	COMB14	Combination	-330,920	-10,285	0,000	8,036E-17	0,0000
22	1,38000	COMB14	Combination	-330,920	-7,962	0,000	8,036E-17	0,0000
22	1,38000	COMB14	Combination	-330,920	-9,609	0,000	8,036E-17	0,0000

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

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SS0558_F0.doc

Rev
F0

Data
20/06/2011

Frame Text	Station m	OutputCase Text	CaseType Text	P KN	V2 KN	V3 KN	T KN-m	M2 KN-m
22	1,47857	COMB14	Combination	-330,920	-7,287	0,000	8,036E-17	0,0000
22	1,47857	COMB14	Combination	-330,920	-8,962	0,000	8,036E-17	0,0000
22	1,57714	COMB14	Combination	-330,920	-6,639	0,000	8,036E-17	0,0000
22	1,57714	COMB14	Combination	-330,920	-8,342	0,000	8,036E-17	0,0000
22	1,67571	COMB14	Combination	-330,920	-6,020	0,000	8,036E-17	0,0000
22	1,67571	COMB14	Combination	-330,920	-7,749	0,000	8,036E-17	0,0000
22	1,77429	COMB14	Combination	-330,920	-5,427	0,000	8,036E-17	0,0000
22	1,77429	COMB14	Combination	-330,920	-7,182	0,000	8,036E-17	0,0000
22	1,87286	COMB14	Combination	-330,920	-4,859	0,000	8,036E-17	0,0000
22	1,87286	COMB14	Combination	-330,920	-6,638	0,000	8,036E-17	0,0000
22	1,97143	COMB14	Combination	-330,920	-4,315	0,000	8,036E-17	0,0000
22	1,97143	COMB14	Combination	-330,920	-6,118	0,000	8,036E-17	0,0000
22	2,07000	COMB14	Combination	-330,920	-3,795	0,000	8,036E-17	0,0000
22	2,07000	COMB14	Combination	-330,920	-5,619	0,000	8,036E-17	0,0000
22	2,16857	COMB14	Combination	-330,920	-3,296	0,000	8,036E-17	0,0000
22	2,16857	COMB14	Combination	-330,920	-5,141	0,000	8,036E-17	0,0000
22	2,26714	COMB14	Combination	-330,920	-2,819	0,000	8,036E-17	0,0000
22	2,26714	COMB14	Combination	-330,920	-4,683	0,000	8,036E-17	0,0000
22	2,36571	COMB14	Combination	-330,920	-2,360	0,000	8,036E-17	0,0000
22	2,36571	COMB14	Combination	-330,920	-4,243	0,000	8,036E-17	0,0000
22	2,46429	COMB14	Combination	-330,920	-1,920	0,000	8,036E-17	0,0000
22	2,46429	COMB14	Combination	-330,920	-3,820	0,000	8,036E-17	0,0000
22	2,56286	COMB14	Combination	-330,920	-1,497	0,000	8,036E-17	0,0000
22	2,56286	COMB14	Combination	-330,920	-3,413	0,000	8,036E-17	0,0000
22	2,66143	COMB14	Combination	-330,920	-1,090	0,000	8,036E-17	0,0000
22	2,66143	COMB14	Combination	-330,920	-3,020	0,000	8,036E-17	0,0000
22	2,76000	COMB14	Combination	-330,920	-0,697	0,000	8,036E-17	0,0000
22	2,76000	COMB14	Combination	-330,920	-2,640	0,000	8,036E-17	0,0000
22	2,85857	COMB14	Combination	-330,920	-0,318	0,000	8,036E-17	0,0000
22	2,85857	COMB14	Combination	-330,920	-2,273	0,000	8,036E-17	0,0000
22	2,95714	COMB14	Combination	-330,920	0,050	0,000	8,036E-17	0,0000
22	2,95714	COMB14	Combination	-330,920	-1,915	0,000	8,036E-17	0,0000
22	3,05571	COMB14	Combination	-330,920	0,407	0,000	8,036E-17	0,0000
22	3,05571	COMB14	Combination	-330,920	-1,568	0,000	8,036E-17	0,0000
22	3,15429	COMB14	Combination	-330,920	0,755	0,000	8,036E-17	0,0000
22	3,15429	COMB14	Combination	-330,920	-1,228	0,000	8,036E-17	0,0000
22	3,25286	COMB14	Combination	-330,920	1,095	0,000	8,036E-17	0,0000
22	3,25286	COMB14	Combination	-330,920	-0,895	0,000	8,036E-17	0,0000
22	3,35143	COMB14	Combination	-330,920	1,428	0,000	8,036E-17	0,0000
22	3,35143	COMB14	Combination	-330,920	-0,568	0,000	8,036E-17	0,0000
22	3,45000	COMB14	Combination	-330,920	1,755	0,000	8,036E-17	0,0000
22	0,00000	COMB15	Combination	-153,583	-24,087	0,000	2,493E-17	0,0000
22	0,09857	COMB15	Combination	-153,583	-21,764	0,000	2,493E-17	0,0000
22	0,09857	COMB15	Combination	-153,583	-22,905	0,000	2,493E-17	0,0000
22	0,19714	COMB15	Combination	-153,583	-20,582	0,000	2,493E-17	0,0000
22	0,19714	COMB15	Combination	-153,583	-21,763	0,000	2,493E-17	0,0000
22	0,29571	COMB15	Combination	-153,583	-19,440	0,000	2,493E-17	0,0000
22	0,29571	COMB15	Combination	-153,583	-20,660	0,000	2,493E-17	0,0000
22	0,39429	COMB15	Combination	-153,583	-18,337	0,000	2,493E-17	0,0000
22	0,39429	COMB15	Combination	-153,583	-19,596	0,000	2,493E-17	0,0000
22	0,49286	COMB15	Combination	-153,583	-17,273	0,000	2,493E-17	0,0000
22	0,49286	COMB15	Combination	-153,583	-18,570	0,000	2,493E-17	0,0000
22	0,59143	COMB15	Combination	-153,583	-16,247	0,000	2,493E-17	0,0000
22	0,59143	COMB15	Combination	-153,583	-17,582	0,000	2,493E-17	0,0000
22	0,69000	COMB15	Combination	-153,583	-15,259	0,000	2,493E-17	0,0000
22	0,69000	COMB15	Combination	-153,583	-16,631	0,000	2,493E-17	0,0000
22	0,78857	COMB15	Combination	-153,583	-14,308	0,000	2,493E-17	0,0000
22	0,78857	COMB15	Combination	-153,583	-15,716	0,000	2,493E-17	0,0000
22	0,88714	COMB15	Combination	-153,583	-13,394	0,000	2,493E-17	0,0000
22	0,88714	COMB15	Combination	-153,583	-14,837	0,000	2,493E-17	0,0000
22	0,98571	COMB15	Combination	-153,583	-12,514	0,000	2,493E-17	0,0000
22	0,98571	COMB15	Combination	-153,583	-13,993	0,000	2,493E-17	0,0000
22	1,08429	COMB15	Combination	-153,583	-11,670	0,000	2,493E-17	0,0000

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

Codice documento
SS0558_F0.doc

Rev
F0

Data
20/06/2011

Frame Text	Station m	OutputCase Text	CaseType Text	P KN	V2 KN	V3 KN	T KN-m	M2 KN-m
22	1,08429	COMB15	Combination	-153,583	-13,182	0,000	2,493E-17	0,0000
22	1,18286	COMB15	Combination	-153,583	-10,859	0,000	2,493E-17	0,0000
22	1,18286	COMB15	Combination	-153,583	-12,404	0,000	2,493E-17	0,0000
22	1,28143	COMB15	Combination	-153,583	-10,081	0,000	2,493E-17	0,0000
22	1,28143	COMB15	Combination	-153,583	-11,658	0,000	2,493E-17	0,0000
22	1,38000	COMB15	Combination	-153,583	-9,335	0,000	2,493E-17	0,0000
22	1,38000	COMB15	Combination	-153,583	-10,942	0,000	2,493E-17	0,0000
22	1,47857	COMB15	Combination	-153,583	-8,620	0,000	2,493E-17	0,0000
22	1,47857	COMB15	Combination	-153,583	-10,256	0,000	2,493E-17	0,0000
22	1,57714	COMB15	Combination	-153,583	-7,934	0,000	2,493E-17	0,0000
22	1,57714	COMB15	Combination	-153,583	-9,599	0,000	2,493E-17	0,0000
22	1,67571	COMB15	Combination	-153,583	-7,276	0,000	2,493E-17	0,0000
22	1,67571	COMB15	Combination	-153,583	-8,968	0,000	2,493E-17	0,0000
22	1,77429	COMB15	Combination	-153,583	-6,646	0,000	2,493E-17	0,0000
22	1,77429	COMB15	Combination	-153,583	-8,364	0,000	2,493E-17	0,0000
22	1,87286	COMB15	Combination	-153,583	-6,041	0,000	2,493E-17	0,0000
22	1,87286	COMB15	Combination	-153,583	-7,784	0,000	2,493E-17	0,0000
22	1,97143	COMB15	Combination	-153,583	-5,462	0,000	2,493E-17	0,0000
22	1,97143	COMB15	Combination	-153,583	-7,228	0,000	2,493E-17	0,0000
22	2,07000	COMB15	Combination	-153,583	-4,905	0,000	2,493E-17	0,0000
22	2,07000	COMB15	Combination	-153,583	-6,694	0,000	2,493E-17	0,0000
22	2,16857	COMB15	Combination	-153,583	-4,371	0,000	2,493E-17	0,0000
22	2,16857	COMB15	Combination	-153,583	-6,180	0,000	2,493E-17	0,0000
22	2,26714	COMB15	Combination	-153,583	-3,857	0,000	2,493E-17	0,0000
22	2,26714	COMB15	Combination	-153,583	-5,686	0,000	2,493E-17	0,0000
22	2,36571	COMB15	Combination	-153,583	-3,363	0,000	2,493E-17	0,0000
22	2,36571	COMB15	Combination	-153,583	-5,210	0,000	2,493E-17	0,0000
22	2,46429	COMB15	Combination	-153,583	-2,887	0,000	2,493E-17	0,0000
22	2,46429	COMB15	Combination	-153,583	-4,750	0,000	2,493E-17	0,0000
22	2,56286	COMB15	Combination	-153,583	-2,427	0,000	2,493E-17	0,0000
22	2,56286	COMB15	Combination	-153,583	-4,305	0,000	2,493E-17	0,0000
22	2,66143	COMB15	Combination	-153,583	-1,983	0,000	2,493E-17	0,0000
22	2,66143	COMB15	Combination	-153,583	-3,875	0,000	2,493E-17	0,0000
22	2,76000	COMB15	Combination	-153,583	-1,552	0,000	2,493E-17	0,0000
22	2,76000	COMB15	Combination	-153,583	-3,456	0,000	2,493E-17	0,0000
22	2,85857	COMB15	Combination	-153,583	-1,133	0,000	2,493E-17	0,0000
22	2,85857	COMB15	Combination	-153,583	-3,048	0,000	2,493E-17	0,0000
22	2,95714	COMB15	Combination	-153,583	-0,725	0,000	2,493E-17	0,0000
22	2,95714	COMB15	Combination	-153,583	-2,649	0,000	2,493E-17	0,0000
22	3,05571	COMB15	Combination	-153,583	-0,327	0,000	2,493E-17	0,0000
22	3,05571	COMB15	Combination	-153,583	-2,259	0,000	2,493E-17	0,0000
22	3,15429	COMB15	Combination	-153,583	0,064	0,000	2,493E-17	0,0000
22	3,15429	COMB15	Combination	-153,583	-1,874	0,000	2,493E-17	0,0000
22	3,25286	COMB15	Combination	-153,583	0,449	0,000	2,493E-17	0,0000
22	3,25286	COMB15	Combination	-153,583	-1,494	0,000	2,493E-17	0,0000
22	3,35143	COMB15	Combination	-153,583	0,828	0,000	2,493E-17	0,0000
22	3,35143	COMB15	Combination	-153,583	-1,118	0,000	2,493E-17	0,0000
22	3,45000	COMB15	Combination	-153,583	1,205	0,000	2,493E-17	0,0000
22	0,00000	COMB16	Combination	-379,990	-21,606	0,000	5,543E-17	0,0000
22	0,09857	COMB16	Combination	-379,990	-19,283	0,000	5,543E-17	0,0000
22	0,09857	COMB16	Combination	-379,990	-20,526	0,000	5,543E-17	0,0000
22	0,19714	COMB16	Combination	-379,990	-18,204	0,000	5,543E-17	0,0000
22	0,19714	COMB16	Combination	-379,990	-19,483	0,000	5,543E-17	0,0000
22	0,29571	COMB16	Combination	-379,990	-17,160	0,000	5,543E-17	0,0000
22	0,29571	COMB16	Combination	-379,990	-18,475	0,000	5,543E-17	0,0000
22	0,39429	COMB16	Combination	-379,990	-16,153	0,000	5,543E-17	0,0000
22	0,39429	COMB16	Combination	-379,990	-17,503	0,000	5,543E-17	0,0000
22	0,49286	COMB16	Combination	-379,990	-15,181	0,000	5,543E-17	0,0000
22	0,49286	COMB16	Combination	-379,990	-16,566	0,000	5,543E-17	0,0000
22	0,59143	COMB16	Combination	-379,990	-14,244	0,000	5,543E-17	0,0000
22	0,59143	COMB16	Combination	-379,990	-15,664	0,000	5,543E-17	0,0000
22	0,69000	COMB16	Combination	-379,990	-13,341	0,000	5,543E-17	0,0000
22	0,69000	COMB16	Combination	-379,990	-14,796	0,000	5,543E-17	0,0000

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

Codice documento
SS0558_F0.doc

Rev
F0

Data
20/06/2011

Frame Text	Station m	OutputCase Text	CaseType Text	P KN	V2 KN	V3 KN	T KN-m	M2 KN-m
22	0,78857	COMB16	Combination	-379,990	-12,473	0,000	5,543E-17	0,0000
22	0,78857	COMB16	Combination	-379,990	-13,961	0,000	5,543E-17	0,0000
22	0,88714	COMB16	Combination	-379,990	-11,638	0,000	5,543E-17	0,0000
22	0,88714	COMB16	Combination	-379,990	-13,158	0,000	5,543E-17	0,0000
22	0,98571	COMB16	Combination	-379,990	-10,836	0,000	5,543E-17	0,0000
22	0,98571	COMB16	Combination	-379,990	-12,388	0,000	5,543E-17	0,0000
22	1,08429	COMB16	Combination	-379,990	-10,065	0,000	5,543E-17	0,0000
22	1,08429	COMB16	Combination	-379,990	-11,649	0,000	5,543E-17	0,0000
22	1,18286	COMB16	Combination	-379,990	-9,326	0,000	5,543E-17	0,0000
22	1,18286	COMB16	Combination	-379,990	-10,939	0,000	5,543E-17	0,0000
22	1,28143	COMB16	Combination	-379,990	-8,617	0,000	5,543E-17	0,0000
22	1,28143	COMB16	Combination	-379,990	-10,259	0,000	5,543E-17	0,0000
22	1,38000	COMB16	Combination	-379,990	-7,937	0,000	5,543E-17	0,0000
22	1,38000	COMB16	Combination	-379,990	-9,608	0,000	5,543E-17	0,0000
22	1,47857	COMB16	Combination	-379,990	-7,285	0,000	5,543E-17	0,0000
22	1,47857	COMB16	Combination	-379,990	-8,983	0,000	5,543E-17	0,0000
22	1,57714	COMB16	Combination	-379,990	-6,661	0,000	5,543E-17	0,0000
22	1,57714	COMB16	Combination	-379,990	-8,385	0,000	5,543E-17	0,0000
22	1,67571	COMB16	Combination	-379,990	-6,062	0,000	5,543E-17	0,0000
22	1,67571	COMB16	Combination	-379,990	-7,812	0,000	5,543E-17	0,0000
22	1,77429	COMB16	Combination	-379,990	-5,490	0,000	5,543E-17	0,0000
22	1,77429	COMB16	Combination	-379,990	-7,264	0,000	5,543E-17	0,0000
22	1,87286	COMB16	Combination	-379,990	-4,941	0,000	5,543E-17	0,0000
22	1,87286	COMB16	Combination	-379,990	-6,738	0,000	5,543E-17	0,0000
22	1,97143	COMB16	Combination	-379,990	-4,415	0,000	5,543E-17	0,0000
22	1,97143	COMB16	Combination	-379,990	-6,234	0,000	5,543E-17	0,0000
22	2,07000	COMB16	Combination	-379,990	-3,911	0,000	5,543E-17	0,0000
22	2,07000	COMB16	Combination	-379,990	-5,751	0,000	5,543E-17	0,0000
22	2,16857	COMB16	Combination	-379,990	-3,428	0,000	5,543E-17	0,0000
22	2,16857	COMB16	Combination	-379,990	-5,288	0,000	5,543E-17	0,0000
22	2,26714	COMB16	Combination	-379,990	-2,965	0,000	5,543E-17	0,0000
22	2,26714	COMB16	Combination	-379,990	-4,842	0,000	5,543E-17	0,0000
22	2,36571	COMB16	Combination	-379,990	-2,520	0,000	5,543E-17	0,0000
22	2,36571	COMB16	Combination	-379,990	-4,414	0,000	5,543E-17	0,0000
22	2,46429	COMB16	Combination	-379,990	-2,092	0,000	5,543E-17	0,0000
22	2,46429	COMB16	Combination	-379,990	-4,002	0,000	5,543E-17	0,0000
22	2,56286	COMB16	Combination	-379,990	-1,680	0,000	5,543E-17	0,0000
22	2,56286	COMB16	Combination	-379,990	-3,605	0,000	5,543E-17	0,0000
22	2,66143	COMB16	Combination	-379,990	-1,282	0,000	5,543E-17	0,0000
22	2,66143	COMB16	Combination	-379,990	-3,220	0,000	5,543E-17	0,0000
22	2,76000	COMB16	Combination	-379,990	-0,898	0,000	5,543E-17	0,0000
22	2,76000	COMB16	Combination	-379,990	-2,848	0,000	5,543E-17	0,0000
22	2,85857	COMB16	Combination	-379,990	-0,526	0,000	5,543E-17	0,0000
22	2,85857	COMB16	Combination	-379,990	-2,487	0,000	5,543E-17	0,0000
22	2,95714	COMB16	Combination	-379,990	-0,165	0,000	5,543E-17	0,0000
22	2,95714	COMB16	Combination	-379,990	-2,136	0,000	5,543E-17	0,0000
22	3,05571	COMB16	Combination	-379,990	0,187	0,000	5,543E-17	0,0000
22	3,05571	COMB16	Combination	-379,990	-1,792	0,000	5,543E-17	0,0000
22	3,15429	COMB16	Combination	-379,990	0,531	0,000	5,543E-17	0,0000
22	3,15429	COMB16	Combination	-379,990	-1,456	0,000	5,543E-17	0,0000
22	3,25286	COMB16	Combination	-379,990	0,867	0,000	5,543E-17	0,0000
22	3,25286	COMB16	Combination	-379,990	-1,125	0,000	5,543E-17	0,0000
22	3,35143	COMB16	Combination	-379,990	1,198	0,000	5,543E-17	0,0000
22	3,35143	COMB16	Combination	-379,990	-0,798	0,000	5,543E-17	0,0000
22	3,45000	COMB16	Combination	-379,990	1,524	0,000	5,543E-17	0,0000
22	0,00000	COMB17	Combination	-202,653	-23,624	0,000	0,0000	0,0000
22	0,09857	COMB17	Combination	-202,653	-21,301	0,000	0,0000	0,0000
22	0,09857	COMB17	Combination	-202,653	-22,485	0,000	0,0000	0,0000
22	0,19714	COMB17	Combination	-202,653	-20,162	0,000	0,0000	0,0000
22	0,19714	COMB17	Combination	-202,653	-21,383	0,000	0,0000	0,0000
22	0,29571	COMB17	Combination	-202,653	-19,060	0,000	0,0000	0,0000
22	0,29571	COMB17	Combination	-202,653	-20,319	0,000	0,0000	0,0000
22	0,39429	COMB17	Combination	-202,653	-17,997	0,000	0,0000	0,0000

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

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SS0558_F0.doc

Rev
F0

Data
20/06/2011

Frame Text	Station m	OutputCase Text	CaseType Text	P KN	V2 KN	V3 KN	T KN-m	M2 KN-m
22	0,39429	COMB17	Combination	-202,653	-19,293	0,000	0,0000	0,0000
22	0,49286	COMB17	Combination	-202,653	-16,970	0,000	0,0000	0,0000
22	0,49286	COMB17	Combination	-202,653	-18,304	0,000	0,0000	0,0000
22	0,59143	COMB17	Combination	-202,653	-15,981	0,000	0,0000	0,0000
22	0,59143	COMB17	Combination	-202,653	-17,350	0,000	0,0000	0,0000
22	0,69000	COMB17	Combination	-202,653	-15,028	0,000	0,0000	0,0000
22	0,69000	COMB17	Combination	-202,653	-16,433	0,000	0,0000	0,0000
22	0,78857	COMB17	Combination	-202,653	-14,110	0,000	0,0000	0,0000
22	0,78857	COMB17	Combination	-202,653	-15,550	0,000	0,0000	0,0000
22	0,88714	COMB17	Combination	-202,653	-13,228	0,000	0,0000	0,0000
22	0,88714	COMB17	Combination	-202,653	-14,702	0,000	0,0000	0,0000
22	0,98571	COMB17	Combination	-202,653	-12,379	0,000	0,0000	0,0000
22	0,98571	COMB17	Combination	-202,653	-13,887	0,000	0,0000	0,0000
22	1,08429	COMB17	Combination	-202,653	-11,564	0,000	0,0000	0,0000
22	1,08429	COMB17	Combination	-202,653	-13,104	0,000	0,0000	0,0000
22	1,18286	COMB17	Combination	-202,653	-10,782	0,000	0,0000	0,0000
22	1,18286	COMB17	Combination	-202,653	-12,353	0,000	0,0000	0,0000
22	1,28143	COMB17	Combination	-202,653	-10,030	0,000	0,0000	0,0000
22	1,28143	COMB17	Combination	-202,653	-11,632	0,000	0,0000	0,0000
22	1,38000	COMB17	Combination	-202,653	-9,309	0,000	0,0000	0,0000
22	1,38000	COMB17	Combination	-202,653	-10,941	0,000	0,0000	0,0000
22	1,47857	COMB17	Combination	-202,653	-8,618	0,000	0,0000	0,0000
22	1,47857	COMB17	Combination	-202,653	-10,277	0,000	0,0000	0,0000
22	1,57714	COMB17	Combination	-202,653	-7,955	0,000	0,0000	0,0000
22	1,57714	COMB17	Combination	-202,653	-9,641	0,000	0,0000	0,0000
22	1,67571	COMB17	Combination	-202,653	-7,319	0,000	0,0000	0,0000
22	1,67571	COMB17	Combination	-202,653	-9,031	0,000	0,0000	0,0000
22	1,77429	COMB17	Combination	-202,653	-6,709	0,000	0,0000	0,0000
22	1,77429	COMB17	Combination	-202,653	-8,446	0,000	0,0000	0,0000
22	1,87286	COMB17	Combination	-202,653	-6,123	0,000	0,0000	0,0000
22	1,87286	COMB17	Combination	-202,653	-7,884	0,000	0,0000	0,0000
22	1,97143	COMB17	Combination	-202,653	-5,561	0,000	0,0000	0,0000
22	1,97143	COMB17	Combination	-202,653	-7,344	0,000	0,0000	0,0000
22	2,07000	COMB17	Combination	-202,653	-5,022	0,000	0,0000	0,0000
22	2,07000	COMB17	Combination	-202,653	-6,826	0,000	0,0000	0,0000
22	2,16857	COMB17	Combination	-202,653	-4,503	0,000	0,0000	0,0000
22	2,16857	COMB17	Combination	-202,653	-6,326	0,000	0,0000	0,0000
22	2,26714	COMB17	Combination	-202,653	-4,004	0,000	0,0000	0,0000
22	2,26714	COMB17	Combination	-202,653	-5,845	0,000	0,0000	0,0000
22	2,36571	COMB17	Combination	-202,653	-3,523	0,000	0,0000	0,0000
22	2,36571	COMB17	Combination	-202,653	-5,381	0,000	0,0000	0,0000
22	2,46429	COMB17	Combination	-202,653	-3,058	0,000	0,0000	0,0000
22	2,46429	COMB17	Combination	-202,653	-4,932	0,000	0,0000	0,0000
22	2,56286	COMB17	Combination	-202,653	-2,610	0,000	0,0000	0,0000
22	2,56286	COMB17	Combination	-202,653	-4,497	0,000	0,0000	0,0000
22	2,66143	COMB17	Combination	-202,653	-2,175	0,000	0,0000	0,0000
22	2,66143	COMB17	Combination	-202,653	-4,075	0,000	0,0000	0,0000
22	2,76000	COMB17	Combination	-202,653	-1,753	0,000	0,0000	0,0000
22	2,76000	COMB17	Combination	-202,653	-3,664	0,000	0,0000	0,0000
22	2,85857	COMB17	Combination	-202,653	-1,341	0,000	0,0000	0,0000
22	2,85857	COMB17	Combination	-202,653	-3,263	0,000	0,0000	0,0000
22	2,95714	COMB17	Combination	-202,653	-0,940	0,000	0,0000	0,0000
22	2,95714	COMB17	Combination	-202,653	-2,869	0,000	0,0000	0,0000
22	3,05571	COMB17	Combination	-202,653	-0,547	0,000	0,0000	0,0000
22	3,05571	COMB17	Combination	-202,653	-2,483	0,000	0,0000	0,0000
22	3,15429	COMB17	Combination	-202,653	-0,160	0,000	0,0000	0,0000
22	3,15429	COMB17	Combination	-202,653	-2,102	0,000	0,0000	0,0000
22	3,25286	COMB17	Combination	-202,653	0,221	0,000	0,0000	0,0000
22	3,25286	COMB17	Combination	-202,653	-1,724	0,000	0,0000	0,0000
22	3,35143	COMB17	Combination	-202,653	0,599	0,000	0,0000	0,0000
22	3,35143	COMB17	Combination	-202,653	-1,349	0,000	0,0000	0,0000
22	3,45000	COMB17	Combination	-202,653	0,974	0,000	0,0000	0,0000
22	0,00000	COMB18	Combination	-442,082	-22,307	0,000	9,321E-17	0,0000

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

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Rev

F0

Data

20/06/2011

Frame Text	Station m	OutputCase Text	CaseType Text	P KN	V2 KN	V3 KN	T KN-m	M2 KN-m
22	0,09857	COMB18	Combination	-442,082	-19,984	0,000	9,321E-17	0,0000
22	0,09857	COMB18	Combination	-442,082	-21,163	0,000	9,321E-17	0,0000
22	0,19714	COMB18	Combination	-442,082	-18,841	0,000	9,321E-17	0,0000
22	0,19714	COMB18	Combination	-442,082	-20,058	0,000	9,321E-17	0,0000
22	0,29571	COMB18	Combination	-442,082	-17,735	0,000	9,321E-17	0,0000
22	0,29571	COMB18	Combination	-442,082	-18,991	0,000	9,321E-17	0,0000
22	0,39429	COMB18	Combination	-442,082	-16,668	0,000	9,321E-17	0,0000
22	0,39429	COMB18	Combination	-442,082	-17,962	0,000	9,321E-17	0,0000
22	0,49286	COMB18	Combination	-442,082	-15,639	0,000	9,321E-17	0,0000
22	0,49286	COMB18	Combination	-442,082	-16,970	0,000	9,321E-17	0,0000
22	0,59143	COMB18	Combination	-442,082	-14,647	0,000	9,321E-17	0,0000
22	0,59143	COMB18	Combination	-442,082	-16,015	0,000	9,321E-17	0,0000
22	0,69000	COMB18	Combination	-442,082	-13,692	0,000	9,321E-17	0,0000
22	0,69000	COMB18	Combination	-442,082	-15,096	0,000	9,321E-17	0,0000
22	0,78857	COMB18	Combination	-442,082	-12,773	0,000	9,321E-17	0,0000
22	0,78857	COMB18	Combination	-442,082	-14,212	0,000	9,321E-17	0,0000
22	0,88714	COMB18	Combination	-442,082	-11,890	0,000	9,321E-17	0,0000
22	0,88714	COMB18	Combination	-442,082	-13,363	0,000	9,321E-17	0,0000
22	0,98571	COMB18	Combination	-442,082	-11,041	0,000	9,321E-17	0,0000
22	0,98571	COMB18	Combination	-442,082	-12,548	0,000	9,321E-17	0,0000
22	1,08429	COMB18	Combination	-442,082	-10,226	0,000	9,321E-17	0,0000
22	1,08429	COMB18	Combination	-442,082	-11,766	0,000	9,321E-17	0,0000
22	1,18286	COMB18	Combination	-442,082	-9,444	0,000	9,321E-17	0,0000
22	1,18286	COMB18	Combination	-442,082	-11,017	0,000	9,321E-17	0,0000
22	1,28143	COMB18	Combination	-442,082	-8,694	0,000	9,321E-17	0,0000
22	1,28143	COMB18	Combination	-442,082	-10,298	0,000	9,321E-17	0,0000
22	1,38000	COMB18	Combination	-442,082	-7,976	0,000	9,321E-17	0,0000
22	1,38000	COMB18	Combination	-442,082	-9,610	0,000	9,321E-17	0,0000
22	1,47857	COMB18	Combination	-442,082	-7,287	0,000	9,321E-17	0,0000
22	1,47857	COMB18	Combination	-442,082	-8,951	0,000	9,321E-17	0,0000
22	1,57714	COMB18	Combination	-442,082	-6,629	0,000	9,321E-17	0,0000
22	1,57714	COMB18	Combination	-442,082	-8,320	0,000	9,321E-17	0,0000
22	1,67571	COMB18	Combination	-442,082	-5,998	0,000	9,321E-17	0,0000
22	1,67571	COMB18	Combination	-442,082	-7,717	0,000	9,321E-17	0,0000
22	1,77429	COMB18	Combination	-442,082	-5,394	0,000	9,321E-17	0,0000
22	1,77429	COMB18	Combination	-442,082	-7,139	0,000	9,321E-17	0,0000
22	1,87286	COMB18	Combination	-442,082	-4,817	0,000	9,321E-17	0,0000
22	1,87286	COMB18	Combination	-442,082	-6,587	0,000	9,321E-17	0,0000
22	1,97143	COMB18	Combination	-442,082	-4,264	0,000	9,321E-17	0,0000
22	1,97143	COMB18	Combination	-442,082	-6,058	0,000	9,321E-17	0,0000
22	2,07000	COMB18	Combination	-442,082	-3,735	0,000	9,321E-17	0,0000
22	2,07000	COMB18	Combination	-442,082	-5,551	0,000	9,321E-17	0,0000
22	2,16857	COMB18	Combination	-442,082	-3,228	0,000	9,321E-17	0,0000
22	2,16857	COMB18	Combination	-442,082	-5,066	0,000	9,321E-17	0,0000
22	2,26714	COMB18	Combination	-442,082	-2,743	0,000	9,321E-17	0,0000
22	2,26714	COMB18	Combination	-442,082	-4,601	0,000	9,321E-17	0,0000
22	2,36571	COMB18	Combination	-442,082	-2,278	0,000	9,321E-17	0,0000
22	2,36571	COMB18	Combination	-442,082	-4,155	0,000	9,321E-17	0,0000
22	2,46429	COMB18	Combination	-442,082	-1,832	0,000	9,321E-17	0,0000
22	2,46429	COMB18	Combination	-442,082	-3,726	0,000	9,321E-17	0,0000
22	2,56286	COMB18	Combination	-442,082	-1,403	0,000	9,321E-17	0,0000
22	2,56286	COMB18	Combination	-442,082	-3,314	0,000	9,321E-17	0,0000
22	2,66143	COMB18	Combination	-442,082	-0,991	0,000	9,321E-17	0,0000
22	2,66143	COMB18	Combination	-442,082	-2,916	0,000	9,321E-17	0,0000
22	2,76000	COMB18	Combination	-442,082	-0,594	0,000	9,321E-17	0,0000
22	2,76000	COMB18	Combination	-442,082	-2,533	0,000	9,321E-17	0,0000
22	2,85857	COMB18	Combination	-442,082	-0,210	0,000	9,321E-17	0,0000
22	2,85857	COMB18	Combination	-442,082	-2,162	0,000	9,321E-17	0,0000
22	2,95714	COMB18	Combination	-442,082	0,161	0,000	9,321E-17	0,0000
22	2,95714	COMB18	Combination	-442,082	-1,802	0,000	9,321E-17	0,0000
22	3,05571	COMB18	Combination	-442,082	0,521	0,000	9,321E-17	0,0000
22	3,05571	COMB18	Combination	-442,082	-1,452	0,000	9,321E-17	0,0000
22	3,15429	COMB18	Combination	-442,082	0,871	0,000	9,321E-17	0,0000

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

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SS0558_F0.doc

Rev

F0

Data

20/06/2011

Frame Text	Station m	OutputCase Text	CaseType Text	P KN	V2 KN	V3 KN	T KN-m	M2 KN-m
22	3,15429	COMB18	Combination	-442,082	-1,111	0,000	9,321E-17	0,0000
22	3,25286	COMB18	Combination	-442,082	1,212	0,000	9,321E-17	0,0000
22	3,25286	COMB18	Combination	-442,082	-0,777	0,000	9,321E-17	0,0000
22	3,35143	COMB18	Combination	-442,082	1,546	0,000	9,321E-17	0,0000
22	3,35143	COMB18	Combination	-442,082	-0,449	0,000	9,321E-17	0,0000
22	3,45000	COMB18	Combination	-442,082	1,874	0,000	9,321E-17	0,0000
22	0,00000	COMB19	Combination	-264,745	-24,325	0,000	3,778E-17	0,0000
22	0,09857	COMB19	Combination	-264,745	-22,002	0,000	3,778E-17	0,0000
22	0,09857	COMB19	Combination	-264,745	-23,122	0,000	3,778E-17	0,0000
22	0,19714	COMB19	Combination	-264,745	-20,799	0,000	3,778E-17	0,0000
22	0,19714	COMB19	Combination	-264,745	-21,958	0,000	3,778E-17	0,0000
22	0,29571	COMB19	Combination	-264,745	-19,636	0,000	3,778E-17	0,0000
22	0,29571	COMB19	Combination	-264,745	-20,835	0,000	3,778E-17	0,0000
22	0,39429	COMB19	Combination	-264,745	-18,513	0,000	3,778E-17	0,0000
22	0,39429	COMB19	Combination	-264,745	-19,752	0,000	3,778E-17	0,0000
22	0,49286	COMB19	Combination	-264,745	-17,429	0,000	3,778E-17	0,0000
22	0,49286	COMB19	Combination	-264,745	-18,707	0,000	3,778E-17	0,0000
22	0,59143	COMB19	Combination	-264,745	-16,385	0,000	3,778E-17	0,0000
22	0,59143	COMB19	Combination	-264,745	-17,701	0,000	3,778E-17	0,0000
22	0,69000	COMB19	Combination	-264,745	-15,379	0,000	3,778E-17	0,0000
22	0,69000	COMB19	Combination	-264,745	-16,733	0,000	3,778E-17	0,0000
22	0,78857	COMB19	Combination	-264,745	-14,410	0,000	3,778E-17	0,0000
22	0,78857	COMB19	Combination	-264,745	-15,802	0,000	3,778E-17	0,0000
22	0,88714	COMB19	Combination	-264,745	-13,479	0,000	3,778E-17	0,0000
22	0,88714	COMB19	Combination	-264,745	-14,907	0,000	3,778E-17	0,0000
22	0,98571	COMB19	Combination	-264,745	-12,584	0,000	3,778E-17	0,0000
22	0,98571	COMB19	Combination	-264,745	-14,047	0,000	3,778E-17	0,0000
22	1,08429	COMB19	Combination	-264,745	-11,725	0,000	3,778E-17	0,0000
22	1,08429	COMB19	Combination	-264,745	-13,222	0,000	3,778E-17	0,0000
22	1,18286	COMB19	Combination	-264,745	-10,899	0,000	3,778E-17	0,0000
22	1,18286	COMB19	Combination	-264,745	-12,430	0,000	3,778E-17	0,0000
22	1,28143	COMB19	Combination	-264,745	-10,108	0,000	3,778E-17	0,0000
22	1,28143	COMB19	Combination	-264,745	-11,671	0,000	3,778E-17	0,0000
22	1,38000	COMB19	Combination	-264,745	-9,348	0,000	3,778E-17	0,0000
22	1,38000	COMB19	Combination	-264,745	-10,943	0,000	3,778E-17	0,0000
22	1,47857	COMB19	Combination	-264,745	-8,620	0,000	3,778E-17	0,0000
22	1,47857	COMB19	Combination	-264,745	-10,245	0,000	3,778E-17	0,0000
22	1,57714	COMB19	Combination	-264,745	-7,923	0,000	3,778E-17	0,0000
22	1,57714	COMB19	Combination	-264,745	-9,577	0,000	3,778E-17	0,0000
22	1,67571	COMB19	Combination	-264,745	-7,254	0,000	3,778E-17	0,0000
22	1,67571	COMB19	Combination	-264,745	-8,936	0,000	3,778E-17	0,0000
22	1,77429	COMB19	Combination	-264,745	-6,613	0,000	3,778E-17	0,0000
22	1,77429	COMB19	Combination	-264,745	-8,322	0,000	3,778E-17	0,0000
22	1,87286	COMB19	Combination	-264,745	-5,999	0,000	3,778E-17	0,0000
22	1,87286	COMB19	Combination	-264,745	-7,733	0,000	3,778E-17	0,0000
22	1,97143	COMB19	Combination	-264,745	-5,410	0,000	3,778E-17	0,0000
22	1,97143	COMB19	Combination	-264,745	-7,168	0,000	3,778E-17	0,0000
22	2,07000	COMB19	Combination	-264,745	-4,845	0,000	3,778E-17	0,0000
22	2,07000	COMB19	Combination	-264,745	-6,626	0,000	3,778E-17	0,0000
22	2,16857	COMB19	Combination	-264,745	-4,303	0,000	3,778E-17	0,0000
22	2,16857	COMB19	Combination	-264,745	-6,105	0,000	3,778E-17	0,0000
22	2,26714	COMB19	Combination	-264,745	-3,782	0,000	3,778E-17	0,0000
22	2,26714	COMB19	Combination	-264,745	-5,604	0,000	3,778E-17	0,0000
22	2,36571	COMB19	Combination	-264,745	-3,281	0,000	3,778E-17	0,0000
22	2,36571	COMB19	Combination	-264,745	-5,121	0,000	3,778E-17	0,0000
22	2,46429	COMB19	Combination	-264,745	-2,799	0,000	3,778E-17	0,0000
22	2,46429	COMB19	Combination	-264,745	-4,656	0,000	3,778E-17	0,0000
22	2,56286	COMB19	Combination	-264,745	-2,333	0,000	3,778E-17	0,0000
22	2,56286	COMB19	Combination	-264,745	-4,206	0,000	3,778E-17	0,0000
22	2,66143	COMB19	Combination	-264,745	-1,884	0,000	3,778E-17	0,0000
22	2,66143	COMB19	Combination	-264,745	-3,771	0,000	3,778E-17	0,0000
22	2,76000	COMB19	Combination	-264,745	-1,448	0,000	3,778E-17	0,0000
22	2,76000	COMB19	Combination	-264,745	-3,349	0,000	3,778E-17	0,0000

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

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SS0558_F0.doc

Rev

F0

Data

20/06/2011

Frame Text	Station m	OutputCase Text	CaseType Text	P KN	V2 KN	V3 KN	T KN-m	M2 KN-m
22	2,85857	COMB19	Combination	-264,745	-1,026	0,000	3,778E-17	0,0000
22	2,85857	COMB19	Combination	-264,745	-2,937	0,000	3,778E-17	0,0000
22	2,95714	COMB19	Combination	-264,745	-0,615	0,000	3,778E-17	0,0000
22	2,95714	COMB19	Combination	-264,745	-2,536	0,000	3,778E-17	0,0000
22	3,05571	COMB19	Combination	-264,745	-0,213	0,000	3,778E-17	0,0000
22	3,05571	COMB19	Combination	-264,745	-2,143	0,000	3,778E-17	0,0000
22	3,15429	COMB19	Combination	-264,745	0,180	0,000	3,778E-17	0,0000
22	3,15429	COMB19	Combination	-264,745	-1,757	0,000	3,778E-17	0,0000
22	3,25286	COMB19	Combination	-264,745	0,566	0,000	3,778E-17	0,0000
22	3,25286	COMB19	Combination	-264,745	-1,376	0,000	3,778E-17	0,0000
22	3,35143	COMB19	Combination	-264,745	0,947	0,000	3,778E-17	0,0000
22	3,35143	COMB19	Combination	-264,745	-0,999	0,000	3,778E-17	0,0000
22	3,45000	COMB19	Combination	-264,745	1,324	0,000	3,778E-17	0,0000
22	0,00000	COMB20	Combination	-115,200	-21,606	0,000	5,543E-17	0,0000
22	0,09857	COMB20	Combination	-115,200	-19,283	0,000	5,543E-17	0,0000
22	0,09857	COMB20	Combination	-115,200	-20,526	0,000	5,543E-17	0,0000
22	0,19714	COMB20	Combination	-115,200	-18,204	0,000	5,543E-17	0,0000
22	0,19714	COMB20	Combination	-115,200	-19,483	0,000	5,543E-17	0,0000
22	0,29571	COMB20	Combination	-115,200	-17,160	0,000	5,543E-17	0,0000
22	0,29571	COMB20	Combination	-115,200	-18,475	0,000	5,543E-17	0,0000
22	0,39429	COMB20	Combination	-115,200	-16,153	0,000	5,543E-17	0,0000
22	0,39429	COMB20	Combination	-115,200	-17,503	0,000	5,543E-17	0,0000
22	0,49286	COMB20	Combination	-115,200	-15,181	0,000	5,543E-17	0,0000
22	0,49286	COMB20	Combination	-115,200	-16,566	0,000	5,543E-17	0,0000
22	0,59143	COMB20	Combination	-115,200	-14,244	0,000	5,543E-17	0,0000
22	0,59143	COMB20	Combination	-115,200	-15,664	0,000	5,543E-17	0,0000
22	0,69000	COMB20	Combination	-115,200	-13,341	0,000	5,543E-17	0,0000
22	0,69000	COMB20	Combination	-115,200	-14,796	0,000	5,543E-17	0,0000
22	0,78857	COMB20	Combination	-115,200	-12,473	0,000	5,543E-17	0,0000
22	0,78857	COMB20	Combination	-115,200	-13,961	0,000	5,543E-17	0,0000
22	0,88714	COMB20	Combination	-115,200	-11,638	0,000	5,543E-17	0,0000
22	0,88714	COMB20	Combination	-115,200	-13,158	0,000	5,543E-17	0,0000
22	0,98571	COMB20	Combination	-115,200	-10,836	0,000	5,543E-17	0,0000
22	0,98571	COMB20	Combination	-115,200	-12,388	0,000	5,543E-17	0,0000
22	1,08429	COMB20	Combination	-115,200	-10,065	0,000	5,543E-17	0,0000
22	1,08429	COMB20	Combination	-115,200	-11,649	0,000	5,543E-17	0,0000
22	1,18286	COMB20	Combination	-115,200	-9,326	0,000	5,543E-17	0,0000
22	1,18286	COMB20	Combination	-115,200	-10,939	0,000	5,543E-17	0,0000
22	1,28143	COMB20	Combination	-115,200	-8,617	0,000	5,543E-17	0,0000
22	1,28143	COMB20	Combination	-115,200	-10,259	0,000	5,543E-17	0,0000
22	1,38000	COMB20	Combination	-115,200	-7,937	0,000	5,543E-17	0,0000
22	1,38000	COMB20	Combination	-115,200	-9,608	0,000	5,543E-17	0,0000
22	1,47857	COMB20	Combination	-115,200	-7,285	0,000	5,543E-17	0,0000
22	1,47857	COMB20	Combination	-115,200	-8,983	0,000	5,543E-17	0,0000
22	1,57714	COMB20	Combination	-115,200	-6,661	0,000	5,543E-17	0,0000
22	1,57714	COMB20	Combination	-115,200	-8,385	0,000	5,543E-17	0,0000
22	1,67571	COMB20	Combination	-115,200	-6,062	0,000	5,543E-17	0,0000
22	1,67571	COMB20	Combination	-115,200	-7,812	0,000	5,543E-17	0,0000
22	1,77429	COMB20	Combination	-115,200	-5,490	0,000	5,543E-17	0,0000
22	1,77429	COMB20	Combination	-115,200	-7,264	0,000	5,543E-17	0,0000
22	1,87286	COMB20	Combination	-115,200	-4,941	0,000	5,543E-17	0,0000
22	1,87286	COMB20	Combination	-115,200	-6,738	0,000	5,543E-17	0,0000
22	1,97143	COMB20	Combination	-115,200	-4,415	0,000	5,543E-17	0,0000
22	1,97143	COMB20	Combination	-115,200	-6,234	0,000	5,543E-17	0,0000
22	2,07000	COMB20	Combination	-115,200	-3,911	0,000	5,543E-17	0,0000
22	2,07000	COMB20	Combination	-115,200	-5,751	0,000	5,543E-17	0,0000
22	2,16857	COMB20	Combination	-115,200	-3,428	0,000	5,543E-17	0,0000
22	2,16857	COMB20	Combination	-115,200	-5,288	0,000	5,543E-17	0,0000
22	2,26714	COMB20	Combination	-115,200	-2,965	0,000	5,543E-17	0,0000
22	2,26714	COMB20	Combination	-115,200	-4,842	0,000	5,543E-17	0,0000
22	2,36571	COMB20	Combination	-115,200	-2,520	0,000	5,543E-17	0,0000
22	2,36571	COMB20	Combination	-115,200	-4,414	0,000	5,543E-17	0,0000
22	2,46429	COMB20	Combination	-115,200	-2,092	0,000	5,543E-17	0,0000

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

Codice documento
SS0558_F0.doc

Rev
F0

Data
20/06/2011

Frame Text	Station m	OutputCase Text	CaseType Text	P KN	V2 KN	V3 KN	T KN-m	M2 KN-m
22	2,46429	COMB20	Combination	-115,200	-4,002	0,000	5,543E-17	0,0000
22	2,56286	COMB20	Combination	-115,200	-1,680	0,000	5,543E-17	0,0000
22	2,56286	COMB20	Combination	-115,200	-3,605	0,000	5,543E-17	0,0000
22	2,66143	COMB20	Combination	-115,200	-1,282	0,000	5,543E-17	0,0000
22	2,66143	COMB20	Combination	-115,200	-3,220	0,000	5,543E-17	0,0000
22	2,76000	COMB20	Combination	-115,200	-0,898	0,000	5,543E-17	0,0000
22	2,76000	COMB20	Combination	-115,200	-2,848	0,000	5,543E-17	0,0000
22	2,85857	COMB20	Combination	-115,200	-0,526	0,000	5,543E-17	0,0000
22	2,85857	COMB20	Combination	-115,200	-2,487	0,000	5,543E-17	0,0000
22	2,95714	COMB20	Combination	-115,200	-0,165	0,000	5,543E-17	0,0000
22	2,95714	COMB20	Combination	-115,200	-2,136	0,000	5,543E-17	0,0000
22	3,05571	COMB20	Combination	-115,200	0,187	0,000	5,543E-17	0,0000
22	3,05571	COMB20	Combination	-115,200	-1,792	0,000	5,543E-17	0,0000
22	3,15429	COMB20	Combination	-115,200	0,531	0,000	5,543E-17	0,0000
22	3,15429	COMB20	Combination	-115,200	-1,456	0,000	5,543E-17	0,0000
22	3,25286	COMB20	Combination	-115,200	0,867	0,000	5,543E-17	0,0000
22	3,25286	COMB20	Combination	-115,200	-1,125	0,000	5,543E-17	0,0000
22	3,35143	COMB20	Combination	-115,200	1,198	0,000	5,543E-17	0,0000
22	3,35143	COMB20	Combination	-115,200	-0,798	0,000	5,543E-17	0,0000
22	3,45000	COMB20	Combination	-115,200	1,524	0,000	5,543E-17	0,0000
22	0,00000	COMB21	Combination	62,137	-23,624	0,000	0,0000	0,0000
22	0,09857	COMB21	Combination	62,137	-21,301	0,000	0,0000	0,0000
22	0,09857	COMB21	Combination	62,137	-22,485	0,000	0,0000	0,0000
22	0,19714	COMB21	Combination	62,137	-20,162	0,000	0,0000	0,0000
22	0,19714	COMB21	Combination	62,137	-21,383	0,000	0,0000	0,0000
22	0,29571	COMB21	Combination	62,137	-19,060	0,000	0,0000	0,0000
22	0,29571	COMB21	Combination	62,137	-20,319	0,000	0,0000	0,0000
22	0,39429	COMB21	Combination	62,137	-17,997	0,000	0,0000	0,0000
22	0,39429	COMB21	Combination	62,137	-19,293	0,000	0,0000	0,0000
22	0,49286	COMB21	Combination	62,137	-16,970	0,000	0,0000	0,0000
22	0,49286	COMB21	Combination	62,137	-18,304	0,000	0,0000	0,0000
22	0,59143	COMB21	Combination	62,137	-15,981	0,000	0,0000	0,0000
22	0,59143	COMB21	Combination	62,137	-17,350	0,000	0,0000	0,0000
22	0,69000	COMB21	Combination	62,137	-15,028	0,000	0,0000	0,0000
22	0,69000	COMB21	Combination	62,137	-16,433	0,000	0,0000	0,0000
22	0,78857	COMB21	Combination	62,137	-14,110	0,000	0,0000	0,0000
22	0,78857	COMB21	Combination	62,137	-15,550	0,000	0,0000	0,0000
22	0,88714	COMB21	Combination	62,137	-13,228	0,000	0,0000	0,0000
22	0,88714	COMB21	Combination	62,137	-14,702	0,000	0,0000	0,0000
22	0,98571	COMB21	Combination	62,137	-12,379	0,000	0,0000	0,0000
22	0,98571	COMB21	Combination	62,137	-13,887	0,000	0,0000	0,0000
22	1,08429	COMB21	Combination	62,137	-11,564	0,000	0,0000	0,0000
22	1,08429	COMB21	Combination	62,137	-13,104	0,000	0,0000	0,0000
22	1,18286	COMB21	Combination	62,137	-10,782	0,000	0,0000	0,0000
22	1,18286	COMB21	Combination	62,137	-12,353	0,000	0,0000	0,0000
22	1,28143	COMB21	Combination	62,137	-10,030	0,000	0,0000	0,0000
22	1,28143	COMB21	Combination	62,137	-11,632	0,000	0,0000	0,0000
22	1,38000	COMB21	Combination	62,137	-9,309	0,000	0,0000	0,0000
22	1,38000	COMB21	Combination	62,137	-10,941	0,000	0,0000	0,0000
22	1,47857	COMB21	Combination	62,137	-8,618	0,000	0,0000	0,0000
22	1,47857	COMB21	Combination	62,137	-10,277	0,000	0,0000	0,0000
22	1,57714	COMB21	Combination	62,137	-7,955	0,000	0,0000	0,0000
22	1,57714	COMB21	Combination	62,137	-9,641	0,000	0,0000	0,0000
22	1,67571	COMB21	Combination	62,137	-7,319	0,000	0,0000	0,0000
22	1,67571	COMB21	Combination	62,137	-9,031	0,000	0,0000	0,0000
22	1,77429	COMB21	Combination	62,137	-6,709	0,000	0,0000	0,0000
22	1,77429	COMB21	Combination	62,137	-8,446	0,000	0,0000	0,0000
22	1,87286	COMB21	Combination	62,137	-6,123	0,000	0,0000	0,0000
22	1,87286	COMB21	Combination	62,137	-7,884	0,000	0,0000	0,0000
22	1,97143	COMB21	Combination	62,137	-5,561	0,000	0,0000	0,0000
22	1,97143	COMB21	Combination	62,137	-7,344	0,000	0,0000	0,0000
22	2,07000	COMB21	Combination	62,137	-5,022	0,000	0,0000	0,0000
22	2,07000	COMB21	Combination	62,137	-6,826	0,000	0,0000	0,0000

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

Codice documento
SS0558_F0.doc

Rev
F0

Data
20/06/2011

Frame Text	Station m	OutputCase Text	CaseType Text	P KN	V2 KN	V3 KN	T KN-m	M2 KN-m
22	2,16857	COMB21	Combination	62,137	-4,503	0,000	0,0000	0,0000
22	2,16857	COMB21	Combination	62,137	-6,326	0,000	0,0000	0,0000
22	2,26714	COMB21	Combination	62,137	-4,004	0,000	0,0000	0,0000
22	2,26714	COMB21	Combination	62,137	-5,845	0,000	0,0000	0,0000
22	2,36571	COMB21	Combination	62,137	-3,523	0,000	0,0000	0,0000
22	2,36571	COMB21	Combination	62,137	-5,381	0,000	0,0000	0,0000
22	2,46429	COMB21	Combination	62,137	-3,058	0,000	0,0000	0,0000
22	2,46429	COMB21	Combination	62,137	-4,932	0,000	0,0000	0,0000
22	2,56286	COMB21	Combination	62,137	-2,610	0,000	0,0000	0,0000
22	2,56286	COMB21	Combination	62,137	-4,497	0,000	0,0000	0,0000
22	2,66143	COMB21	Combination	62,137	-2,175	0,000	0,0000	0,0000
22	2,66143	COMB21	Combination	62,137	-4,075	0,000	0,0000	0,0000
22	2,76000	COMB21	Combination	62,137	-1,753	0,000	0,0000	0,0000
22	2,76000	COMB21	Combination	62,137	-3,664	0,000	0,0000	0,0000
22	2,85857	COMB21	Combination	62,137	-1,341	0,000	0,0000	0,0000
22	2,85857	COMB21	Combination	62,137	-3,263	0,000	0,0000	0,0000
22	2,95714	COMB21	Combination	62,137	-0,940	0,000	0,0000	0,0000
22	2,95714	COMB21	Combination	62,137	-2,869	0,000	0,0000	0,0000
22	3,05571	COMB21	Combination	62,137	-0,547	0,000	0,0000	0,0000
22	3,05571	COMB21	Combination	62,137	-2,483	0,000	0,0000	0,0000
22	3,15429	COMB21	Combination	62,137	-0,160	0,000	0,0000	0,0000
22	3,15429	COMB21	Combination	62,137	-2,102	0,000	0,0000	0,0000
22	3,25286	COMB21	Combination	62,137	0,221	0,000	0,0000	0,0000
22	3,25286	COMB21	Combination	62,137	-1,724	0,000	0,0000	0,0000
22	3,35143	COMB21	Combination	62,137	0,599	0,000	0,0000	0,0000
22	3,35143	COMB21	Combination	62,137	-1,349	0,000	0,0000	0,0000
22	3,45000	COMB21	Combination	62,137	0,974	0,000	0,0000	0,0000
23	0,00000	COMB1	Combination	15,561	-0,382	0,000	9,978E-17	0,0000
23	0,09857	COMB1	Combination	15,561	2,638	0,000	9,978E-17	0,0000
23	0,09857	COMB1	Combination	15,561	-0,019	0,000	9,978E-17	0,0000
23	0,19714	COMB1	Combination	15,561	3,001	0,000	9,978E-17	0,0000
23	0,19714	COMB1	Combination	15,561	0,343	0,000	9,978E-17	0,0000
23	0,29571	COMB1	Combination	15,561	3,362	0,000	9,978E-17	0,0000
23	0,29571	COMB1	Combination	15,561	0,703	0,000	9,978E-17	0,0000
23	0,39429	COMB1	Combination	15,561	3,722	0,000	9,978E-17	0,0000
23	0,39429	COMB1	Combination	15,561	1,064	0,000	9,978E-17	0,0000
23	0,49286	COMB1	Combination	15,561	4,084	0,000	9,978E-17	0,0000
23	0,49286	COMB1	Combination	15,561	1,427	0,000	9,978E-17	0,0000
23	0,59143	COMB1	Combination	15,561	4,447	0,000	9,978E-17	0,0000
23	0,59143	COMB1	Combination	15,561	1,794	0,000	9,978E-17	0,0000
23	0,69000	COMB1	Combination	15,561	4,814	0,000	9,978E-17	0,0000
23	0,69000	COMB1	Combination	15,561	2,166	0,000	9,978E-17	0,0000
23	0,78857	COMB1	Combination	15,561	5,186	0,000	9,978E-17	0,0000
23	0,78857	COMB1	Combination	15,561	2,544	0,000	9,978E-17	0,0000
23	0,88714	COMB1	Combination	15,561	5,564	0,000	9,978E-17	0,0000
23	0,88714	COMB1	Combination	15,561	2,930	0,000	9,978E-17	0,0000
23	0,98571	COMB1	Combination	15,561	5,950	0,000	9,978E-17	0,0000
23	0,98571	COMB1	Combination	15,561	3,326	0,000	9,978E-17	0,0000
23	1,08429	COMB1	Combination	15,561	6,345	0,000	9,978E-17	0,0000
23	1,08429	COMB1	Combination	15,561	3,731	0,000	9,978E-17	0,0000
23	1,18286	COMB1	Combination	15,561	6,751	0,000	9,978E-17	0,0000
23	1,18286	COMB1	Combination	15,561	4,149	0,000	9,978E-17	0,0000
23	1,28143	COMB1	Combination	15,561	7,168	0,000	9,978E-17	0,0000
23	1,28143	COMB1	Combination	15,561	4,579	0,000	9,978E-17	0,0000
23	1,38000	COMB1	Combination	15,561	7,599	0,000	9,978E-17	0,0000
23	1,38000	COMB1	Combination	15,561	5,024	0,000	9,978E-17	0,0000
23	1,47857	COMB1	Combination	15,561	8,044	0,000	9,978E-17	0,0000
23	1,47857	COMB1	Combination	15,561	5,485	0,000	9,978E-17	0,0000
23	1,57714	COMB1	Combination	15,561	8,504	0,000	9,978E-17	0,0000
23	1,57714	COMB1	Combination	15,561	5,962	0,000	9,978E-17	0,0000
23	1,67571	COMB1	Combination	15,561	8,982	0,000	9,978E-17	0,0000
23	1,67571	COMB1	Combination	15,561	6,458	0,000	9,978E-17	0,0000
23	1,77429	COMB1	Combination	15,561	9,477	0,000	9,978E-17	0,0000

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

Codice documento

SS0558_F0.doc

Rev

F0

Data

20/06/2011

Frame Text	Station m	OutputCase Text	CaseType Text	P KN	V2 KN	V3 KN	T KN-m	M2 KN-m
23	1,77429	COMB1	Combination	15,561	6,972	0,000	9,978E-17	0,0000
23	1,87286	COMB1	Combination	15,561	9,992	0,000	9,978E-17	0,0000
23	1,87286	COMB1	Combination	15,561	7,507	0,000	9,978E-17	0,0000
23	1,97143	COMB1	Combination	15,561	10,527	0,000	9,978E-17	0,0000
23	1,97143	COMB1	Combination	15,561	8,064	0,000	9,978E-17	0,0000
23	2,07000	COMB1	Combination	15,561	11,083	0,000	9,978E-17	0,0000
23	2,07000	COMB1	Combination	15,561	8,643	0,000	9,978E-17	0,0000
23	2,16857	COMB1	Combination	15,561	11,662	0,000	9,978E-17	0,0000
23	2,16857	COMB1	Combination	15,561	9,245	0,000	9,978E-17	0,0000
23	2,26714	COMB1	Combination	15,561	12,265	0,000	9,978E-17	0,0000
23	2,26714	COMB1	Combination	15,561	9,872	0,000	9,978E-17	0,0000
23	2,36571	COMB1	Combination	15,561	12,891	0,000	9,978E-17	0,0000
23	2,36571	COMB1	Combination	15,561	10,524	0,000	9,978E-17	0,0000
23	2,46429	COMB1	Combination	15,561	13,544	0,000	9,978E-17	0,0000
23	2,46429	COMB1	Combination	15,561	11,203	0,000	9,978E-17	0,0000
23	2,56286	COMB1	Combination	15,561	14,222	0,000	9,978E-17	0,0000
23	2,56286	COMB1	Combination	15,561	11,908	0,000	9,978E-17	0,0000
23	2,66143	COMB1	Combination	15,561	14,927	0,000	9,978E-17	0,0000
23	2,66143	COMB1	Combination	15,561	12,641	0,000	9,978E-17	0,0000
23	2,76000	COMB1	Combination	15,561	15,661	0,000	9,978E-17	0,0000
23	2,76000	COMB1	Combination	15,561	13,403	0,000	9,978E-17	0,0000
23	2,85857	COMB1	Combination	15,561	16,423	0,000	9,978E-17	0,0000
23	2,85857	COMB1	Combination	15,561	14,194	0,000	9,978E-17	0,0000
23	2,95714	COMB1	Combination	15,561	17,213	0,000	9,978E-17	0,0000
23	2,95714	COMB1	Combination	15,561	15,015	0,000	9,978E-17	0,0000
23	3,05571	COMB1	Combination	15,561	18,034	0,000	9,978E-17	0,0000
23	3,05571	COMB1	Combination	15,561	15,866	0,000	9,978E-17	0,0000
23	3,15429	COMB1	Combination	15,561	18,885	0,000	9,978E-17	0,0000
23	3,15429	COMB1	Combination	15,561	16,747	0,000	9,978E-17	0,0000
23	3,25286	COMB1	Combination	15,561	19,767	0,000	9,978E-17	0,0000
23	3,25286	COMB1	Combination	15,561	17,660	0,000	9,978E-17	0,0000
23	3,35143	COMB1	Combination	15,561	20,680	0,000	9,978E-17	0,0000
23	3,35143	COMB1	Combination	15,561	18,604	0,000	9,978E-17	0,0000
23	3,45000	COMB1	Combination	15,561	21,624	0,000	9,978E-17	0,0000
23	0,00000	COMB2	Combination	208,083	-0,036	0,000	1,372E-16	0,0000
23	0,09857	COMB2	Combination	208,083	2,984	0,000	1,372E-16	0,0000
23	0,09857	COMB2	Combination	208,083	0,326	0,000	1,372E-16	0,0000
23	0,19714	COMB2	Combination	208,083	3,345	0,000	1,372E-16	0,0000
23	0,19714	COMB2	Combination	208,083	0,684	0,000	1,372E-16	0,0000
23	0,29571	COMB2	Combination	208,083	3,703	0,000	1,372E-16	0,0000
23	0,29571	COMB2	Combination	208,083	1,039	0,000	1,372E-16	0,0000
23	0,39429	COMB2	Combination	208,083	4,059	0,000	1,372E-16	0,0000
23	0,39429	COMB2	Combination	208,083	1,394	0,000	1,372E-16	0,0000
23	0,49286	COMB2	Combination	208,083	4,414	0,000	1,372E-16	0,0000
23	0,49286	COMB2	Combination	208,083	1,749	0,000	1,372E-16	0,0000
23	0,59143	COMB2	Combination	208,083	4,769	0,000	1,372E-16	0,0000
23	0,59143	COMB2	Combination	208,083	2,107	0,000	1,372E-16	0,0000
23	0,69000	COMB2	Combination	208,083	5,126	0,000	1,372E-16	0,0000
23	0,69000	COMB2	Combination	208,083	2,467	0,000	1,372E-16	0,0000
23	0,78857	COMB2	Combination	208,083	5,487	0,000	1,372E-16	0,0000
23	0,78857	COMB2	Combination	208,083	2,832	0,000	1,372E-16	0,0000
23	0,88714	COMB2	Combination	208,083	5,852	0,000	1,372E-16	0,0000
23	0,88714	COMB2	Combination	208,083	3,204	0,000	1,372E-16	0,0000
23	0,98571	COMB2	Combination	208,083	6,223	0,000	1,372E-16	0,0000
23	0,98571	COMB2	Combination	208,083	3,583	0,000	1,372E-16	0,0000
23	1,08429	COMB2	Combination	208,083	6,602	0,000	1,372E-16	0,0000
23	1,08429	COMB2	Combination	208,083	3,970	0,000	1,372E-16	0,0000
23	1,18286	COMB2	Combination	208,083	6,990	0,000	1,372E-16	0,0000
23	1,18286	COMB2	Combination	208,083	4,368	0,000	1,372E-16	0,0000
23	1,28143	COMB2	Combination	208,083	7,388	0,000	1,372E-16	0,0000
23	1,28143	COMB2	Combination	208,083	4,777	0,000	1,372E-16	0,0000
23	1,38000	COMB2	Combination	208,083	7,797	0,000	1,372E-16	0,0000
23	1,38000	COMB2	Combination	208,083	5,199	0,000	1,372E-16	0,0000

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

Codice documento

SS0558_F0.doc

Rev

F0

Data

20/06/2011

Frame Text	Station m	OutputCase Text	CaseType Text	P KN	V2 KN	V3 KN	T KN-m	M2 KN-m
23	1,47857	COMB2	Combination	208,083	8,218	0,000	1,372E-16	0,0000
23	1,47857	COMB2	Combination	208,083	5,635	0,000	1,372E-16	0,0000
23	1,57714	COMB2	Combination	208,083	8,654	0,000	1,372E-16	0,0000
23	1,57714	COMB2	Combination	208,083	6,085	0,000	1,372E-16	0,0000
23	1,67571	COMB2	Combination	208,083	9,105	0,000	1,372E-16	0,0000
23	1,67571	COMB2	Combination	208,083	6,552	0,000	1,372E-16	0,0000
23	1,77429	COMB2	Combination	208,083	9,572	0,000	1,372E-16	0,0000
23	1,77429	COMB2	Combination	208,083	7,036	0,000	1,372E-16	0,0000
23	1,87286	COMB2	Combination	208,083	10,056	0,000	1,372E-16	0,0000
23	1,87286	COMB2	Combination	208,083	7,539	0,000	1,372E-16	0,0000
23	1,97143	COMB2	Combination	208,083	10,559	0,000	1,372E-16	0,0000
23	1,97143	COMB2	Combination	208,083	8,061	0,000	1,372E-16	0,0000
23	2,07000	COMB2	Combination	208,083	11,081	0,000	1,372E-16	0,0000
23	2,07000	COMB2	Combination	208,083	8,604	0,000	1,372E-16	0,0000
23	2,16857	COMB2	Combination	208,083	11,624	0,000	1,372E-16	0,0000
23	2,16857	COMB2	Combination	208,083	9,168	0,000	1,372E-16	0,0000
23	2,26714	COMB2	Combination	208,083	12,188	0,000	1,372E-16	0,0000
23	2,26714	COMB2	Combination	208,083	9,755	0,000	1,372E-16	0,0000
23	2,36571	COMB2	Combination	208,083	12,775	0,000	1,372E-16	0,0000
23	2,36571	COMB2	Combination	208,083	10,365	0,000	1,372E-16	0,0000
23	2,46429	COMB2	Combination	208,083	13,385	0,000	1,372E-16	0,0000
23	2,46429	COMB2	Combination	208,083	11,000	0,000	1,372E-16	0,0000
23	2,56286	COMB2	Combination	208,083	14,019	0,000	1,372E-16	0,0000
23	2,56286	COMB2	Combination	208,083	11,659	0,000	1,372E-16	0,0000
23	2,66143	COMB2	Combination	208,083	14,679	0,000	1,372E-16	0,0000
23	2,66143	COMB2	Combination	208,083	12,344	0,000	1,372E-16	0,0000
23	2,76000	COMB2	Combination	208,083	15,364	0,000	1,372E-16	0,0000
23	2,76000	COMB2	Combination	208,083	13,056	0,000	1,372E-16	0,0000
23	2,85857	COMB2	Combination	208,083	16,075	0,000	1,372E-16	0,0000
23	2,85857	COMB2	Combination	208,083	13,794	0,000	1,372E-16	0,0000
23	2,95714	COMB2	Combination	208,083	16,814	0,000	1,372E-16	0,0000
23	2,95714	COMB2	Combination	208,083	14,561	0,000	1,372E-16	0,0000
23	3,05571	COMB2	Combination	208,083	17,580	0,000	1,372E-16	0,0000
23	3,05571	COMB2	Combination	208,083	15,355	0,000	1,372E-16	0,0000
23	3,15429	COMB2	Combination	208,083	18,374	0,000	1,372E-16	0,0000
23	3,15429	COMB2	Combination	208,083	16,178	0,000	1,372E-16	0,0000
23	3,25286	COMB2	Combination	208,083	19,197	0,000	1,372E-16	0,0000
23	3,25286	COMB2	Combination	208,083	17,030	0,000	1,372E-16	0,0000
23	3,35143	COMB2	Combination	208,083	20,049	0,000	1,372E-16	0,0000
23	3,35143	COMB2	Combination	208,083	17,910	0,000	1,372E-16	0,0000
23	3,45000	COMB2	Combination	208,083	20,930	0,000	1,372E-16	0,0000
23	0,00000	COMB3	Combination	-119,508	-0,382	0,000	9,978E-17	0,0000
23	0,09857	COMB3	Combination	-119,508	2,638	0,000	9,978E-17	0,0000
23	0,09857	COMB3	Combination	-119,508	-0,019	0,000	9,978E-17	0,0000
23	0,19714	COMB3	Combination	-119,508	3,001	0,000	9,978E-17	0,0000
23	0,19714	COMB3	Combination	-119,508	0,343	0,000	9,978E-17	0,0000
23	0,29571	COMB3	Combination	-119,508	3,362	0,000	9,978E-17	0,0000
23	0,29571	COMB3	Combination	-119,508	0,703	0,000	9,978E-17	0,0000
23	0,39429	COMB3	Combination	-119,508	3,722	0,000	9,978E-17	0,0000
23	0,39429	COMB3	Combination	-119,508	1,064	0,000	9,978E-17	0,0000
23	0,49286	COMB3	Combination	-119,508	4,084	0,000	9,978E-17	0,0000
23	0,49286	COMB3	Combination	-119,508	1,427	0,000	9,978E-17	0,0000
23	0,59143	COMB3	Combination	-119,508	4,447	0,000	9,978E-17	0,0000
23	0,59143	COMB3	Combination	-119,508	1,794	0,000	9,978E-17	0,0000
23	0,69000	COMB3	Combination	-119,508	4,814	0,000	9,978E-17	0,0000
23	0,69000	COMB3	Combination	-119,508	2,166	0,000	9,978E-17	0,0000
23	0,78857	COMB3	Combination	-119,508	5,186	0,000	9,978E-17	0,0000
23	0,78857	COMB3	Combination	-119,508	2,544	0,000	9,978E-17	0,0000
23	0,88714	COMB3	Combination	-119,508	5,564	0,000	9,978E-17	0,0000
23	0,88714	COMB3	Combination	-119,508	2,930	0,000	9,978E-17	0,0000
23	0,98571	COMB3	Combination	-119,508	5,950	0,000	9,978E-17	0,0000
23	0,98571	COMB3	Combination	-119,508	3,326	0,000	9,978E-17	0,0000
23	1,08429	COMB3	Combination	-119,508	6,345	0,000	9,978E-17	0,0000

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

Codice documento
SS0558_F0.doc

Rev
F0

Data
20/06/2011

Frame Text	Station m	OutputCase Text	CaseType Text	P KN	V2 KN	V3 KN	T KN-m	M2 KN-m
23	1,08429	COMB3	Combination	-119,508	3,731	0,000	9,978E-17	0,0000
23	1,18286	COMB3	Combination	-119,508	6,751	0,000	9,978E-17	0,0000
23	1,18286	COMB3	Combination	-119,508	4,149	0,000	9,978E-17	0,0000
23	1,28143	COMB3	Combination	-119,508	7,168	0,000	9,978E-17	0,0000
23	1,28143	COMB3	Combination	-119,508	4,579	0,000	9,978E-17	0,0000
23	1,38000	COMB3	Combination	-119,508	7,599	0,000	9,978E-17	0,0000
23	1,38000	COMB3	Combination	-119,508	5,024	0,000	9,978E-17	0,0000
23	1,47857	COMB3	Combination	-119,508	8,044	0,000	9,978E-17	0,0000
23	1,47857	COMB3	Combination	-119,508	5,485	0,000	9,978E-17	0,0000
23	1,57714	COMB3	Combination	-119,508	8,504	0,000	9,978E-17	0,0000
23	1,57714	COMB3	Combination	-119,508	5,962	0,000	9,978E-17	0,0000
23	1,67571	COMB3	Combination	-119,508	8,982	0,000	9,978E-17	0,0000
23	1,67571	COMB3	Combination	-119,508	6,458	0,000	9,978E-17	0,0000
23	1,77429	COMB3	Combination	-119,508	9,477	0,000	9,978E-17	0,0000
23	1,77429	COMB3	Combination	-119,508	6,972	0,000	9,978E-17	0,0000
23	1,87286	COMB3	Combination	-119,508	9,992	0,000	9,978E-17	0,0000
23	1,87286	COMB3	Combination	-119,508	7,507	0,000	9,978E-17	0,0000
23	1,97143	COMB3	Combination	-119,508	10,527	0,000	9,978E-17	0,0000
23	1,97143	COMB3	Combination	-119,508	8,064	0,000	9,978E-17	0,0000
23	2,07000	COMB3	Combination	-119,508	11,083	0,000	9,978E-17	0,0000
23	2,07000	COMB3	Combination	-119,508	8,643	0,000	9,978E-17	0,0000
23	2,16857	COMB3	Combination	-119,508	11,662	0,000	9,978E-17	0,0000
23	2,16857	COMB3	Combination	-119,508	9,245	0,000	9,978E-17	0,0000
23	2,26714	COMB3	Combination	-119,508	12,265	0,000	9,978E-17	0,0000
23	2,26714	COMB3	Combination	-119,508	9,872	0,000	9,978E-17	0,0000
23	2,36571	COMB3	Combination	-119,508	12,891	0,000	9,978E-17	0,0000
23	2,36571	COMB3	Combination	-119,508	10,524	0,000	9,978E-17	0,0000
23	2,46429	COMB3	Combination	-119,508	13,544	0,000	9,978E-17	0,0000
23	2,46429	COMB3	Combination	-119,508	11,203	0,000	9,978E-17	0,0000
23	2,56286	COMB3	Combination	-119,508	14,222	0,000	9,978E-17	0,0000
23	2,56286	COMB3	Combination	-119,508	11,908	0,000	9,978E-17	0,0000
23	2,66143	COMB3	Combination	-119,508	14,927	0,000	9,978E-17	0,0000
23	2,66143	COMB3	Combination	-119,508	12,641	0,000	9,978E-17	0,0000
23	2,76000	COMB3	Combination	-119,508	15,661	0,000	9,978E-17	0,0000
23	2,76000	COMB3	Combination	-119,508	13,403	0,000	9,978E-17	0,0000
23	2,85857	COMB3	Combination	-119,508	16,423	0,000	9,978E-17	0,0000
23	2,85857	COMB3	Combination	-119,508	14,194	0,000	9,978E-17	0,0000
23	2,95714	COMB3	Combination	-119,508	17,213	0,000	9,978E-17	0,0000
23	2,95714	COMB3	Combination	-119,508	15,015	0,000	9,978E-17	0,0000
23	3,05571	COMB3	Combination	-119,508	18,034	0,000	9,978E-17	0,0000
23	3,05571	COMB3	Combination	-119,508	15,866	0,000	9,978E-17	0,0000
23	3,15429	COMB3	Combination	-119,508	18,885	0,000	9,978E-17	0,0000
23	3,15429	COMB3	Combination	-119,508	16,747	0,000	9,978E-17	0,0000
23	3,25286	COMB3	Combination	-119,508	19,767	0,000	9,978E-17	0,0000
23	3,25286	COMB3	Combination	-119,508	17,660	0,000	9,978E-17	0,0000
23	3,35143	COMB3	Combination	-119,508	20,680	0,000	9,978E-17	0,0000
23	3,35143	COMB3	Combination	-119,508	18,604	0,000	9,978E-17	0,0000
23	3,45000	COMB3	Combination	-119,508	21,624	0,000	9,978E-17	0,0000
23	0,00000	COMB4	Combination	172,223	0,143	0,000	1,564E-16	0,0000
23	0,09857	COMB4	Combination	172,223	3,162	0,000	1,564E-16	0,0000
23	0,09857	COMB4	Combination	172,223	0,504	0,000	1,564E-16	0,0000
23	0,19714	COMB4	Combination	172,223	3,523	0,000	1,564E-16	0,0000
23	0,19714	COMB4	Combination	172,223	0,860	0,000	1,564E-16	0,0000
23	0,29571	COMB4	Combination	172,223	3,879	0,000	1,564E-16	0,0000
23	0,29571	COMB4	Combination	172,223	1,213	0,000	1,564E-16	0,0000
23	0,39429	COMB4	Combination	172,223	4,232	0,000	1,564E-16	0,0000
23	0,39429	COMB4	Combination	172,223	1,564	0,000	1,564E-16	0,0000
23	0,49286	COMB4	Combination	172,223	4,584	0,000	1,564E-16	0,0000
23	0,49286	COMB4	Combination	172,223	1,915	0,000	1,564E-16	0,0000
23	0,59143	COMB4	Combination	172,223	4,935	0,000	1,564E-16	0,0000
23	0,59143	COMB4	Combination	172,223	2,268	0,000	1,564E-16	0,0000
23	0,69000	COMB4	Combination	172,223	5,287	0,000	1,564E-16	0,0000
23	0,69000	COMB4	Combination	172,223	2,622	0,000	1,564E-16	0,0000

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

Codice documento
SS0558_F0.doc

Rev
F0

Data
20/06/2011

Frame Text	Station m	OutputCase Text	CaseType Text	P KN	V2 KN	V3 KN	T KN-m	M2 KN-m
23	0,78857	COMB4	Combination	172,223	5,642	0,000	1,564E-16	0,0000
23	0,78857	COMB4	Combination	172,223	2,981	0,000	1,564E-16	0,0000
23	0,88714	COMB4	Combination	172,223	6,000	0,000	1,564E-16	0,0000
23	0,88714	COMB4	Combination	172,223	3,345	0,000	1,564E-16	0,0000
23	0,98571	COMB4	Combination	172,223	6,364	0,000	1,564E-16	0,0000
23	0,98571	COMB4	Combination	172,223	3,715	0,000	1,564E-16	0,0000
23	1,08429	COMB4	Combination	172,223	6,735	0,000	1,564E-16	0,0000
23	1,08429	COMB4	Combination	172,223	4,094	0,000	1,564E-16	0,0000
23	1,18286	COMB4	Combination	172,223	7,113	0,000	1,564E-16	0,0000
23	1,18286	COMB4	Combination	172,223	4,481	0,000	1,564E-16	0,0000
23	1,28143	COMB4	Combination	172,223	7,501	0,000	1,564E-16	0,0000
23	1,28143	COMB4	Combination	172,223	4,879	0,000	1,564E-16	0,0000
23	1,38000	COMB4	Combination	172,223	7,899	0,000	1,564E-16	0,0000
23	1,38000	COMB4	Combination	172,223	5,289	0,000	1,564E-16	0,0000
23	1,47857	COMB4	Combination	172,223	8,309	0,000	1,564E-16	0,0000
23	1,47857	COMB4	Combination	172,223	5,712	0,000	1,564E-16	0,0000
23	1,57714	COMB4	Combination	172,223	8,731	0,000	1,564E-16	0,0000
23	1,57714	COMB4	Combination	172,223	6,149	0,000	1,564E-16	0,0000
23	1,67571	COMB4	Combination	172,223	9,168	0,000	1,564E-16	0,0000
23	1,67571	COMB4	Combination	172,223	6,601	0,000	1,564E-16	0,0000
23	1,77429	COMB4	Combination	172,223	9,620	0,000	1,564E-16	0,0000
23	1,77429	COMB4	Combination	172,223	7,069	0,000	1,564E-16	0,0000
23	1,87286	COMB4	Combination	172,223	10,089	0,000	1,564E-16	0,0000
23	1,87286	COMB4	Combination	172,223	7,555	0,000	1,564E-16	0,0000
23	1,97143	COMB4	Combination	172,223	10,575	0,000	1,564E-16	0,0000
23	1,97143	COMB4	Combination	172,223	8,060	0,000	1,564E-16	0,0000
23	2,07000	COMB4	Combination	172,223	11,080	0,000	1,564E-16	0,0000
23	2,07000	COMB4	Combination	172,223	8,584	0,000	1,564E-16	0,0000
23	2,16857	COMB4	Combination	172,223	11,604	0,000	1,564E-16	0,0000
23	2,16857	COMB4	Combination	172,223	9,129	0,000	1,564E-16	0,0000
23	2,26714	COMB4	Combination	172,223	12,148	0,000	1,564E-16	0,0000
23	2,26714	COMB4	Combination	172,223	9,695	0,000	1,564E-16	0,0000
23	2,36571	COMB4	Combination	172,223	12,715	0,000	1,564E-16	0,0000
23	2,36571	COMB4	Combination	172,223	10,284	0,000	1,564E-16	0,0000
23	2,46429	COMB4	Combination	172,223	13,303	0,000	1,564E-16	0,0000
23	2,46429	COMB4	Combination	172,223	10,895	0,000	1,564E-16	0,0000
23	2,56286	COMB4	Combination	172,223	13,915	0,000	1,564E-16	0,0000
23	2,56286	COMB4	Combination	172,223	11,531	0,000	1,564E-16	0,0000
23	2,66143	COMB4	Combination	172,223	14,550	0,000	1,564E-16	0,0000
23	2,66143	COMB4	Combination	172,223	12,191	0,000	1,564E-16	0,0000
23	2,76000	COMB4	Combination	172,223	15,211	0,000	1,564E-16	0,0000
23	2,76000	COMB4	Combination	172,223	12,877	0,000	1,564E-16	0,0000
23	2,85857	COMB4	Combination	172,223	15,896	0,000	1,564E-16	0,0000
23	2,85857	COMB4	Combination	172,223	13,589	0,000	1,564E-16	0,0000
23	2,95714	COMB4	Combination	172,223	16,608	0,000	1,564E-16	0,0000
23	2,95714	COMB4	Combination	172,223	14,327	0,000	1,564E-16	0,0000
23	3,05571	COMB4	Combination	172,223	17,346	0,000	1,564E-16	0,0000
23	3,05571	COMB4	Combination	172,223	15,092	0,000	1,564E-16	0,0000
23	3,15429	COMB4	Combination	172,223	18,111	0,000	1,564E-16	0,0000
23	3,15429	COMB4	Combination	172,223	15,884	0,000	1,564E-16	0,0000
23	3,25286	COMB4	Combination	172,223	18,904	0,000	1,564E-16	0,0000
23	3,25286	COMB4	Combination	172,223	16,705	0,000	1,564E-16	0,0000
23	3,35143	COMB4	Combination	172,223	19,724	0,000	1,564E-16	0,0000
23	3,35143	COMB4	Combination	172,223	17,553	0,000	1,564E-16	0,0000
23	3,45000	COMB4	Combination	172,223	20,572	0,000	1,564E-16	0,0000
23	0,00000	COMB5	Combination	-21,619	-0,123	0	9,719E-17	0
23	0,09857	COMB5	Combination	-21,619	2,199	0	9,719E-17	0
23	0,09857	COMB5	Combination	-21,619	0,234	0	9,719E-17	0
23	0,19714	COMB5	Combination	-21,619	2,557	0	9,719E-17	0
23	0,19714	COMB5	Combination	-21,619	0,59	0	9,719E-17	0
23	0,29571	COMB5	Combination	-21,619	2,913	0	9,719E-17	0
23	0,29571	COMB5	Combination	-21,619	0,946	0	9,719E-17	0
23	0,39429	COMB5	Combination	-21,619	3,268	0	9,719E-17	0

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

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SS0558_F0.doc

Rev

F0

Data

20/06/2011

Frame Text	Station m	OutputCase Text	CaseType Text	P KN	V2 KN	V3 KN	T KN-m	M2 KN-m
23	0,39429	COMB5	Combination	-21,619	1,302	0	9,719E-17	0
23	0,49286	COMB5	Combination	-21,619	3,625	0	9,719E-17	0
23	0,49286	COMB5	Combination	-21,619	1,661	0	9,719E-17	0
23	0,59143	COMB5	Combination	-21,619	3,984	0	9,719E-17	0
23	0,59143	COMB5	Combination	-21,619	2,024	0	9,719E-17	0
23	0,69000	COMB5	Combination	-21,619	4,347	0	9,719E-17	0
23	0,69000	COMB5	Combination	-21,619	2,392	0	9,719E-17	0
23	0,78857	COMB5	Combination	-21,619	4,715	0	9,719E-17	0
23	0,78857	COMB5	Combination	-21,619	2,767	0	9,719E-17	0
23	0,88714	COMB5	Combination	-21,619	5,089	0	9,719E-17	0
23	0,88714	COMB5	Combination	-21,619	3,15	0	9,719E-17	0
23	0,98571	COMB5	Combination	-21,619	5,472	0	9,719E-17	0
23	0,98571	COMB5	Combination	-21,619	3,542	0	9,719E-17	0
23	1,08429	COMB5	Combination	-21,619	5,864	0	9,719E-17	0
23	1,08429	COMB5	Combination	-21,619	3,944	0	9,719E-17	0
23	1,18286	COMB5	Combination	-21,619	6,267	0	9,719E-17	0
23	1,18286	COMB5	Combination	-21,619	4,359	0	9,719E-17	0
23	1,28143	COMB5	Combination	-21,619	6,682	0	9,719E-17	0
23	1,28143	COMB5	Combination	-21,619	4,787	0	9,719E-17	0
23	1,38000	COMB5	Combination	-21,619	7,11	0	9,719E-17	0
23	1,38000	COMB5	Combination	-21,619	5,229	0	9,719E-17	0
23	1,47857	COMB5	Combination	-21,619	7,552	0	9,719E-17	0
23	1,47857	COMB5	Combination	-21,619	5,687	0	9,719E-17	0
23	1,57714	COMB5	Combination	-21,619	8,01	0	9,719E-17	0
23	1,57714	COMB5	Combination	-21,619	6,163	0	9,719E-17	0
23	1,67571	COMB5	Combination	-21,619	8,485	0	9,719E-17	0
23	1,67571	COMB5	Combination	-21,619	6,656	0	9,719E-17	0
23	1,77429	COMB5	Combination	-21,619	8,978	0	9,719E-17	0
23	1,77429	COMB5	Combination	-21,619	7,168	0	9,719E-17	0
23	1,87286	COMB5	Combination	-21,619	9,491	0	9,719E-17	0
23	1,87286	COMB5	Combination	-21,619	7,701	0	9,719E-17	0
23	1,97143	COMB5	Combination	-21,619	10,024	0	9,719E-17	0
23	1,97143	COMB5	Combination	-21,619	8,255	0	9,719E-17	0
23	2,07000	COMB5	Combination	-21,619	10,578	0	9,719E-17	0
23	2,07000	COMB5	Combination	-21,619	8,832	0	9,719E-17	0
23	2,16857	COMB5	Combination	-21,619	11,155	0	9,719E-17	0
23	2,16857	COMB5	Combination	-21,619	9,433	0	9,719E-17	0
23	2,26714	COMB5	Combination	-21,619	11,755	0	9,719E-17	0
23	2,26714	COMB5	Combination	-21,619	10,057	0	9,719E-17	0
23	2,36571	COMB5	Combination	-21,619	12,38	0	9,719E-17	0
23	2,36571	COMB5	Combination	-21,619	10,707	0	9,719E-17	0
23	2,46429	COMB5	Combination	-21,619	13,03	0	9,719E-17	0
23	2,46429	COMB5	Combination	-21,619	11,384	0	9,719E-17	0
23	2,56286	COMB5	Combination	-21,619	13,706	0	9,719E-17	0
23	2,56286	COMB5	Combination	-21,619	12,087	0	9,719E-17	0
23	2,66143	COMB5	Combination	-21,619	14,41	0	9,719E-17	0
23	2,66143	COMB5	Combination	-21,619	12,818	0	9,719E-17	0
23	2,76000	COMB5	Combination	-21,619	15,141	0	9,719E-17	0
23	2,76000	COMB5	Combination	-21,619	13,578	0	9,719E-17	0
23	2,85857	COMB5	Combination	-21,619	15,9	0	9,719E-17	0
23	2,85857	COMB5	Combination	-21,619	14,366	0	9,719E-17	0
23	2,95714	COMB5	Combination	-21,619	16,689	0	9,719E-17	0
23	2,95714	COMB5	Combination	-21,619	15,185	0	9,719E-17	0
23	3,05571	COMB5	Combination	-21,619	17,507	0	9,719E-17	0
23	3,05571	COMB5	Combination	-21,619	16,033	0	9,719E-17	0
23	3,15429	COMB5	Combination	-21,619	18,356	0	9,719E-17	0
23	3,15429	COMB5	Combination	-21,619	16,913	0	9,719E-17	0
23	3,25286	COMB5	Combination	-21,619	19,235	0	9,719E-17	0
23	3,25286	COMB5	Combination	-21,619	17,823	0	9,719E-17	0
23	3,35143	COMB5	Combination	-21,619	20,145	0	9,719E-17	0
23	3,35143	COMB5	Combination	-21,619	18,764	0	9,719E-17	0
23	3,45000	COMB5	Combination	-21,619	21,087	0	9,719E-17	0
23	0,00000	COMB6	Combination	277,677	-0,382	0,000	9,978E-17	0,0000

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

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SS0558_F0.doc

Rev
F0

Data
20/06/2011

Frame Text	Station m	OutputCase Text	CaseType Text	P KN	V2 KN	V3 KN	T KN-m	M2 KN-m
23	0,09857	COMB6	Combination	277,677	2,638	0,000	9,978E-17	0,0000
23	0,09857	COMB6	Combination	277,677	-0,019	0,000	9,978E-17	0,0000
23	0,19714	COMB6	Combination	277,677	3,001	0,000	9,978E-17	0,0000
23	0,19714	COMB6	Combination	277,677	0,343	0,000	9,978E-17	0,0000
23	0,29571	COMB6	Combination	277,677	3,362	0,000	9,978E-17	0,0000
23	0,29571	COMB6	Combination	277,677	0,703	0,000	9,978E-17	0,0000
23	0,39429	COMB6	Combination	277,677	3,722	0,000	9,978E-17	0,0000
23	0,39429	COMB6	Combination	277,677	1,064	0,000	9,978E-17	0,0000
23	0,49286	COMB6	Combination	277,677	4,084	0,000	9,978E-17	0,0000
23	0,49286	COMB6	Combination	277,677	1,427	0,000	9,978E-17	0,0000
23	0,59143	COMB6	Combination	277,677	4,447	0,000	9,978E-17	0,0000
23	0,59143	COMB6	Combination	277,677	1,794	0,000	9,978E-17	0,0000
23	0,69000	COMB6	Combination	277,677	4,814	0,000	9,978E-17	0,0000
23	0,69000	COMB6	Combination	277,677	2,166	0,000	9,978E-17	0,0000
23	0,78857	COMB6	Combination	277,677	5,186	0,000	9,978E-17	0,0000
23	0,78857	COMB6	Combination	277,677	2,544	0,000	9,978E-17	0,0000
23	0,88714	COMB6	Combination	277,677	5,564	0,000	9,978E-17	0,0000
23	0,88714	COMB6	Combination	277,677	2,930	0,000	9,978E-17	0,0000
23	0,98571	COMB6	Combination	277,677	5,950	0,000	9,978E-17	0,0000
23	0,98571	COMB6	Combination	277,677	3,326	0,000	9,978E-17	0,0000
23	1,08429	COMB6	Combination	277,677	6,345	0,000	9,978E-17	0,0000
23	1,08429	COMB6	Combination	277,677	3,731	0,000	9,978E-17	0,0000
23	1,18286	COMB6	Combination	277,677	6,751	0,000	9,978E-17	0,0000
23	1,18286	COMB6	Combination	277,677	4,149	0,000	9,978E-17	0,0000
23	1,28143	COMB6	Combination	277,677	7,168	0,000	9,978E-17	0,0000
23	1,28143	COMB6	Combination	277,677	4,579	0,000	9,978E-17	0,0000
23	1,38000	COMB6	Combination	277,677	7,599	0,000	9,978E-17	0,0000
23	1,38000	COMB6	Combination	277,677	5,024	0,000	9,978E-17	0,0000
23	1,47857	COMB6	Combination	277,677	8,044	0,000	9,978E-17	0,0000
23	1,47857	COMB6	Combination	277,677	5,485	0,000	9,978E-17	0,0000
23	1,57714	COMB6	Combination	277,677	8,504	0,000	9,978E-17	0,0000
23	1,57714	COMB6	Combination	277,677	5,962	0,000	9,978E-17	0,0000
23	1,67571	COMB6	Combination	277,677	8,982	0,000	9,978E-17	0,0000
23	1,67571	COMB6	Combination	277,677	6,458	0,000	9,978E-17	0,0000
23	1,77429	COMB6	Combination	277,677	9,477	0,000	9,978E-17	0,0000
23	1,77429	COMB6	Combination	277,677	6,972	0,000	9,978E-17	0,0000
23	1,87286	COMB6	Combination	277,677	9,992	0,000	9,978E-17	0,0000
23	1,87286	COMB6	Combination	277,677	7,507	0,000	9,978E-17	0,0000
23	1,97143	COMB6	Combination	277,677	10,527	0,000	9,978E-17	0,0000
23	1,97143	COMB6	Combination	277,677	8,064	0,000	9,978E-17	0,0000
23	2,07000	COMB6	Combination	277,677	11,083	0,000	9,978E-17	0,0000
23	2,07000	COMB6	Combination	277,677	8,643	0,000	9,978E-17	0,0000
23	2,16857	COMB6	Combination	277,677	11,662	0,000	9,978E-17	0,0000
23	2,16857	COMB6	Combination	277,677	9,245	0,000	9,978E-17	0,0000
23	2,26714	COMB6	Combination	277,677	12,265	0,000	9,978E-17	0,0000
23	2,26714	COMB6	Combination	277,677	9,872	0,000	9,978E-17	0,0000
23	2,36571	COMB6	Combination	277,677	12,891	0,000	9,978E-17	0,0000
23	2,36571	COMB6	Combination	277,677	10,524	0,000	9,978E-17	0,0000
23	2,46429	COMB6	Combination	277,677	13,544	0,000	9,978E-17	0,0000
23	2,46429	COMB6	Combination	277,677	11,203	0,000	9,978E-17	0,0000
23	2,56286	COMB6	Combination	277,677	14,222	0,000	9,978E-17	0,0000
23	2,56286	COMB6	Combination	277,677	11,908	0,000	9,978E-17	0,0000
23	2,66143	COMB6	Combination	277,677	14,927	0,000	9,978E-17	0,0000
23	2,66143	COMB6	Combination	277,677	12,641	0,000	9,978E-17	0,0000
23	2,76000	COMB6	Combination	277,677	15,661	0,000	9,978E-17	0,0000
23	2,76000	COMB6	Combination	277,677	13,403	0,000	9,978E-17	0,0000
23	2,85857	COMB6	Combination	277,677	16,423	0,000	9,978E-17	0,0000
23	2,85857	COMB6	Combination	277,677	14,194	0,000	9,978E-17	0,0000
23	2,95714	COMB6	Combination	277,677	17,213	0,000	9,978E-17	0,0000
23	2,95714	COMB6	Combination	277,677	15,015	0,000	9,978E-17	0,0000
23	3,05571	COMB6	Combination	277,677	18,034	0,000	9,978E-17	0,0000
23	3,05571	COMB6	Combination	277,677	15,866	0,000	9,978E-17	0,0000
23	3,15429	COMB6	Combination	277,677	18,885	0,000	9,978E-17	0,0000

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

Codice documento
SS0558_F0.doc

Rev
F0

Data
20/06/2011

Frame Text	Station m	OutputCase Text	CaseType Text	P KN	V2 KN	V3 KN	T KN-m	M2 KN-m
23	3,15429	COMB6	Combination	277,677	16,747	0,000	9,978E-17	0,0000
23	3,25286	COMB6	Combination	277,677	19,767	0,000	9,978E-17	0,0000
23	3,25286	COMB6	Combination	277,677	17,660	0,000	9,978E-17	0,0000
23	3,35143	COMB6	Combination	277,677	20,680	0,000	9,978E-17	0,0000
23	3,35143	COMB6	Combination	277,677	18,604	0,000	9,978E-17	0,0000
23	3,45000	COMB6	Combination	277,677	21,624	0,000	9,978E-17	0,0000
23	0,00000	COMB7	Combination	8,629	-0,230	0,000	8,499E-17	0,0000
23	0,09857	COMB7	Combination	8,629	2,093	0,000	8,499E-17	0,0000
23	0,09857	COMB7	Combination	8,629	0,021	0,000	8,499E-17	0,0000
23	0,19714	COMB7	Combination	8,629	2,344	0,000	8,499E-17	0,0000
23	0,19714	COMB7	Combination	8,629	0,270	0,000	8,499E-17	0,0000
23	0,29571	COMB7	Combination	8,629	2,593	0,000	8,499E-17	0,0000
23	0,29571	COMB7	Combination	8,629	0,518	0,000	8,499E-17	0,0000
23	0,39429	COMB7	Combination	8,629	2,841	0,000	8,499E-17	0,0000
23	0,39429	COMB7	Combination	8,629	0,765	0,000	8,499E-17	0,0000
23	0,49286	COMB7	Combination	8,629	3,088	0,000	8,499E-17	0,0000
23	0,49286	COMB7	Combination	8,629	1,014	0,000	8,499E-17	0,0000
23	0,59143	COMB7	Combination	8,629	3,336	0,000	8,499E-17	0,0000
23	0,59143	COMB7	Combination	8,629	1,264	0,000	8,499E-17	0,0000
23	0,69000	COMB7	Combination	8,629	3,586	0,000	8,499E-17	0,0000
23	0,69000	COMB7	Combination	8,629	1,517	0,000	8,499E-17	0,0000
23	0,78857	COMB7	Combination	8,629	3,839	0,000	8,499E-17	0,0000
23	0,78857	COMB7	Combination	8,629	1,773	0,000	8,499E-17	0,0000
23	0,88714	COMB7	Combination	8,629	4,096	0,000	8,499E-17	0,0000
23	0,88714	COMB7	Combination	8,629	2,034	0,000	8,499E-17	0,0000
23	0,98571	COMB7	Combination	8,629	4,357	0,000	8,499E-17	0,0000
23	0,98571	COMB7	Combination	8,629	2,301	0,000	8,499E-17	0,0000
23	1,08429	COMB7	Combination	8,629	4,624	0,000	8,499E-17	0,0000
23	1,08429	COMB7	Combination	8,629	2,575	0,000	8,499E-17	0,0000
23	1,18286	COMB7	Combination	8,629	4,897	0,000	8,499E-17	0,0000
23	1,18286	COMB7	Combination	8,629	2,855	0,000	8,499E-17	0,0000
23	1,28143	COMB7	Combination	8,629	5,178	0,000	8,499E-17	0,0000
23	1,28143	COMB7	Combination	8,629	3,144	0,000	8,499E-17	0,0000
23	1,38000	COMB7	Combination	8,629	5,467	0,000	8,499E-17	0,0000
23	1,38000	COMB7	Combination	8,629	3,443	0,000	8,499E-17	0,0000
23	1,47857	COMB7	Combination	8,629	5,765	0,000	8,499E-17	0,0000
23	1,47857	COMB7	Combination	8,629	3,751	0,000	8,499E-17	0,0000
23	1,57714	COMB7	Combination	8,629	6,074	0,000	8,499E-17	0,0000
23	1,57714	COMB7	Combination	8,629	4,070	0,000	8,499E-17	0,0000
23	1,67571	COMB7	Combination	8,629	6,393	0,000	8,499E-17	0,0000
23	1,67571	COMB7	Combination	8,629	4,401	0,000	8,499E-17	0,0000
23	1,77429	COMB7	Combination	8,629	6,724	0,000	8,499E-17	0,0000
23	1,77429	COMB7	Combination	8,629	4,745	0,000	8,499E-17	0,0000
23	1,87286	COMB7	Combination	8,629	7,068	0,000	8,499E-17	0,0000
23	1,87286	COMB7	Combination	8,629	5,102	0,000	8,499E-17	0,0000
23	1,97143	COMB7	Combination	8,629	7,424	0,000	8,499E-17	0,0000
23	1,97143	COMB7	Combination	8,629	5,473	0,000	8,499E-17	0,0000
23	2,07000	COMB7	Combination	8,629	7,795	0,000	8,499E-17	0,0000
23	2,07000	COMB7	Combination	8,629	5,858	0,000	8,499E-17	0,0000
23	2,16857	COMB7	Combination	8,629	8,181	0,000	8,499E-17	0,0000
23	2,16857	COMB7	Combination	8,629	6,259	0,000	8,499E-17	0,0000
23	2,26714	COMB7	Combination	8,629	8,582	0,000	8,499E-17	0,0000
23	2,26714	COMB7	Combination	8,629	6,676	0,000	8,499E-17	0,0000
23	2,36571	COMB7	Combination	8,629	8,999	0,000	8,499E-17	0,0000
23	2,36571	COMB7	Combination	8,629	7,110	0,000	8,499E-17	0,0000
23	2,46429	COMB7	Combination	8,629	9,433	0,000	8,499E-17	0,0000
23	2,46429	COMB7	Combination	8,629	7,561	0,000	8,499E-17	0,0000
23	2,56286	COMB7	Combination	8,629	9,884	0,000	8,499E-17	0,0000
23	2,56286	COMB7	Combination	8,629	8,030	0,000	8,499E-17	0,0000
23	2,66143	COMB7	Combination	8,629	10,353	0,000	8,499E-17	0,0000
23	2,66143	COMB7	Combination	8,629	8,518	0,000	8,499E-17	0,0000
23	2,76000	COMB7	Combination	8,629	10,840	0,000	8,499E-17	0,0000
23	2,76000	COMB7	Combination	8,629	9,024	0,000	8,499E-17	0,0000

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

Codice documento

SS0558_F0.doc

Rev

F0

Data

20/06/2011

Frame Text	Station m	OutputCase Text	CaseType Text	P KN	V2 KN	V3 KN	T KN-m	M2 KN-m
23	2,85857	COMB7	Combination	8,629	11,346	0,000	8,499E-17	0,0000
23	2,85857	COMB7	Combination	8,629	9,549	0,000	8,499E-17	0,0000
23	2,95714	COMB7	Combination	8,629	11,872	0,000	8,499E-17	0,0000
23	2,95714	COMB7	Combination	8,629	10,095	0,000	8,499E-17	0,0000
23	3,05571	COMB7	Combination	8,629	12,417	0,000	8,499E-17	0,0000
23	3,05571	COMB7	Combination	8,629	10,660	0,000	8,499E-17	0,0000
23	3,15429	COMB7	Combination	8,629	12,982	0,000	8,499E-17	0,0000
23	3,15429	COMB7	Combination	8,629	11,245	0,000	8,499E-17	0,0000
23	3,25286	COMB7	Combination	8,629	13,568	0,000	8,499E-17	0,0000
23	3,25286	COMB7	Combination	8,629	11,852	0,000	8,499E-17	0,0000
23	3,35143	COMB7	Combination	8,629	14,174	0,000	8,499E-17	0,0000
23	3,35143	COMB7	Combination	8,629	12,478	0,000	8,499E-17	0,0000
23	3,45000	COMB7	Combination	8,629	14,801	0,000	8,499E-17	0,0000
23	0,00000	COMB8	Combination	175,482	0,070	0,000	1,174E-16	0,0000
23	0,09857	COMB8	Combination	175,482	2,393	0,000	1,174E-16	0,0000
23	0,09857	COMB8	Combination	175,482	0,320	0,000	1,174E-16	0,0000
23	0,19714	COMB8	Combination	175,482	2,643	0,000	1,174E-16	0,0000
23	0,19714	COMB8	Combination	175,482	0,566	0,000	1,174E-16	0,0000
23	0,29571	COMB8	Combination	175,482	2,889	0,000	1,174E-16	0,0000
23	0,29571	COMB8	Combination	175,482	0,810	0,000	1,174E-16	0,0000
23	0,39429	COMB8	Combination	175,482	3,132	0,000	1,174E-16	0,0000
23	0,39429	COMB8	Combination	175,482	1,052	0,000	1,174E-16	0,0000
23	0,49286	COMB8	Combination	175,482	3,374	0,000	1,174E-16	0,0000
23	0,49286	COMB8	Combination	175,482	1,293	0,000	1,174E-16	0,0000
23	0,59143	COMB8	Combination	175,482	3,615	0,000	1,174E-16	0,0000
23	0,59143	COMB8	Combination	175,482	1,535	0,000	1,174E-16	0,0000
23	0,69000	COMB8	Combination	175,482	3,857	0,000	1,174E-16	0,0000
23	0,69000	COMB8	Combination	175,482	1,778	0,000	1,174E-16	0,0000
23	0,78857	COMB8	Combination	175,482	4,100	0,000	1,174E-16	0,0000
23	0,78857	COMB8	Combination	175,482	2,023	0,000	1,174E-16	0,0000
23	0,88714	COMB8	Combination	175,482	4,345	0,000	1,174E-16	0,0000
23	0,88714	COMB8	Combination	175,482	2,271	0,000	1,174E-16	0,0000
23	0,98571	COMB8	Combination	175,482	4,594	0,000	1,174E-16	0,0000
23	0,98571	COMB8	Combination	175,482	2,524	0,000	1,174E-16	0,0000
23	1,08429	COMB8	Combination	175,482	4,847	0,000	1,174E-16	0,0000
23	1,08429	COMB8	Combination	175,482	2,782	0,000	1,174E-16	0,0000
23	1,18286	COMB8	Combination	175,482	5,104	0,000	1,174E-16	0,0000
23	1,18286	COMB8	Combination	175,482	3,045	0,000	1,174E-16	0,0000
23	1,28143	COMB8	Combination	175,482	5,368	0,000	1,174E-16	0,0000
23	1,28143	COMB8	Combination	175,482	3,316	0,000	1,174E-16	0,0000
23	1,38000	COMB8	Combination	175,482	5,639	0,000	1,174E-16	0,0000
23	1,38000	COMB8	Combination	175,482	3,594	0,000	1,174E-16	0,0000
23	1,47857	COMB8	Combination	175,482	5,917	0,000	1,174E-16	0,0000
23	1,47857	COMB8	Combination	175,482	3,881	0,000	1,174E-16	0,0000
23	1,57714	COMB8	Combination	175,482	6,204	0,000	1,174E-16	0,0000
23	1,57714	COMB8	Combination	175,482	4,177	0,000	1,174E-16	0,0000
23	1,67571	COMB8	Combination	175,482	6,500	0,000	1,174E-16	0,0000
23	1,67571	COMB8	Combination	175,482	4,483	0,000	1,174E-16	0,0000
23	1,77429	COMB8	Combination	175,482	6,806	0,000	1,174E-16	0,0000
23	1,77429	COMB8	Combination	175,482	4,800	0,000	1,174E-16	0,0000
23	1,87286	COMB8	Combination	175,482	7,123	0,000	1,174E-16	0,0000
23	1,87286	COMB8	Combination	175,482	5,129	0,000	1,174E-16	0,0000
23	1,97143	COMB8	Combination	175,482	7,452	0,000	1,174E-16	0,0000
23	1,97143	COMB8	Combination	175,482	5,470	0,000	1,174E-16	0,0000
23	2,07000	COMB8	Combination	175,482	7,793	0,000	1,174E-16	0,0000
23	2,07000	COMB8	Combination	175,482	5,825	0,000	1,174E-16	0,0000
23	2,16857	COMB8	Combination	175,482	8,147	0,000	1,174E-16	0,0000
23	2,16857	COMB8	Combination	175,482	6,193	0,000	1,174E-16	0,0000
23	2,26714	COMB8	Combination	175,482	8,515	0,000	1,174E-16	0,0000
23	2,26714	COMB8	Combination	175,482	6,575	0,000	1,174E-16	0,0000
23	2,36571	COMB8	Combination	175,482	8,898	0,000	1,174E-16	0,0000
23	2,36571	COMB8	Combination	175,482	6,973	0,000	1,174E-16	0,0000
23	2,46429	COMB8	Combination	175,482	9,295	0,000	1,174E-16	0,0000

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

Codice documento

SS0558_F0.doc

Rev

F0

Data

20/06/2011

Frame Text	Station m	OutputCase Text	CaseType Text	P KN	V2 KN	V3 KN	T KN-m	M2 KN-m
23	2,46429	COMB8	Combination	175,482	7,386	0,000	1,174E-16	0,0000
23	2,56286	COMB8	Combination	175,482	9,708	0,000	1,174E-16	0,0000
23	2,56286	COMB8	Combination	175,482	7,815	0,000	1,174E-16	0,0000
23	2,66143	COMB8	Combination	175,482	10,137	0,000	1,174E-16	0,0000
23	2,66143	COMB8	Combination	175,482	8,260	0,000	1,174E-16	0,0000
23	2,76000	COMB8	Combination	175,482	10,583	0,000	1,174E-16	0,0000
23	2,76000	COMB8	Combination	175,482	8,723	0,000	1,174E-16	0,0000
23	2,85857	COMB8	Combination	175,482	11,046	0,000	1,174E-16	0,0000
23	2,85857	COMB8	Combination	175,482	9,203	0,000	1,174E-16	0,0000
23	2,95714	COMB8	Combination	175,482	11,526	0,000	1,174E-16	0,0000
23	2,95714	COMB8	Combination	175,482	9,701	0,000	1,174E-16	0,0000
23	3,05571	COMB8	Combination	175,482	12,024	0,000	1,174E-16	0,0000
23	3,05571	COMB8	Combination	175,482	10,217	0,000	1,174E-16	0,0000
23	3,15429	COMB8	Combination	175,482	12,540	0,000	1,174E-16	0,0000
23	3,15429	COMB8	Combination	175,482	10,752	0,000	1,174E-16	0,0000
23	3,25286	COMB8	Combination	175,482	13,074	0,000	1,174E-16	0,0000
23	3,25286	COMB8	Combination	175,482	11,305	0,000	1,174E-16	0,0000
23	3,35143	COMB8	Combination	175,482	13,628	0,000	1,174E-16	0,0000
23	3,35143	COMB8	Combination	175,482	11,877	0,000	1,174E-16	0,0000
23	3,45000	COMB8	Combination	175,482	14,200	0,000	1,174E-16	0,0000
23	0,00000	COMB9	Combination	-108,430	-0,230	0,000	8,499E-17	0,0000
23	0,09857	COMB9	Combination	-108,430	2,093	0,000	8,499E-17	0,0000
23	0,09857	COMB9	Combination	-108,430	0,021	0,000	8,499E-17	0,0000
23	0,19714	COMB9	Combination	-108,430	2,344	0,000	8,499E-17	0,0000
23	0,19714	COMB9	Combination	-108,430	0,270	0,000	8,499E-17	0,0000
23	0,29571	COMB9	Combination	-108,430	2,593	0,000	8,499E-17	0,0000
23	0,29571	COMB9	Combination	-108,430	0,518	0,000	8,499E-17	0,0000
23	0,39429	COMB9	Combination	-108,430	2,841	0,000	8,499E-17	0,0000
23	0,39429	COMB9	Combination	-108,430	0,765	0,000	8,499E-17	0,0000
23	0,49286	COMB9	Combination	-108,430	3,088	0,000	8,499E-17	0,0000
23	0,49286	COMB9	Combination	-108,430	1,014	0,000	8,499E-17	0,0000
23	0,59143	COMB9	Combination	-108,430	3,336	0,000	8,499E-17	0,0000
23	0,59143	COMB9	Combination	-108,430	1,264	0,000	8,499E-17	0,0000
23	0,69000	COMB9	Combination	-108,430	3,586	0,000	8,499E-17	0,0000
23	0,69000	COMB9	Combination	-108,430	1,517	0,000	8,499E-17	0,0000
23	0,78857	COMB9	Combination	-108,430	3,839	0,000	8,499E-17	0,0000
23	0,78857	COMB9	Combination	-108,430	1,773	0,000	8,499E-17	0,0000
23	0,88714	COMB9	Combination	-108,430	4,096	0,000	8,499E-17	0,0000
23	0,88714	COMB9	Combination	-108,430	2,034	0,000	8,499E-17	0,0000
23	0,98571	COMB9	Combination	-108,430	4,357	0,000	8,499E-17	0,0000
23	0,98571	COMB9	Combination	-108,430	2,301	0,000	8,499E-17	0,0000
23	1,08429	COMB9	Combination	-108,430	4,624	0,000	8,499E-17	0,0000
23	1,08429	COMB9	Combination	-108,430	2,575	0,000	8,499E-17	0,0000
23	1,18286	COMB9	Combination	-108,430	4,897	0,000	8,499E-17	0,0000
23	1,18286	COMB9	Combination	-108,430	2,855	0,000	8,499E-17	0,0000
23	1,28143	COMB9	Combination	-108,430	5,178	0,000	8,499E-17	0,0000
23	1,28143	COMB9	Combination	-108,430	3,144	0,000	8,499E-17	0,0000
23	1,38000	COMB9	Combination	-108,430	5,467	0,000	8,499E-17	0,0000
23	1,38000	COMB9	Combination	-108,430	3,443	0,000	8,499E-17	0,0000
23	1,47857	COMB9	Combination	-108,430	5,765	0,000	8,499E-17	0,0000
23	1,47857	COMB9	Combination	-108,430	3,751	0,000	8,499E-17	0,0000
23	1,57714	COMB9	Combination	-108,430	6,074	0,000	8,499E-17	0,0000
23	1,57714	COMB9	Combination	-108,430	4,070	0,000	8,499E-17	0,0000
23	1,67571	COMB9	Combination	-108,430	6,393	0,000	8,499E-17	0,0000
23	1,67571	COMB9	Combination	-108,430	4,401	0,000	8,499E-17	0,0000
23	1,77429	COMB9	Combination	-108,430	6,724	0,000	8,499E-17	0,0000
23	1,77429	COMB9	Combination	-108,430	4,745	0,000	8,499E-17	0,0000
23	1,87286	COMB9	Combination	-108,430	7,068	0,000	8,499E-17	0,0000
23	1,87286	COMB9	Combination	-108,430	5,102	0,000	8,499E-17	0,0000
23	1,97143	COMB9	Combination	-108,430	7,424	0,000	8,499E-17	0,0000
23	1,97143	COMB9	Combination	-108,430	5,473	0,000	8,499E-17	0,0000
23	2,07000	COMB9	Combination	-108,430	7,795	0,000	8,499E-17	0,0000
23	2,07000	COMB9	Combination	-108,430	5,858	0,000	8,499E-17	0,0000

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

Codice documento

SS0558_F0.doc

Rev

F0

Data

20/06/2011

Frame Text	Station m	OutputCase Text	CaseType Text	P KN	V2 KN	V3 KN	T KN-m	M2 KN-m
23	2,16857	COMB9	Combination	-108,430	8,181	0,000	8,499E-17	0,0000
23	2,16857	COMB9	Combination	-108,430	6,259	0,000	8,499E-17	0,0000
23	2,26714	COMB9	Combination	-108,430	8,582	0,000	8,499E-17	0,0000
23	2,26714	COMB9	Combination	-108,430	6,676	0,000	8,499E-17	0,0000
23	2,36571	COMB9	Combination	-108,430	8,999	0,000	8,499E-17	0,0000
23	2,36571	COMB9	Combination	-108,430	7,110	0,000	8,499E-17	0,0000
23	2,46429	COMB9	Combination	-108,430	9,433	0,000	8,499E-17	0,0000
23	2,46429	COMB9	Combination	-108,430	7,561	0,000	8,499E-17	0,0000
23	2,56286	COMB9	Combination	-108,430	9,884	0,000	8,499E-17	0,0000
23	2,56286	COMB9	Combination	-108,430	8,030	0,000	8,499E-17	0,0000
23	2,66143	COMB9	Combination	-108,430	10,353	0,000	8,499E-17	0,0000
23	2,66143	COMB9	Combination	-108,430	8,518	0,000	8,499E-17	0,0000
23	2,76000	COMB9	Combination	-108,430	10,840	0,000	8,499E-17	0,0000
23	2,76000	COMB9	Combination	-108,430	9,024	0,000	8,499E-17	0,0000
23	2,85857	COMB9	Combination	-108,430	11,346	0,000	8,499E-17	0,0000
23	2,85857	COMB9	Combination	-108,430	9,549	0,000	8,499E-17	0,0000
23	2,95714	COMB9	Combination	-108,430	11,872	0,000	8,499E-17	0,0000
23	2,95714	COMB9	Combination	-108,430	10,095	0,000	8,499E-17	0,0000
23	3,05571	COMB9	Combination	-108,430	12,417	0,000	8,499E-17	0,0000
23	3,05571	COMB9	Combination	-108,430	10,660	0,000	8,499E-17	0,0000
23	3,15429	COMB9	Combination	-108,430	12,982	0,000	8,499E-17	0,0000
23	3,15429	COMB9	Combination	-108,430	11,245	0,000	8,499E-17	0,0000
23	3,25286	COMB9	Combination	-108,430	13,568	0,000	8,499E-17	0,0000
23	3,25286	COMB9	Combination	-108,430	11,852	0,000	8,499E-17	0,0000
23	3,35143	COMB9	Combination	-108,430	14,174	0,000	8,499E-17	0,0000
23	3,35143	COMB9	Combination	-108,430	12,478	0,000	8,499E-17	0,0000
23	3,45000	COMB9	Combination	-108,430	14,801	0,000	8,499E-17	0,0000
23	0,00000	COMB10	Combination	144,403	0,225	0,000	1,341E-16	0,0000
23	0,09857	COMB10	Combination	144,403	2,548	0,000	1,341E-16	0,0000
23	0,09857	COMB10	Combination	144,403	0,474	0,000	1,341E-16	0,0000
23	0,19714	COMB10	Combination	144,403	2,797	0,000	1,341E-16	0,0000
23	0,19714	COMB10	Combination	144,403	0,719	0,000	1,341E-16	0,0000
23	0,29571	COMB10	Combination	144,403	3,041	0,000	1,341E-16	0,0000
23	0,29571	COMB10	Combination	144,403	0,960	0,000	1,341E-16	0,0000
23	0,39429	COMB10	Combination	144,403	3,283	0,000	1,341E-16	0,0000
23	0,39429	COMB10	Combination	144,403	1,199	0,000	1,341E-16	0,0000
23	0,49286	COMB10	Combination	144,403	3,522	0,000	1,341E-16	0,0000
23	0,49286	COMB10	Combination	144,403	1,437	0,000	1,341E-16	0,0000
23	0,59143	COMB10	Combination	144,403	3,759	0,000	1,341E-16	0,0000
23	0,59143	COMB10	Combination	144,403	1,674	0,000	1,341E-16	0,0000
23	0,69000	COMB10	Combination	144,403	3,997	0,000	1,341E-16	0,0000
23	0,69000	COMB10	Combination	144,403	1,912	0,000	1,341E-16	0,0000
23	0,78857	COMB10	Combination	144,403	4,235	0,000	1,341E-16	0,0000
23	0,78857	COMB10	Combination	144,403	2,151	0,000	1,341E-16	0,0000
23	0,88714	COMB10	Combination	144,403	4,474	0,000	1,341E-16	0,0000
23	0,88714	COMB10	Combination	144,403	2,393	0,000	1,341E-16	0,0000
23	0,98571	COMB10	Combination	144,403	4,716	0,000	1,341E-16	0,0000
23	0,98571	COMB10	Combination	144,403	2,639	0,000	1,341E-16	0,0000
23	1,08429	COMB10	Combination	144,403	4,962	0,000	1,341E-16	0,0000
23	1,08429	COMB10	Combination	144,403	2,889	0,000	1,341E-16	0,0000
23	1,18286	COMB10	Combination	144,403	5,211	0,000	1,341E-16	0,0000
23	1,18286	COMB10	Combination	144,403	3,143	0,000	1,341E-16	0,0000
23	1,28143	COMB10	Combination	144,403	5,466	0,000	1,341E-16	0,0000
23	1,28143	COMB10	Combination	144,403	3,404	0,000	1,341E-16	0,0000
23	1,38000	COMB10	Combination	144,403	5,727	0,000	1,341E-16	0,0000
23	1,38000	COMB10	Combination	144,403	3,672	0,000	1,341E-16	0,0000
23	1,47857	COMB10	Combination	144,403	5,995	0,000	1,341E-16	0,0000
23	1,47857	COMB10	Combination	144,403	3,948	0,000	1,341E-16	0,0000
23	1,57714	COMB10	Combination	144,403	6,271	0,000	1,341E-16	0,0000
23	1,57714	COMB10	Combination	144,403	4,232	0,000	1,341E-16	0,0000
23	1,67571	COMB10	Combination	144,403	6,555	0,000	1,341E-16	0,0000
23	1,67571	COMB10	Combination	144,403	4,525	0,000	1,341E-16	0,0000
23	1,77429	COMB10	Combination	144,403	6,848	0,000	1,341E-16	0,0000

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

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Rev
F0

Data
20/06/2011

Frame Text	Station m	OutputCase Text	CaseType Text	P KN	V2 KN	V3 KN	T KN-m	M2 KN-m
23	1,77429	COMB10	Combination	144,403	4,829	0,000	1,341E-16	0,0000
23	1,87286	COMB10	Combination	144,403	7,152	0,000	1,341E-16	0,0000
23	1,87286	COMB10	Combination	144,403	5,143	0,000	1,341E-16	0,0000
23	1,97143	COMB10	Combination	144,403	7,466	0,000	1,341E-16	0,0000
23	1,97143	COMB10	Combination	144,403	5,469	0,000	1,341E-16	0,0000
23	2,07000	COMB10	Combination	144,403	7,792	0,000	1,341E-16	0,0000
23	2,07000	COMB10	Combination	144,403	5,808	0,000	1,341E-16	0,0000
23	2,16857	COMB10	Combination	144,403	8,130	0,000	1,341E-16	0,0000
23	2,16857	COMB10	Combination	144,403	6,159	0,000	1,341E-16	0,0000
23	2,26714	COMB10	Combination	144,403	8,481	0,000	1,341E-16	0,0000
23	2,26714	COMB10	Combination	144,403	6,523	0,000	1,341E-16	0,0000
23	2,36571	COMB10	Combination	144,403	8,846	0,000	1,341E-16	0,0000
23	2,36571	COMB10	Combination	144,403	6,902	0,000	1,341E-16	0,0000
23	2,46429	COMB10	Combination	144,403	9,224	0,000	1,341E-16	0,0000
23	2,46429	COMB10	Combination	144,403	7,295	0,000	1,341E-16	0,0000
23	2,56286	COMB10	Combination	144,403	9,618	0,000	1,341E-16	0,0000
23	2,56286	COMB10	Combination	144,403	7,703	0,000	1,341E-16	0,0000
23	2,66143	COMB10	Combination	144,403	10,026	0,000	1,341E-16	0,0000
23	2,66143	COMB10	Combination	144,403	8,128	0,000	1,341E-16	0,0000
23	2,76000	COMB10	Combination	144,403	10,450	0,000	1,341E-16	0,0000
23	2,76000	COMB10	Combination	144,403	8,568	0,000	1,341E-16	0,0000
23	2,85857	COMB10	Combination	144,403	10,890	0,000	1,341E-16	0,0000
23	2,85857	COMB10	Combination	144,403	9,025	0,000	1,341E-16	0,0000
23	2,95714	COMB10	Combination	144,403	11,347	0,000	1,341E-16	0,0000
23	2,95714	COMB10	Combination	144,403	9,498	0,000	1,341E-16	0,0000
23	3,05571	COMB10	Combination	144,403	11,821	0,000	1,341E-16	0,0000
23	3,05571	COMB10	Combination	144,403	9,989	0,000	1,341E-16	0,0000
23	3,15429	COMB10	Combination	144,403	12,312	0,000	1,341E-16	0,0000
23	3,15429	COMB10	Combination	144,403	10,497	0,000	1,341E-16	0,0000
23	3,25286	COMB10	Combination	144,403	12,820	0,000	1,341E-16	0,0000
23	3,25286	COMB10	Combination	144,403	11,023	0,000	1,341E-16	0,0000
23	3,35143	COMB10	Combination	144,403	13,346	0,000	1,341E-16	0,0000
23	3,35143	COMB10	Combination	144,403	11,567	0,000	1,341E-16	0,0000
23	3,45000	COMB10	Combination	144,403	13,890	0,000	1,341E-16	0,0000
23	0,00000	COMB11	Combination	235,796	-0,230	0,000	8,499E-17	0,0000
23	0,09857	COMB11	Combination	235,796	2,093	0,000	8,499E-17	0,0000
23	0,09857	COMB11	Combination	235,796	0,021	0,000	8,499E-17	0,0000
23	0,19714	COMB11	Combination	235,796	2,344	0,000	8,499E-17	0,0000
23	0,19714	COMB11	Combination	235,796	0,270	0,000	8,499E-17	0,0000
23	0,29571	COMB11	Combination	235,796	2,593	0,000	8,499E-17	0,0000
23	0,29571	COMB11	Combination	235,796	0,518	0,000	8,499E-17	0,0000
23	0,39429	COMB11	Combination	235,796	2,841	0,000	8,499E-17	0,0000
23	0,39429	COMB11	Combination	235,796	0,765	0,000	8,499E-17	0,0000
23	0,49286	COMB11	Combination	235,796	3,088	0,000	8,499E-17	0,0000
23	0,49286	COMB11	Combination	235,796	1,014	0,000	8,499E-17	0,0000
23	0,59143	COMB11	Combination	235,796	3,336	0,000	8,499E-17	0,0000
23	0,59143	COMB11	Combination	235,796	1,264	0,000	8,499E-17	0,0000
23	0,69000	COMB11	Combination	235,796	3,586	0,000	8,499E-17	0,0000
23	0,69000	COMB11	Combination	235,796	1,517	0,000	8,499E-17	0,0000
23	0,78857	COMB11	Combination	235,796	3,839	0,000	8,499E-17	0,0000
23	0,78857	COMB11	Combination	235,796	1,773	0,000	8,499E-17	0,0000
23	0,88714	COMB11	Combination	235,796	4,096	0,000	8,499E-17	0,0000
23	0,88714	COMB11	Combination	235,796	2,034	0,000	8,499E-17	0,0000
23	0,98571	COMB11	Combination	235,796	4,357	0,000	8,499E-17	0,0000
23	0,98571	COMB11	Combination	235,796	2,301	0,000	8,499E-17	0,0000
23	1,08429	COMB11	Combination	235,796	4,624	0,000	8,499E-17	0,0000
23	1,08429	COMB11	Combination	235,796	2,575	0,000	8,499E-17	0,0000
23	1,18286	COMB11	Combination	235,796	4,897	0,000	8,499E-17	0,0000
23	1,18286	COMB11	Combination	235,796	2,855	0,000	8,499E-17	0,0000
23	1,28143	COMB11	Combination	235,796	5,178	0,000	8,499E-17	0,0000
23	1,28143	COMB11	Combination	235,796	3,144	0,000	8,499E-17	0,0000
23	1,38000	COMB11	Combination	235,796	5,467	0,000	8,499E-17	0,0000
23	1,38000	COMB11	Combination	235,796	3,443	0,000	8,499E-17	0,0000

Frame Text	Station m	OutputCase Text	CaseType Text	P KN	V2 KN	V3 KN	T KN-m	M2 KN-m
23	1,47857	COMB11	Combination	235,796	5,765	0,000	8,499E-17	0,0000
23	1,47857	COMB11	Combination	235,796	3,751	0,000	8,499E-17	0,0000
23	1,57714	COMB11	Combination	235,796	6,074	0,000	8,499E-17	0,0000
23	1,57714	COMB11	Combination	235,796	4,070	0,000	8,499E-17	0,0000
23	1,67571	COMB11	Combination	235,796	6,393	0,000	8,499E-17	0,0000
23	1,67571	COMB11	Combination	235,796	4,401	0,000	8,499E-17	0,0000
23	1,77429	COMB11	Combination	235,796	6,724	0,000	8,499E-17	0,0000
23	1,77429	COMB11	Combination	235,796	4,745	0,000	8,499E-17	0,0000
23	1,87286	COMB11	Combination	235,796	7,068	0,000	8,499E-17	0,0000
23	1,87286	COMB11	Combination	235,796	5,102	0,000	8,499E-17	0,0000
23	1,97143	COMB11	Combination	235,796	7,424	0,000	8,499E-17	0,0000
23	1,97143	COMB11	Combination	235,796	5,473	0,000	8,499E-17	0,0000
23	2,07000	COMB11	Combination	235,796	7,795	0,000	8,499E-17	0,0000
23	2,07000	COMB11	Combination	235,796	5,858	0,000	8,499E-17	0,0000
23	2,16857	COMB11	Combination	235,796	8,181	0,000	8,499E-17	0,0000
23	2,16857	COMB11	Combination	235,796	6,259	0,000	8,499E-17	0,0000
23	2,26714	COMB11	Combination	235,796	8,582	0,000	8,499E-17	0,0000
23	2,26714	COMB11	Combination	235,796	6,676	0,000	8,499E-17	0,0000
23	2,36571	COMB11	Combination	235,796	8,999	0,000	8,499E-17	0,0000
23	2,36571	COMB11	Combination	235,796	7,110	0,000	8,499E-17	0,0000
23	2,46429	COMB11	Combination	235,796	9,433	0,000	8,499E-17	0,0000
23	2,46429	COMB11	Combination	235,796	7,561	0,000	8,499E-17	0,0000
23	2,56286	COMB11	Combination	235,796	9,884	0,000	8,499E-17	0,0000
23	2,56286	COMB11	Combination	235,796	8,030	0,000	8,499E-17	0,0000
23	2,66143	COMB11	Combination	235,796	10,353	0,000	8,499E-17	0,0000
23	2,66143	COMB11	Combination	235,796	8,518	0,000	8,499E-17	0,0000
23	2,76000	COMB11	Combination	235,796	10,840	0,000	8,499E-17	0,0000
23	2,76000	COMB11	Combination	235,796	9,024	0,000	8,499E-17	0,0000
23	2,85857	COMB11	Combination	235,796	11,346	0,000	8,499E-17	0,0000
23	2,85857	COMB11	Combination	235,796	9,549	0,000	8,499E-17	0,0000
23	2,95714	COMB11	Combination	235,796	11,872	0,000	8,499E-17	0,0000
23	2,95714	COMB11	Combination	235,796	10,095	0,000	8,499E-17	0,0000
23	3,05571	COMB11	Combination	235,796	12,417	0,000	8,499E-17	0,0000
23	3,05571	COMB11	Combination	235,796	10,660	0,000	8,499E-17	0,0000
23	3,15429	COMB11	Combination	235,796	12,982	0,000	8,499E-17	0,0000
23	3,15429	COMB11	Combination	235,796	11,245	0,000	8,499E-17	0,0000
23	3,25286	COMB11	Combination	235,796	13,568	0,000	8,499E-17	0,0000
23	3,25286	COMB11	Combination	235,796	11,852	0,000	8,499E-17	0,0000
23	3,35143	COMB11	Combination	235,796	14,174	0,000	8,499E-17	0,0000
23	3,35143	COMB11	Combination	235,796	12,478	0,000	8,499E-17	0,0000
23	3,45000	COMB11	Combination	235,796	14,801	0,000	8,499E-17	0,0000
23	0,00000	COMB12	Combination	-8,302	-0,475	0,000	5,543E-17	0,0000
23	0,09857	COMB12	Combination	-8,302	1,848	0,000	5,543E-17	0,0000
23	0,09857	COMB12	Combination	-8,302	-0,153	0,000	5,543E-17	0,0000
23	0,19714	COMB12	Combination	-8,302	2,169	0,000	5,543E-17	0,0000
23	0,19714	COMB12	Combination	-8,302	0,168	0,000	5,543E-17	0,0000
23	0,29571	COMB12	Combination	-8,302	2,490	0,000	5,543E-17	0,0000
23	0,29571	COMB12	Combination	-8,302	0,490	0,000	5,543E-17	0,0000
23	0,39429	COMB12	Combination	-8,302	2,812	0,000	5,543E-17	0,0000
23	0,39429	COMB12	Combination	-8,302	0,814	0,000	5,543E-17	0,0000
23	0,49286	COMB12	Combination	-8,302	3,136	0,000	5,543E-17	0,0000
23	0,49286	COMB12	Combination	-8,302	1,141	0,000	5,543E-17	0,0000
23	0,59143	COMB12	Combination	-8,302	3,464	0,000	5,543E-17	0,0000
23	0,59143	COMB12	Combination	-8,302	1,473	0,000	5,543E-17	0,0000
23	0,69000	COMB12	Combination	-8,302	3,795	0,000	5,543E-17	0,0000
23	0,69000	COMB12	Combination	-8,302	1,811	0,000	5,543E-17	0,0000
23	0,78857	COMB12	Combination	-8,302	4,133	0,000	5,543E-17	0,0000
23	0,78857	COMB12	Combination	-8,302	2,155	0,000	5,543E-17	0,0000
23	0,88714	COMB12	Combination	-8,302	4,478	0,000	5,543E-17	0,0000
23	0,88714	COMB12	Combination	-8,302	2,509	0,000	5,543E-17	0,0000
23	0,98571	COMB12	Combination	-8,302	4,831	0,000	5,543E-17	0,0000
23	0,98571	COMB12	Combination	-8,302	2,871	0,000	5,543E-17	0,0000
23	1,08429	COMB12	Combination	-8,302	5,194	0,000	5,543E-17	0,0000

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

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SS0558_F0.doc

Rev

F0

Data

20/06/2011

Frame Text	Station m	OutputCase Text	CaseType Text	P KN	V2 KN	V3 KN	T KN-m	M2 KN-m
23	1,08429	COMB12	Combination	-8,302	3,245	0,000	5,543E-17	0,0000
23	1,18286	COMB12	Combination	-8,302	5,567	0,000	5,543E-17	0,0000
23	1,18286	COMB12	Combination	-8,302	3,630	0,000	5,543E-17	0,0000
23	1,28143	COMB12	Combination	-8,302	5,953	0,000	5,543E-17	0,0000
23	1,28143	COMB12	Combination	-8,302	4,029	0,000	5,543E-17	0,0000
23	1,38000	COMB12	Combination	-8,302	6,351	0,000	5,543E-17	0,0000
23	1,38000	COMB12	Combination	-8,302	4,441	0,000	5,543E-17	0,0000
23	1,47857	COMB12	Combination	-8,302	6,764	0,000	5,543E-17	0,0000
23	1,47857	COMB12	Combination	-8,302	4,869	0,000	5,543E-17	0,0000
23	1,57714	COMB12	Combination	-8,302	7,192	0,000	5,543E-17	0,0000
23	1,57714	COMB12	Combination	-8,302	5,314	0,000	5,543E-17	0,0000
23	1,67571	COMB12	Combination	-8,302	7,637	0,000	5,543E-17	0,0000
23	1,67571	COMB12	Combination	-8,302	5,776	0,000	5,543E-17	0,0000
23	1,77429	COMB12	Combination	-8,302	8,099	0,000	5,543E-17	0,0000
23	1,77429	COMB12	Combination	-8,302	6,257	0,000	5,543E-17	0,0000
23	1,87286	COMB12	Combination	-8,302	8,579	0,000	5,543E-17	0,0000
23	1,87286	COMB12	Combination	-8,302	6,757	0,000	5,543E-17	0,0000
23	1,97143	COMB12	Combination	-8,302	9,079	0,000	5,543E-17	0,0000
23	1,97143	COMB12	Combination	-8,302	7,277	0,000	5,543E-17	0,0000
23	2,07000	COMB12	Combination	-8,302	9,600	0,000	5,543E-17	0,0000
23	2,07000	COMB12	Combination	-8,302	7,820	0,000	5,543E-17	0,0000
23	2,16857	COMB12	Combination	-8,302	10,142	0,000	5,543E-17	0,0000
23	2,16857	COMB12	Combination	-8,302	8,384	0,000	5,543E-17	0,0000
23	2,26714	COMB12	Combination	-8,302	10,707	0,000	5,543E-17	0,0000
23	2,26714	COMB12	Combination	-8,302	8,972	0,000	5,543E-17	0,0000
23	2,36571	COMB12	Combination	-8,302	11,295	0,000	5,543E-17	0,0000
23	2,36571	COMB12	Combination	-8,302	9,584	0,000	5,543E-17	0,0000
23	2,46429	COMB12	Combination	-8,302	11,907	0,000	5,543E-17	0,0000
23	2,46429	COMB12	Combination	-8,302	10,221	0,000	5,543E-17	0,0000
23	2,56286	COMB12	Combination	-8,302	12,544	0,000	5,543E-17	0,0000
23	2,56286	COMB12	Combination	-8,302	10,884	0,000	5,543E-17	0,0000
23	2,66143	COMB12	Combination	-8,302	13,206	0,000	5,543E-17	0,0000
23	2,66143	COMB12	Combination	-8,302	11,573	0,000	5,543E-17	0,0000
23	2,76000	COMB12	Combination	-8,302	13,895	0,000	5,543E-17	0,0000
23	2,76000	COMB12	Combination	-8,302	12,289	0,000	5,543E-17	0,0000
23	2,85857	COMB12	Combination	-8,302	14,611	0,000	5,543E-17	0,0000
23	2,85857	COMB12	Combination	-8,302	13,032	0,000	5,543E-17	0,0000
23	2,95714	COMB12	Combination	-8,302	15,355	0,000	5,543E-17	0,0000
23	2,95714	COMB12	Combination	-8,302	13,804	0,000	5,543E-17	0,0000
23	3,05571	COMB12	Combination	-8,302	16,127	0,000	5,543E-17	0,0000
23	3,05571	COMB12	Combination	-8,302	14,604	0,000	5,543E-17	0,0000
23	3,15429	COMB12	Combination	-8,302	16,927	0,000	5,543E-17	0,0000
23	3,15429	COMB12	Combination	-8,302	15,433	0,000	5,543E-17	0,0000
23	3,25286	COMB12	Combination	-8,302	17,756	0,000	5,543E-17	0,0000
23	3,25286	COMB12	Combination	-8,302	16,292	0,000	5,543E-17	0,0000
23	3,35143	COMB12	Combination	-8,302	18,614	0,000	5,543E-17	0,0000
23	3,35143	COMB12	Combination	-8,302	17,180	0,000	5,543E-17	0,0000
23	3,45000	COMB12	Combination	-8,302	19,502	0,000	5,543E-17	0,0000
23	0,00000	COMB13	Combination	-112,607	-0,974	0,000	0,0000	0,0000
23	0,09857	COMB13	Combination	-112,607	1,349	0,000	0,0000	0,0000
23	0,09857	COMB13	Combination	-112,607	-0,599	0,000	0,0000	0,0000
23	0,19714	COMB13	Combination	-112,607	1,724	0,000	0,0000	0,0000
23	0,19714	COMB13	Combination	-112,607	-0,221	0,000	0,0000	0,0000
23	0,29571	COMB13	Combination	-112,607	2,102	0,000	0,0000	0,0000
23	0,29571	COMB13	Combination	-112,607	0,160	0,000	0,0000	0,0000
23	0,39429	COMB13	Combination	-112,607	2,483	0,000	0,0000	0,0000
23	0,39429	COMB13	Combination	-112,607	0,547	0,000	0,0000	0,0000
23	0,49286	COMB13	Combination	-112,607	2,869	0,000	0,0000	0,0000
23	0,49286	COMB13	Combination	-112,607	0,940	0,000	0,0000	0,0000
23	0,59143	COMB13	Combination	-112,607	3,263	0,000	0,0000	0,0000
23	0,59143	COMB13	Combination	-112,607	1,341	0,000	0,0000	0,0000
23	0,69000	COMB13	Combination	-112,607	3,664	0,000	0,0000	0,0000
23	0,69000	COMB13	Combination	-112,607	1,753	0,000	0,0000	0,0000

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

Codice documento

SS0558_F0.doc

Rev

F0

Data

20/06/2011

Frame Text	Station m	OutputCase Text	CaseType Text	P KN	V2 KN	V3 KN	T KN-m	M2 KN-m
23	0,78857	COMB13	Combination	-112,607	4,075	0,000	0,0000	0,0000
23	0,78857	COMB13	Combination	-112,607	2,175	0,000	0,0000	0,0000
23	0,88714	COMB13	Combination	-112,607	4,497	0,000	0,0000	0,0000
23	0,88714	COMB13	Combination	-112,607	2,610	0,000	0,0000	0,0000
23	0,98571	COMB13	Combination	-112,607	4,932	0,000	0,0000	0,0000
23	0,98571	COMB13	Combination	-112,607	3,058	0,000	0,0000	0,0000
23	1,08429	COMB13	Combination	-112,607	5,381	0,000	0,0000	0,0000
23	1,08429	COMB13	Combination	-112,607	3,523	0,000	0,0000	0,0000
23	1,18286	COMB13	Combination	-112,607	5,845	0,000	0,0000	0,0000
23	1,18286	COMB13	Combination	-112,607	4,004	0,000	0,0000	0,0000
23	1,28143	COMB13	Combination	-112,607	6,326	0,000	0,0000	0,0000
23	1,28143	COMB13	Combination	-112,607	4,503	0,000	0,0000	0,0000
23	1,38000	COMB13	Combination	-112,607	6,826	0,000	0,0000	0,0000
23	1,38000	COMB13	Combination	-112,607	5,022	0,000	0,0000	0,0000
23	1,47857	COMB13	Combination	-112,607	7,344	0,000	0,0000	0,0000
23	1,47857	COMB13	Combination	-112,607	5,561	0,000	0,0000	0,0000
23	1,57714	COMB13	Combination	-112,607	7,884	0,000	0,0000	0,0000
23	1,57714	COMB13	Combination	-112,607	6,123	0,000	0,0000	0,0000
23	1,67571	COMB13	Combination	-112,607	8,446	0,000	0,0000	0,0000
23	1,67571	COMB13	Combination	-112,607	6,709	0,000	0,0000	0,0000
23	1,77429	COMB13	Combination	-112,607	9,031	0,000	0,0000	0,0000
23	1,77429	COMB13	Combination	-112,607	7,319	0,000	0,0000	0,0000
23	1,87286	COMB13	Combination	-112,607	9,641	0,000	0,0000	0,0000
23	1,87286	COMB13	Combination	-112,607	7,955	0,000	0,0000	0,0000
23	1,97143	COMB13	Combination	-112,607	10,277	0,000	0,0000	0,0000
23	1,97143	COMB13	Combination	-112,607	8,618	0,000	0,0000	0,0000
23	2,07000	COMB13	Combination	-112,607	10,941	0,000	0,0000	0,0000
23	2,07000	COMB13	Combination	-112,607	9,309	0,000	0,0000	0,0000
23	2,16857	COMB13	Combination	-112,607	11,632	0,000	0,0000	0,0000
23	2,16857	COMB13	Combination	-112,607	10,030	0,000	0,0000	0,0000
23	2,26714	COMB13	Combination	-112,607	12,353	0,000	0,0000	0,0000
23	2,26714	COMB13	Combination	-112,607	10,782	0,000	0,0000	0,0000
23	2,36571	COMB13	Combination	-112,607	13,104	0,000	0,0000	0,0000
23	2,36571	COMB13	Combination	-112,607	11,564	0,000	0,0000	0,0000
23	2,46429	COMB13	Combination	-112,607	13,887	0,000	0,0000	0,0000
23	2,46429	COMB13	Combination	-112,607	12,379	0,000	0,0000	0,0000
23	2,56286	COMB13	Combination	-112,607	14,702	0,000	0,0000	0,0000
23	2,56286	COMB13	Combination	-112,607	13,228	0,000	0,0000	0,0000
23	2,66143	COMB13	Combination	-112,607	15,550	0,000	0,0000	0,0000
23	2,66143	COMB13	Combination	-112,607	14,110	0,000	0,0000	0,0000
23	2,76000	COMB13	Combination	-112,607	16,433	0,000	0,0000	0,0000
23	2,76000	COMB13	Combination	-112,607	15,028	0,000	0,0000	0,0000
23	2,85857	COMB13	Combination	-112,607	17,350	0,000	0,0000	0,0000
23	2,85857	COMB13	Combination	-112,607	15,981	0,000	0,0000	0,0000
23	2,95714	COMB13	Combination	-112,607	18,304	0,000	0,0000	0,0000
23	2,95714	COMB13	Combination	-112,607	16,970	0,000	0,0000	0,0000
23	3,05571	COMB13	Combination	-112,607	19,293	0,000	0,0000	0,0000
23	3,05571	COMB13	Combination	-112,607	17,997	0,000	0,0000	0,0000
23	3,15429	COMB13	Combination	-112,607	20,319	0,000	0,0000	0,0000
23	3,15429	COMB13	Combination	-112,607	19,060	0,000	0,0000	0,0000
23	3,25286	COMB13	Combination	-112,607	21,383	0,000	0,0000	0,0000
23	3,25286	COMB13	Combination	-112,607	20,162	0,000	0,0000	0,0000
23	3,35143	COMB13	Combination	-112,607	22,485	0,000	0,0000	0,0000
23	3,35143	COMB13	Combination	-112,607	21,301	0,000	0,0000	0,0000
23	3,45000	COMB13	Combination	-112,607	23,624	0,000	0,0000	0,0000
23	0,00000	COMB14	Combination	120,046	-0,244	0,000	8,036E-17	0,0000
23	0,09857	COMB14	Combination	120,046	2,078	0,000	8,036E-17	0,0000
23	0,09857	COMB14	Combination	120,046	0,076	0,000	8,036E-17	0,0000
23	0,19714	COMB14	Combination	120,046	2,399	0,000	8,036E-17	0,0000
23	0,19714	COMB14	Combination	120,046	0,395	0,000	8,036E-17	0,0000
23	0,29571	COMB14	Combination	120,046	2,718	0,000	8,036E-17	0,0000
23	0,29571	COMB14	Combination	120,046	0,714	0,000	8,036E-17	0,0000
23	0,39429	COMB14	Combination	120,046	3,037	0,000	8,036E-17	0,0000

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

Codice documento

SS0558_F0.doc

Rev

F0

Data

20/06/2011

Frame Text	Station m	OutputCase Text	CaseType Text	P KN	V2 KN	V3 KN	T KN-m	M2 KN-m
23	0,39429	COMB14	Combination	120,046	1,034	0,000	8,036E-17	0,0000
23	0,49286	COMB14	Combination	120,046	3,356	0,000	8,036E-17	0,0000
23	0,49286	COMB14	Combination	120,046	1,356	0,000	8,036E-17	0,0000
23	0,59143	COMB14	Combination	120,046	3,678	0,000	8,036E-17	0,0000
23	0,59143	COMB14	Combination	120,046	1,681	0,000	8,036E-17	0,0000
23	0,69000	COMB14	Combination	120,046	4,004	0,000	8,036E-17	0,0000
23	0,69000	COMB14	Combination	120,046	2,011	0,000	8,036E-17	0,0000
23	0,78857	COMB14	Combination	120,046	4,334	0,000	8,036E-17	0,0000
23	0,78857	COMB14	Combination	120,046	2,347	0,000	8,036E-17	0,0000
23	0,88714	COMB14	Combination	120,046	4,670	0,000	8,036E-17	0,0000
23	0,88714	COMB14	Combination	120,046	2,691	0,000	8,036E-17	0,0000
23	0,98571	COMB14	Combination	120,046	5,014	0,000	8,036E-17	0,0000
23	0,98571	COMB14	Combination	120,046	3,043	0,000	8,036E-17	0,0000
23	1,08429	COMB14	Combination	120,046	5,365	0,000	8,036E-17	0,0000
23	1,08429	COMB14	Combination	120,046	3,404	0,000	8,036E-17	0,0000
23	1,18286	COMB14	Combination	120,046	5,727	0,000	8,036E-17	0,0000
23	1,18286	COMB14	Combination	120,046	3,776	0,000	8,036E-17	0,0000
23	1,28143	COMB14	Combination	120,046	6,099	0,000	8,036E-17	0,0000
23	1,28143	COMB14	Combination	120,046	4,161	0,000	8,036E-17	0,0000
23	1,38000	COMB14	Combination	120,046	6,483	0,000	8,036E-17	0,0000
23	1,38000	COMB14	Combination	120,046	4,558	0,000	8,036E-17	0,0000
23	1,47857	COMB14	Combination	120,046	6,881	0,000	8,036E-17	0,0000
23	1,47857	COMB14	Combination	120,046	4,969	0,000	8,036E-17	0,0000
23	1,57714	COMB14	Combination	120,046	7,292	0,000	8,036E-17	0,0000
23	1,57714	COMB14	Combination	120,046	5,396	0,000	8,036E-17	0,0000
23	1,67571	COMB14	Combination	120,046	7,719	0,000	8,036E-17	0,0000
23	1,67571	COMB14	Combination	120,046	5,839	0,000	8,036E-17	0,0000
23	1,77429	COMB14	Combination	120,046	8,162	0,000	8,036E-17	0,0000
23	1,77429	COMB14	Combination	120,046	6,299	0,000	8,036E-17	0,0000
23	1,87286	COMB14	Combination	120,046	8,622	0,000	8,036E-17	0,0000
23	1,87286	COMB14	Combination	120,046	6,778	0,000	8,036E-17	0,0000
23	1,97143	COMB14	Combination	120,046	9,101	0,000	8,036E-17	0,0000
23	1,97143	COMB14	Combination	120,046	7,276	0,000	8,036E-17	0,0000
23	2,07000	COMB14	Combination	120,046	9,598	0,000	8,036E-17	0,0000
23	2,07000	COMB14	Combination	120,046	7,794	0,000	8,036E-17	0,0000
23	2,16857	COMB14	Combination	120,046	10,117	0,000	8,036E-17	0,0000
23	2,16857	COMB14	Combination	120,046	8,333	0,000	8,036E-17	0,0000
23	2,26714	COMB14	Combination	120,046	10,656	0,000	8,036E-17	0,0000
23	2,26714	COMB14	Combination	120,046	8,894	0,000	8,036E-17	0,0000
23	2,36571	COMB14	Combination	120,046	11,217	0,000	8,036E-17	0,0000
23	2,36571	COMB14	Combination	120,046	9,479	0,000	8,036E-17	0,0000
23	2,46429	COMB14	Combination	120,046	11,801	0,000	8,036E-17	0,0000
23	2,46429	COMB14	Combination	120,046	10,086	0,000	8,036E-17	0,0000
23	2,56286	COMB14	Combination	120,046	12,409	0,000	8,036E-17	0,0000
23	2,56286	COMB14	Combination	120,046	10,718	0,000	8,036E-17	0,0000
23	2,66143	COMB14	Combination	120,046	13,041	0,000	8,036E-17	0,0000
23	2,66143	COMB14	Combination	120,046	11,375	0,000	8,036E-17	0,0000
23	2,76000	COMB14	Combination	120,046	13,697	0,000	8,036E-17	0,0000
23	2,76000	COMB14	Combination	120,046	12,057	0,000	8,036E-17	0,0000
23	2,85857	COMB14	Combination	120,046	14,380	0,000	8,036E-17	0,0000
23	2,85857	COMB14	Combination	120,046	12,766	0,000	8,036E-17	0,0000
23	2,95714	COMB14	Combination	120,046	15,089	0,000	8,036E-17	0,0000
23	2,95714	COMB14	Combination	120,046	13,501	0,000	8,036E-17	0,0000
23	3,05571	COMB14	Combination	120,046	15,824	0,000	8,036E-17	0,0000
23	3,05571	COMB14	Combination	120,046	14,264	0,000	8,036E-17	0,0000
23	3,15429	COMB14	Combination	120,046	16,586	0,000	8,036E-17	0,0000
23	3,15429	COMB14	Combination	120,046	15,054	0,000	8,036E-17	0,0000
23	3,25286	COMB14	Combination	120,046	17,376	0,000	8,036E-17	0,0000
23	3,25286	COMB14	Combination	120,046	15,871	0,000	8,036E-17	0,0000
23	3,35143	COMB14	Combination	120,046	18,194	0,000	8,036E-17	0,0000
23	3,35143	COMB14	Combination	120,046	16,717	0,000	8,036E-17	0,0000
23	3,45000	COMB14	Combination	120,046	19,040	0,000	8,036E-17	0,0000
23	0,00000	COMB15	Combination	15,741	-0,743	0,000	2,493E-17	0,0000

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

Codice documento

SS0558_F0.doc

Rev

F0

Data

20/06/2011

Frame Text	Station m	OutputCase Text	CaseType Text	P KN	V2 KN	V3 KN	T KN-m	M2 KN-m
23	0,09857	COMB15	Combination	15,741	1,579	0,000	2,493E-17	0,0000
23	0,09857	COMB15	Combination	15,741	-0,369	0,000	2,493E-17	0,0000
23	0,19714	COMB15	Combination	15,741	1,954	0,000	2,493E-17	0,0000
23	0,19714	COMB15	Combination	15,741	6,403E-03	0,000	2,493E-17	0,0000
23	0,29571	COMB15	Combination	15,741	2,329	0,000	2,493E-17	0,0000
23	0,29571	COMB15	Combination	15,741	0,385	0,000	2,493E-17	0,0000
23	0,39429	COMB15	Combination	15,741	2,707	0,000	2,493E-17	0,0000
23	0,39429	COMB15	Combination	15,741	0,767	0,000	2,493E-17	0,0000
23	0,49286	COMB15	Combination	15,741	3,089	0,000	2,493E-17	0,0000
23	0,49286	COMB15	Combination	15,741	1,155	0,000	2,493E-17	0,0000
23	0,59143	COMB15	Combination	15,741	3,477	0,000	2,493E-17	0,0000
23	0,59143	COMB15	Combination	15,741	1,550	0,000	2,493E-17	0,0000
23	0,69000	COMB15	Combination	15,741	3,872	0,000	2,493E-17	0,0000
23	0,69000	COMB15	Combination	15,741	1,953	0,000	2,493E-17	0,0000
23	0,78857	COMB15	Combination	15,741	4,276	0,000	2,493E-17	0,0000
23	0,78857	COMB15	Combination	15,741	2,367	0,000	2,493E-17	0,0000
23	0,88714	COMB15	Combination	15,741	4,689	0,000	2,493E-17	0,0000
23	0,88714	COMB15	Combination	15,741	2,792	0,000	2,493E-17	0,0000
23	0,98571	COMB15	Combination	15,741	5,115	0,000	2,493E-17	0,0000
23	0,98571	COMB15	Combination	15,741	3,230	0,000	2,493E-17	0,0000
23	1,08429	COMB15	Combination	15,741	5,552	0,000	2,493E-17	0,0000
23	1,08429	COMB15	Combination	15,741	3,682	0,000	2,493E-17	0,0000
23	1,18286	COMB15	Combination	15,741	6,005	0,000	2,493E-17	0,0000
23	1,18286	COMB15	Combination	15,741	4,150	0,000	2,493E-17	0,0000
23	1,28143	COMB15	Combination	15,741	6,473	0,000	2,493E-17	0,0000
23	1,28143	COMB15	Combination	15,741	4,635	0,000	2,493E-17	0,0000
23	1,38000	COMB15	Combination	15,741	6,958	0,000	2,493E-17	0,0000
23	1,38000	COMB15	Combination	15,741	5,138	0,000	2,493E-17	0,0000
23	1,47857	COMB15	Combination	15,741	7,461	0,000	2,493E-17	0,0000
23	1,47857	COMB15	Combination	15,741	5,661	0,000	2,493E-17	0,0000
23	1,57714	COMB15	Combination	15,741	7,984	0,000	2,493E-17	0,0000
23	1,57714	COMB15	Combination	15,741	6,205	0,000	2,493E-17	0,0000
23	1,67571	COMB15	Combination	15,741	8,528	0,000	2,493E-17	0,0000
23	1,67571	COMB15	Combination	15,741	6,772	0,000	2,493E-17	0,0000
23	1,77429	COMB15	Combination	15,741	9,094	0,000	2,493E-17	0,0000
23	1,77429	COMB15	Combination	15,741	7,361	0,000	2,493E-17	0,0000
23	1,87286	COMB15	Combination	15,741	9,684	0,000	2,493E-17	0,0000
23	1,87286	COMB15	Combination	15,741	7,976	0,000	2,493E-17	0,0000
23	1,97143	COMB15	Combination	15,741	10,299	0,000	2,493E-17	0,0000
23	1,97143	COMB15	Combination	15,741	8,616	0,000	2,493E-17	0,0000
23	2,07000	COMB15	Combination	15,741	10,939	0,000	2,493E-17	0,0000
23	2,07000	COMB15	Combination	15,741	9,284	0,000	2,493E-17	0,0000
23	2,16857	COMB15	Combination	15,741	11,606	0,000	2,493E-17	0,0000
23	2,16857	COMB15	Combination	15,741	9,979	0,000	2,493E-17	0,0000
23	2,26714	COMB15	Combination	15,741	12,302	0,000	2,493E-17	0,0000
23	2,26714	COMB15	Combination	15,741	10,704	0,000	2,493E-17	0,0000
23	2,36571	COMB15	Combination	15,741	13,026	0,000	2,493E-17	0,0000
23	2,36571	COMB15	Combination	15,741	11,458	0,000	2,493E-17	0,0000
23	2,46429	COMB15	Combination	15,741	13,781	0,000	2,493E-17	0,0000
23	2,46429	COMB15	Combination	15,741	12,244	0,000	2,493E-17	0,0000
23	2,56286	COMB15	Combination	15,741	14,567	0,000	2,493E-17	0,0000
23	2,56286	COMB15	Combination	15,741	13,062	0,000	2,493E-17	0,0000
23	2,66143	COMB15	Combination	15,741	15,385	0,000	2,493E-17	0,0000
23	2,66143	COMB15	Combination	15,741	13,912	0,000	2,493E-17	0,0000
23	2,76000	COMB15	Combination	15,741	16,235	0,000	2,493E-17	0,0000
23	2,76000	COMB15	Combination	15,741	14,796	0,000	2,493E-17	0,0000
23	2,85857	COMB15	Combination	15,741	17,119	0,000	2,493E-17	0,0000
23	2,85857	COMB15	Combination	15,741	15,715	0,000	2,493E-17	0,0000
23	2,95714	COMB15	Combination	15,741	18,037	0,000	2,493E-17	0,0000
23	2,95714	COMB15	Combination	15,741	16,668	0,000	2,493E-17	0,0000
23	3,05571	COMB15	Combination	15,741	18,990	0,000	2,493E-17	0,0000
23	3,05571	COMB15	Combination	15,741	17,656	0,000	2,493E-17	0,0000
23	3,15429	COMB15	Combination	15,741	19,979	0,000	2,493E-17	0,0000

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

Codice documento

SS0558_F0.doc

Rev

F0

Data

20/06/2011

Frame Text	Station m	OutputCase Text	CaseType Text	P KN	V2 KN	V3 KN	T KN-m	M2 KN-m
23	3,15429	COMB15	Combination	15,741	18,681	0,000	2,493E-17	0,0000
23	3,25286	COMB15	Combination	15,741	21,003	0,000	2,493E-17	0,0000
23	3,25286	COMB15	Combination	15,741	19,742	0,000	2,493E-17	0,0000
23	3,35143	COMB15	Combination	15,741	22,064	0,000	2,493E-17	0,0000
23	3,35143	COMB15	Combination	15,741	20,839	0,000	2,493E-17	0,0000
23	3,45000	COMB15	Combination	15,741	23,162	0,000	2,493E-17	0,0000
23	0,00000	COMB16	Combination	-98,348	-0,475	0,000	5,543E-17	0,0000
23	0,09857	COMB16	Combination	-98,348	1,848	0,000	5,543E-17	0,0000
23	0,09857	COMB16	Combination	-98,348	-0,153	0,000	5,543E-17	0,0000
23	0,19714	COMB16	Combination	-98,348	2,169	0,000	5,543E-17	0,0000
23	0,19714	COMB16	Combination	-98,348	0,168	0,000	5,543E-17	0,0000
23	0,29571	COMB16	Combination	-98,348	2,490	0,000	5,543E-17	0,0000
23	0,29571	COMB16	Combination	-98,348	0,490	0,000	5,543E-17	0,0000
23	0,39429	COMB16	Combination	-98,348	2,812	0,000	5,543E-17	0,0000
23	0,39429	COMB16	Combination	-98,348	0,814	0,000	5,543E-17	0,0000
23	0,49286	COMB16	Combination	-98,348	3,136	0,000	5,543E-17	0,0000
23	0,49286	COMB16	Combination	-98,348	1,141	0,000	5,543E-17	0,0000
23	0,59143	COMB16	Combination	-98,348	3,464	0,000	5,543E-17	0,0000
23	0,59143	COMB16	Combination	-98,348	1,473	0,000	5,543E-17	0,0000
23	0,69000	COMB16	Combination	-98,348	3,795	0,000	5,543E-17	0,0000
23	0,69000	COMB16	Combination	-98,348	1,811	0,000	5,543E-17	0,0000
23	0,78857	COMB16	Combination	-98,348	4,133	0,000	5,543E-17	0,0000
23	0,78857	COMB16	Combination	-98,348	2,155	0,000	5,543E-17	0,0000
23	0,88714	COMB16	Combination	-98,348	4,478	0,000	5,543E-17	0,0000
23	0,88714	COMB16	Combination	-98,348	2,509	0,000	5,543E-17	0,0000
23	0,98571	COMB16	Combination	-98,348	4,831	0,000	5,543E-17	0,0000
23	0,98571	COMB16	Combination	-98,348	2,871	0,000	5,543E-17	0,0000
23	1,08429	COMB16	Combination	-98,348	5,194	0,000	5,543E-17	0,0000
23	1,08429	COMB16	Combination	-98,348	3,245	0,000	5,543E-17	0,0000
23	1,18286	COMB16	Combination	-98,348	5,567	0,000	5,543E-17	0,0000
23	1,18286	COMB16	Combination	-98,348	3,630	0,000	5,543E-17	0,0000
23	1,28143	COMB16	Combination	-98,348	5,953	0,000	5,543E-17	0,0000
23	1,28143	COMB16	Combination	-98,348	4,029	0,000	5,543E-17	0,0000
23	1,38000	COMB16	Combination	-98,348	6,351	0,000	5,543E-17	0,0000
23	1,38000	COMB16	Combination	-98,348	4,441	0,000	5,543E-17	0,0000
23	1,47857	COMB16	Combination	-98,348	6,764	0,000	5,543E-17	0,0000
23	1,47857	COMB16	Combination	-98,348	4,869	0,000	5,543E-17	0,0000
23	1,57714	COMB16	Combination	-98,348	7,192	0,000	5,543E-17	0,0000
23	1,57714	COMB16	Combination	-98,348	5,314	0,000	5,543E-17	0,0000
23	1,67571	COMB16	Combination	-98,348	7,637	0,000	5,543E-17	0,0000
23	1,67571	COMB16	Combination	-98,348	5,776	0,000	5,543E-17	0,0000
23	1,77429	COMB16	Combination	-98,348	8,099	0,000	5,543E-17	0,0000
23	1,77429	COMB16	Combination	-98,348	6,257	0,000	5,543E-17	0,0000
23	1,87286	COMB16	Combination	-98,348	8,579	0,000	5,543E-17	0,0000
23	1,87286	COMB16	Combination	-98,348	6,757	0,000	5,543E-17	0,0000
23	1,97143	COMB16	Combination	-98,348	9,079	0,000	5,543E-17	0,0000
23	1,97143	COMB16	Combination	-98,348	7,277	0,000	5,543E-17	0,0000
23	2,07000	COMB16	Combination	-98,348	9,600	0,000	5,543E-17	0,0000
23	2,07000	COMB16	Combination	-98,348	7,820	0,000	5,543E-17	0,0000
23	2,16857	COMB16	Combination	-98,348	10,142	0,000	5,543E-17	0,0000
23	2,16857	COMB16	Combination	-98,348	8,384	0,000	5,543E-17	0,0000
23	2,26714	COMB16	Combination	-98,348	10,707	0,000	5,543E-17	0,0000
23	2,26714	COMB16	Combination	-98,348	8,972	0,000	5,543E-17	0,0000
23	2,36571	COMB16	Combination	-98,348	11,295	0,000	5,543E-17	0,0000
23	2,36571	COMB16	Combination	-98,348	9,584	0,000	5,543E-17	0,0000
23	2,46429	COMB16	Combination	-98,348	11,907	0,000	5,543E-17	0,0000
23	2,46429	COMB16	Combination	-98,348	10,221	0,000	5,543E-17	0,0000
23	2,56286	COMB16	Combination	-98,348	12,544	0,000	5,543E-17	0,0000
23	2,56286	COMB16	Combination	-98,348	10,884	0,000	5,543E-17	0,0000
23	2,66143	COMB16	Combination	-98,348	13,206	0,000	5,543E-17	0,0000
23	2,66143	COMB16	Combination	-98,348	11,573	0,000	5,543E-17	0,0000
23	2,76000	COMB16	Combination	-98,348	13,895	0,000	5,543E-17	0,0000
23	2,76000	COMB16	Combination	-98,348	12,289	0,000	5,543E-17	0,0000

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

Codice documento

SS0558_F0.doc

Rev

F0

Data

20/06/2011

Frame Text	Station m	OutputCase Text	CaseType Text	P KN	V2 KN	V3 KN	T KN-m	M2 KN-m
23	2,85857	COMB16	Combination	-98,348	14,611	0,000	5,543E-17	0,0000
23	2,85857	COMB16	Combination	-98,348	13,032	0,000	5,543E-17	0,0000
23	2,95714	COMB16	Combination	-98,348	15,355	0,000	5,543E-17	0,0000
23	2,95714	COMB16	Combination	-98,348	13,804	0,000	5,543E-17	0,0000
23	3,05571	COMB16	Combination	-98,348	16,127	0,000	5,543E-17	0,0000
23	3,05571	COMB16	Combination	-98,348	14,604	0,000	5,543E-17	0,0000
23	3,15429	COMB16	Combination	-98,348	16,927	0,000	5,543E-17	0,0000
23	3,15429	COMB16	Combination	-98,348	15,433	0,000	5,543E-17	0,0000
23	3,25286	COMB16	Combination	-98,348	17,756	0,000	5,543E-17	0,0000
23	3,25286	COMB16	Combination	-98,348	16,292	0,000	5,543E-17	0,0000
23	3,35143	COMB16	Combination	-98,348	18,614	0,000	5,543E-17	0,0000
23	3,35143	COMB16	Combination	-98,348	17,180	0,000	5,543E-17	0,0000
23	3,45000	COMB16	Combination	-98,348	19,502	0,000	5,543E-17	0,0000
23	0,00000	COMB17	Combination	-202,653	-0,974	0,000	0,0000	0,0000
23	0,09857	COMB17	Combination	-202,653	1,349	0,000	0,0000	0,0000
23	0,09857	COMB17	Combination	-202,653	-0,599	0,000	0,0000	0,0000
23	0,19714	COMB17	Combination	-202,653	1,724	0,000	0,0000	0,0000
23	0,19714	COMB17	Combination	-202,653	-0,221	0,000	0,0000	0,0000
23	0,29571	COMB17	Combination	-202,653	2,102	0,000	0,0000	0,0000
23	0,29571	COMB17	Combination	-202,653	0,160	0,000	0,0000	0,0000
23	0,39429	COMB17	Combination	-202,653	2,483	0,000	0,0000	0,0000
23	0,39429	COMB17	Combination	-202,653	0,547	0,000	0,0000	0,0000
23	0,49286	COMB17	Combination	-202,653	2,869	0,000	0,0000	0,0000
23	0,49286	COMB17	Combination	-202,653	0,940	0,000	0,0000	0,0000
23	0,59143	COMB17	Combination	-202,653	3,263	0,000	0,0000	0,0000
23	0,59143	COMB17	Combination	-202,653	1,341	0,000	0,0000	0,0000
23	0,69000	COMB17	Combination	-202,653	3,664	0,000	0,0000	0,0000
23	0,69000	COMB17	Combination	-202,653	1,753	0,000	0,0000	0,0000
23	0,78857	COMB17	Combination	-202,653	4,075	0,000	0,0000	0,0000
23	0,78857	COMB17	Combination	-202,653	2,175	0,000	0,0000	0,0000
23	0,88714	COMB17	Combination	-202,653	4,497	0,000	0,0000	0,0000
23	0,88714	COMB17	Combination	-202,653	2,610	0,000	0,0000	0,0000
23	0,98571	COMB17	Combination	-202,653	4,932	0,000	0,0000	0,0000
23	0,98571	COMB17	Combination	-202,653	3,058	0,000	0,0000	0,0000
23	1,08429	COMB17	Combination	-202,653	5,381	0,000	0,0000	0,0000
23	1,08429	COMB17	Combination	-202,653	3,523	0,000	0,0000	0,0000
23	1,18286	COMB17	Combination	-202,653	5,845	0,000	0,0000	0,0000
23	1,18286	COMB17	Combination	-202,653	4,004	0,000	0,0000	0,0000
23	1,28143	COMB17	Combination	-202,653	6,326	0,000	0,0000	0,0000
23	1,28143	COMB17	Combination	-202,653	4,503	0,000	0,0000	0,0000
23	1,38000	COMB17	Combination	-202,653	6,826	0,000	0,0000	0,0000
23	1,38000	COMB17	Combination	-202,653	5,022	0,000	0,0000	0,0000
23	1,47857	COMB17	Combination	-202,653	7,344	0,000	0,0000	0,0000
23	1,47857	COMB17	Combination	-202,653	5,561	0,000	0,0000	0,0000
23	1,57714	COMB17	Combination	-202,653	7,884	0,000	0,0000	0,0000
23	1,57714	COMB17	Combination	-202,653	6,123	0,000	0,0000	0,0000
23	1,67571	COMB17	Combination	-202,653	8,446	0,000	0,0000	0,0000
23	1,67571	COMB17	Combination	-202,653	6,709	0,000	0,0000	0,0000
23	1,77429	COMB17	Combination	-202,653	9,031	0,000	0,0000	0,0000
23	1,77429	COMB17	Combination	-202,653	7,319	0,000	0,0000	0,0000
23	1,87286	COMB17	Combination	-202,653	9,641	0,000	0,0000	0,0000
23	1,87286	COMB17	Combination	-202,653	7,955	0,000	0,0000	0,0000
23	1,97143	COMB17	Combination	-202,653	10,277	0,000	0,0000	0,0000
23	1,97143	COMB17	Combination	-202,653	8,618	0,000	0,0000	0,0000
23	2,07000	COMB17	Combination	-202,653	10,941	0,000	0,0000	0,0000
23	2,07000	COMB17	Combination	-202,653	9,309	0,000	0,0000	0,0000
23	2,16857	COMB17	Combination	-202,653	11,632	0,000	0,0000	0,0000
23	2,16857	COMB17	Combination	-202,653	10,030	0,000	0,0000	0,0000
23	2,26714	COMB17	Combination	-202,653	12,353	0,000	0,0000	0,0000
23	2,26714	COMB17	Combination	-202,653	10,782	0,000	0,0000	0,0000
23	2,36571	COMB17	Combination	-202,653	13,104	0,000	0,0000	0,0000
23	2,36571	COMB17	Combination	-202,653	11,564	0,000	0,0000	0,0000
23	2,46429	COMB17	Combination	-202,653	13,887	0,000	0,0000	0,0000

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

Codice documento
SS0558_F0.doc

Rev
F0

Data
20/06/2011

Frame Text	Station m	OutputCase Text	CaseType Text	P KN	V2 KN	V3 KN	T KN-m	M2 KN-m
23	2,46429	COMB17	Combination	-202,653	12,379	0,000	0,0000	0,0000
23	2,56286	COMB17	Combination	-202,653	14,702	0,000	0,0000	0,0000
23	2,56286	COMB17	Combination	-202,653	13,228	0,000	0,0000	0,0000
23	2,66143	COMB17	Combination	-202,653	15,550	0,000	0,0000	0,0000
23	2,66143	COMB17	Combination	-202,653	14,110	0,000	0,0000	0,0000
23	2,76000	COMB17	Combination	-202,653	16,433	0,000	0,0000	0,0000
23	2,76000	COMB17	Combination	-202,653	15,028	0,000	0,0000	0,0000
23	2,85857	COMB17	Combination	-202,653	17,350	0,000	0,0000	0,0000
23	2,85857	COMB17	Combination	-202,653	15,981	0,000	0,0000	0,0000
23	2,95714	COMB17	Combination	-202,653	18,304	0,000	0,0000	0,0000
23	2,95714	COMB17	Combination	-202,653	16,970	0,000	0,0000	0,0000
23	3,05571	COMB17	Combination	-202,653	19,293	0,000	0,0000	0,0000
23	3,05571	COMB17	Combination	-202,653	17,997	0,000	0,0000	0,0000
23	3,15429	COMB17	Combination	-202,653	20,319	0,000	0,0000	0,0000
23	3,15429	COMB17	Combination	-202,653	19,060	0,000	0,0000	0,0000
23	3,25286	COMB17	Combination	-202,653	21,383	0,000	0,0000	0,0000
23	3,25286	COMB17	Combination	-202,653	20,162	0,000	0,0000	0,0000
23	3,35143	COMB17	Combination	-202,653	22,485	0,000	0,0000	0,0000
23	3,35143	COMB17	Combination	-202,653	21,301	0,000	0,0000	0,0000
23	3,45000	COMB17	Combination	-202,653	23,624	0,000	0,0000	0,0000
23	0,00000	COMB18	Combination	96,139	-0,125	0,000	9,321E-17	0,0000
23	0,09857	COMB18	Combination	96,139	2,197	0,000	9,321E-17	0,0000
23	0,09857	COMB18	Combination	96,139	0,195	0,000	9,321E-17	0,0000
23	0,19714	COMB18	Combination	96,139	2,517	0,000	9,321E-17	0,0000
23	0,19714	COMB18	Combination	96,139	0,513	0,000	9,321E-17	0,0000
23	0,29571	COMB18	Combination	96,139	2,835	0,000	9,321E-17	0,0000
23	0,29571	COMB18	Combination	96,139	0,830	0,000	9,321E-17	0,0000
23	0,39429	COMB18	Combination	96,139	3,152	0,000	9,321E-17	0,0000
23	0,39429	COMB18	Combination	96,139	1,147	0,000	9,321E-17	0,0000
23	0,49286	COMB18	Combination	96,139	3,470	0,000	9,321E-17	0,0000
23	0,49286	COMB18	Combination	96,139	1,466	0,000	9,321E-17	0,0000
23	0,59143	COMB18	Combination	96,139	3,789	0,000	9,321E-17	0,0000
23	0,59143	COMB18	Combination	96,139	1,788	0,000	9,321E-17	0,0000
23	0,69000	COMB18	Combination	96,139	4,111	0,000	9,321E-17	0,0000
23	0,69000	COMB18	Combination	96,139	2,115	0,000	9,321E-17	0,0000
23	0,78857	COMB18	Combination	96,139	4,437	0,000	9,321E-17	0,0000
23	0,78857	COMB18	Combination	96,139	2,446	0,000	9,321E-17	0,0000
23	0,88714	COMB18	Combination	96,139	4,769	0,000	9,321E-17	0,0000
23	0,88714	COMB18	Combination	96,139	2,785	0,000	9,321E-17	0,0000
23	0,98571	COMB18	Combination	96,139	5,107	0,000	9,321E-17	0,0000
23	0,98571	COMB18	Combination	96,139	3,131	0,000	9,321E-17	0,0000
23	1,08429	COMB18	Combination	96,139	5,454	0,000	9,321E-17	0,0000
23	1,08429	COMB18	Combination	96,139	3,486	0,000	9,321E-17	0,0000
23	1,18286	COMB18	Combination	96,139	5,809	0,000	9,321E-17	0,0000
23	1,18286	COMB18	Combination	96,139	3,852	0,000	9,321E-17	0,0000
23	1,28143	COMB18	Combination	96,139	6,175	0,000	9,321E-17	0,0000
23	1,28143	COMB18	Combination	96,139	4,229	0,000	9,321E-17	0,0000
23	1,38000	COMB18	Combination	96,139	6,551	0,000	9,321E-17	0,0000
23	1,38000	COMB18	Combination	96,139	4,618	0,000	9,321E-17	0,0000
23	1,47857	COMB18	Combination	96,139	6,941	0,000	9,321E-17	0,0000
23	1,47857	COMB18	Combination	96,139	5,021	0,000	9,321E-17	0,0000
23	1,57714	COMB18	Combination	96,139	7,343	0,000	9,321E-17	0,0000
23	1,57714	COMB18	Combination	96,139	5,438	0,000	9,321E-17	0,0000
23	1,67571	COMB18	Combination	96,139	7,761	0,000	9,321E-17	0,0000
23	1,67571	COMB18	Combination	96,139	5,871	0,000	9,321E-17	0,0000
23	1,77429	COMB18	Combination	96,139	8,194	0,000	9,321E-17	0,0000
23	1,77429	COMB18	Combination	96,139	6,321	0,000	9,321E-17	0,0000
23	1,87286	COMB18	Combination	96,139	8,644	0,000	9,321E-17	0,0000
23	1,87286	COMB18	Combination	96,139	6,789	0,000	9,321E-17	0,0000
23	1,97143	COMB18	Combination	96,139	9,111	0,000	9,321E-17	0,0000
23	1,97143	COMB18	Combination	96,139	7,275	0,000	9,321E-17	0,0000
23	2,07000	COMB18	Combination	96,139	9,598	0,000	9,321E-17	0,0000
23	2,07000	COMB18	Combination	96,139	7,781	0,000	9,321E-17	0,0000

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

Codice documento

SS0558_F0.doc

Rev

F0

Data

20/06/2011

Frame Text	Station m	OutputCase Text	CaseType Text	P KN	V2 KN	V3 KN	T KN-m	M2 KN-m
23	2,16857	COMB18	Combination	96,139	10,103	0,000	9,321E-17	0,0000
23	2,16857	COMB18	Combination	96,139	8,307	0,000	9,321E-17	0,0000
23	2,26714	COMB18	Combination	96,139	10,630	0,000	9,321E-17	0,0000
23	2,26714	COMB18	Combination	96,139	8,854	0,000	9,321E-17	0,0000
23	2,36571	COMB18	Combination	96,139	11,177	0,000	9,321E-17	0,0000
23	2,36571	COMB18	Combination	96,139	9,424	0,000	9,321E-17	0,0000
23	2,46429	COMB18	Combination	96,139	11,747	0,000	9,321E-17	0,0000
23	2,46429	COMB18	Combination	96,139	10,016	0,000	9,321E-17	0,0000
23	2,56286	COMB18	Combination	96,139	12,339	0,000	9,321E-17	0,0000
23	2,56286	COMB18	Combination	96,139	10,633	0,000	9,321E-17	0,0000
23	2,66143	COMB18	Combination	96,139	12,955	0,000	9,321E-17	0,0000
23	2,66143	COMB18	Combination	96,139	11,273	0,000	9,321E-17	0,0000
23	2,76000	COMB18	Combination	96,139	13,595	0,000	9,321E-17	0,0000
23	2,76000	COMB18	Combination	96,139	11,938	0,000	9,321E-17	0,0000
23	2,85857	COMB18	Combination	96,139	14,261	0,000	9,321E-17	0,0000
23	2,85857	COMB18	Combination	96,139	12,629	0,000	9,321E-17	0,0000
23	2,95714	COMB18	Combination	96,139	14,951	0,000	9,321E-17	0,0000
23	2,95714	COMB18	Combination	96,139	13,345	0,000	9,321E-17	0,0000
23	3,05571	COMB18	Combination	96,139	15,668	0,000	9,321E-17	0,0000
23	3,05571	COMB18	Combination	96,139	14,088	0,000	9,321E-17	0,0000
23	3,15429	COMB18	Combination	96,139	16,411	0,000	9,321E-17	0,0000
23	3,15429	COMB18	Combination	96,139	14,858	0,000	9,321E-17	0,0000
23	3,25286	COMB18	Combination	96,139	17,181	0,000	9,321E-17	0,0000
23	3,25286	COMB18	Combination	96,139	15,655	0,000	9,321E-17	0,0000
23	3,35143	COMB18	Combination	96,139	17,977	0,000	9,321E-17	0,0000
23	3,35143	COMB18	Combination	96,139	16,479	0,000	9,321E-17	0,0000
23	3,45000	COMB18	Combination	96,139	18,802	0,000	9,321E-17	0,0000
23	0,00000	COMB19	Combination	-8,166	-0,624	0,000	3,778E-17	0,0000
23	0,09857	COMB19	Combination	-8,166	1,698	0,000	3,778E-17	0,0000
23	0,09857	COMB19	Combination	-8,166	-0,251	0,000	3,778E-17	0,0000
23	0,19714	COMB19	Combination	-8,166	2,072	0,000	3,778E-17	0,0000
23	0,19714	COMB19	Combination	-8,166	0,124	0,000	3,778E-17	0,0000
23	0,29571	COMB19	Combination	-8,166	2,446	0,000	3,778E-17	0,0000
23	0,29571	COMB19	Combination	-8,166	0,500	0,000	3,778E-17	0,0000
23	0,39429	COMB19	Combination	-8,166	2,823	0,000	3,778E-17	0,0000
23	0,39429	COMB19	Combination	-8,166	0,880	0,000	3,778E-17	0,0000
23	0,49286	COMB19	Combination	-8,166	3,203	0,000	3,778E-17	0,0000
23	0,49286	COMB19	Combination	-8,166	1,265	0,000	3,778E-17	0,0000
23	0,59143	COMB19	Combination	-8,166	3,588	0,000	3,778E-17	0,0000
23	0,59143	COMB19	Combination	-8,166	1,657	0,000	3,778E-17	0,0000
23	0,69000	COMB19	Combination	-8,166	3,980	0,000	3,778E-17	0,0000
23	0,69000	COMB19	Combination	-8,166	2,057	0,000	3,778E-17	0,0000
23	0,78857	COMB19	Combination	-8,166	4,379	0,000	3,778E-17	0,0000
23	0,78857	COMB19	Combination	-8,166	2,466	0,000	3,778E-17	0,0000
23	0,88714	COMB19	Combination	-8,166	4,788	0,000	3,778E-17	0,0000
23	0,88714	COMB19	Combination	-8,166	2,886	0,000	3,778E-17	0,0000
23	0,98571	COMB19	Combination	-8,166	5,208	0,000	3,778E-17	0,0000
23	0,98571	COMB19	Combination	-8,166	3,318	0,000	3,778E-17	0,0000
23	1,08429	COMB19	Combination	-8,166	5,641	0,000	3,778E-17	0,0000
23	1,08429	COMB19	Combination	-8,166	3,764	0,000	3,778E-17	0,0000
23	1,18286	COMB19	Combination	-8,166	6,087	0,000	3,778E-17	0,0000
23	1,18286	COMB19	Combination	-8,166	4,225	0,000	3,778E-17	0,0000
23	1,28143	COMB19	Combination	-8,166	6,548	0,000	3,778E-17	0,0000
23	1,28143	COMB19	Combination	-8,166	4,703	0,000	3,778E-17	0,0000
23	1,38000	COMB19	Combination	-8,166	7,026	0,000	3,778E-17	0,0000
23	1,38000	COMB19	Combination	-8,166	5,198	0,000	3,778E-17	0,0000
23	1,47857	COMB19	Combination	-8,166	7,521	0,000	3,778E-17	0,0000
23	1,47857	COMB19	Combination	-8,166	5,713	0,000	3,778E-17	0,0000
23	1,57714	COMB19	Combination	-8,166	8,035	0,000	3,778E-17	0,0000
23	1,57714	COMB19	Combination	-8,166	6,248	0,000	3,778E-17	0,0000
23	1,67571	COMB19	Combination	-8,166	8,570	0,000	3,778E-17	0,0000
23	1,67571	COMB19	Combination	-8,166	6,804	0,000	3,778E-17	0,0000
23	1,77429	COMB19	Combination	-8,166	9,127	0,000	3,778E-17	0,0000

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

Codice documento
SS0558_F0.doc

Rev
F0

Data
20/06/2011

Frame Text	Station m	OutputCase Text	CaseType Text	P KN	V2 KN	V3 KN	T KN-m	M2 KN-m
23	1,77429	COMB19	Combination	-8,166	7,383	0,000	3,778E-17	0,0000
23	1,87286	COMB19	Combination	-8,166	9,706	0,000	3,778E-17	0,0000
23	1,87286	COMB19	Combination	-8,166	7,987	0,000	3,778E-17	0,0000
23	1,97143	COMB19	Combination	-8,166	10,310	0,000	3,778E-17	0,0000
23	1,97143	COMB19	Combination	-8,166	8,616	0,000	3,778E-17	0,0000
23	2,07000	COMB19	Combination	-8,166	10,938	0,000	3,778E-17	0,0000
23	2,07000	COMB19	Combination	-8,166	9,270	0,000	3,778E-17	0,0000
23	2,16857	COMB19	Combination	-8,166	11,593	0,000	3,778E-17	0,0000
23	2,16857	COMB19	Combination	-8,166	9,953	0,000	3,778E-17	0,0000
23	2,26714	COMB19	Combination	-8,166	12,276	0,000	3,778E-17	0,0000
23	2,26714	COMB19	Combination	-8,166	10,664	0,000	3,778E-17	0,0000
23	2,36571	COMB19	Combination	-8,166	12,986	0,000	3,778E-17	0,0000
23	2,36571	COMB19	Combination	-8,166	11,404	0,000	3,778E-17	0,0000
23	2,46429	COMB19	Combination	-8,166	13,727	0,000	3,778E-17	0,0000
23	2,46429	COMB19	Combination	-8,166	12,175	0,000	3,778E-17	0,0000
23	2,56286	COMB19	Combination	-8,166	14,497	0,000	3,778E-17	0,0000
23	2,56286	COMB19	Combination	-8,166	12,976	0,000	3,778E-17	0,0000
23	2,66143	COMB19	Combination	-8,166	15,299	0,000	3,778E-17	0,0000
23	2,66143	COMB19	Combination	-8,166	13,810	0,000	3,778E-17	0,0000
23	2,76000	COMB19	Combination	-8,166	16,133	0,000	3,778E-17	0,0000
23	2,76000	COMB19	Combination	-8,166	14,677	0,000	3,778E-17	0,0000
23	2,85857	COMB19	Combination	-8,166	17,000	0,000	3,778E-17	0,0000
23	2,85857	COMB19	Combination	-8,166	15,577	0,000	3,778E-17	0,0000
23	2,95714	COMB19	Combination	-8,166	17,900	0,000	3,778E-17	0,0000
23	2,95714	COMB19	Combination	-8,166	16,512	0,000	3,778E-17	0,0000
23	3,05571	COMB19	Combination	-8,166	18,834	0,000	3,778E-17	0,0000
23	3,05571	COMB19	Combination	-8,166	17,481	0,000	3,778E-17	0,0000
23	3,15429	COMB19	Combination	-8,166	19,803	0,000	3,778E-17	0,0000
23	3,15429	COMB19	Combination	-8,166	18,485	0,000	3,778E-17	0,0000
23	3,25286	COMB19	Combination	-8,166	20,808	0,000	3,778E-17	0,0000
23	3,25286	COMB19	Combination	-8,166	19,525	0,000	3,778E-17	0,0000
23	3,35143	COMB19	Combination	-8,166	21,848	0,000	3,778E-17	0,0000
23	3,35143	COMB19	Combination	-8,166	20,601	0,000	3,778E-17	0,0000
23	3,45000	COMB19	Combination	-8,166	22,923	0,000	3,778E-17	0,0000
23	0,00000	COMB20	Combination	166,442	-0,475	0,000	5,543E-17	0,0000
23	0,09857	COMB20	Combination	166,442	1,848	0,000	5,543E-17	0,0000
23	0,09857	COMB20	Combination	166,442	-0,153	0,000	5,543E-17	0,0000
23	0,19714	COMB20	Combination	166,442	2,169	0,000	5,543E-17	0,0000
23	0,19714	COMB20	Combination	166,442	0,168	0,000	5,543E-17	0,0000
23	0,29571	COMB20	Combination	166,442	2,490	0,000	5,543E-17	0,0000
23	0,29571	COMB20	Combination	166,442	0,490	0,000	5,543E-17	0,0000
23	0,39429	COMB20	Combination	166,442	2,812	0,000	5,543E-17	0,0000
23	0,39429	COMB20	Combination	166,442	0,814	0,000	5,543E-17	0,0000
23	0,49286	COMB20	Combination	166,442	3,136	0,000	5,543E-17	0,0000
23	0,49286	COMB20	Combination	166,442	1,141	0,000	5,543E-17	0,0000
23	0,59143	COMB20	Combination	166,442	3,464	0,000	5,543E-17	0,0000
23	0,59143	COMB20	Combination	166,442	1,473	0,000	5,543E-17	0,0000
23	0,69000	COMB20	Combination	166,442	3,795	0,000	5,543E-17	0,0000
23	0,69000	COMB20	Combination	166,442	1,811	0,000	5,543E-17	0,0000
23	0,78857	COMB20	Combination	166,442	4,133	0,000	5,543E-17	0,0000
23	0,78857	COMB20	Combination	166,442	2,155	0,000	5,543E-17	0,0000
23	0,88714	COMB20	Combination	166,442	4,478	0,000	5,543E-17	0,0000
23	0,88714	COMB20	Combination	166,442	2,509	0,000	5,543E-17	0,0000
23	0,98571	COMB20	Combination	166,442	4,831	0,000	5,543E-17	0,0000
23	0,98571	COMB20	Combination	166,442	2,871	0,000	5,543E-17	0,0000
23	1,08429	COMB20	Combination	166,442	5,194	0,000	5,543E-17	0,0000
23	1,08429	COMB20	Combination	166,442	3,245	0,000	5,543E-17	0,0000
23	1,18286	COMB20	Combination	166,442	5,567	0,000	5,543E-17	0,0000
23	1,18286	COMB20	Combination	166,442	3,630	0,000	5,543E-17	0,0000
23	1,28143	COMB20	Combination	166,442	5,953	0,000	5,543E-17	0,0000
23	1,28143	COMB20	Combination	166,442	4,029	0,000	5,543E-17	0,0000
23	1,38000	COMB20	Combination	166,442	6,351	0,000	5,543E-17	0,0000
23	1,38000	COMB20	Combination	166,442	4,441	0,000	5,543E-17	0,0000

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

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SS0558_F0.doc

Rev

F0

Data

20/06/2011

Frame Text	Station m	OutputCase Text	CaseType Text	P KN	V2 KN	V3 KN	T KN-m	M2 KN-m
23	1,47857	COMB20	Combination	166,442	6,764	0,000	5,543E-17	0,0000
23	1,47857	COMB20	Combination	166,442	4,869	0,000	5,543E-17	0,0000
23	1,57714	COMB20	Combination	166,442	7,192	0,000	5,543E-17	0,0000
23	1,57714	COMB20	Combination	166,442	5,314	0,000	5,543E-17	0,0000
23	1,67571	COMB20	Combination	166,442	7,637	0,000	5,543E-17	0,0000
23	1,67571	COMB20	Combination	166,442	5,776	0,000	5,543E-17	0,0000
23	1,77429	COMB20	Combination	166,442	8,099	0,000	5,543E-17	0,0000
23	1,77429	COMB20	Combination	166,442	6,257	0,000	5,543E-17	0,0000
23	1,87286	COMB20	Combination	166,442	8,579	0,000	5,543E-17	0,0000
23	1,87286	COMB20	Combination	166,442	6,757	0,000	5,543E-17	0,0000
23	1,97143	COMB20	Combination	166,442	9,079	0,000	5,543E-17	0,0000
23	1,97143	COMB20	Combination	166,442	7,277	0,000	5,543E-17	0,0000
23	2,07000	COMB20	Combination	166,442	9,600	0,000	5,543E-17	0,0000
23	2,07000	COMB20	Combination	166,442	7,820	0,000	5,543E-17	0,0000
23	2,16857	COMB20	Combination	166,442	10,142	0,000	5,543E-17	0,0000
23	2,16857	COMB20	Combination	166,442	8,384	0,000	5,543E-17	0,0000
23	2,26714	COMB20	Combination	166,442	10,707	0,000	5,543E-17	0,0000
23	2,26714	COMB20	Combination	166,442	8,972	0,000	5,543E-17	0,0000
23	2,36571	COMB20	Combination	166,442	11,295	0,000	5,543E-17	0,0000
23	2,36571	COMB20	Combination	166,442	9,584	0,000	5,543E-17	0,0000
23	2,46429	COMB20	Combination	166,442	11,907	0,000	5,543E-17	0,0000
23	2,46429	COMB20	Combination	166,442	10,221	0,000	5,543E-17	0,0000
23	2,56286	COMB20	Combination	166,442	12,544	0,000	5,543E-17	0,0000
23	2,56286	COMB20	Combination	166,442	10,884	0,000	5,543E-17	0,0000
23	2,66143	COMB20	Combination	166,442	13,206	0,000	5,543E-17	0,0000
23	2,66143	COMB20	Combination	166,442	11,573	0,000	5,543E-17	0,0000
23	2,76000	COMB20	Combination	166,442	13,895	0,000	5,543E-17	0,0000
23	2,76000	COMB20	Combination	166,442	12,289	0,000	5,543E-17	0,0000
23	2,85857	COMB20	Combination	166,442	14,611	0,000	5,543E-17	0,0000
23	2,85857	COMB20	Combination	166,442	13,032	0,000	5,543E-17	0,0000
23	2,95714	COMB20	Combination	166,442	15,355	0,000	5,543E-17	0,0000
23	2,95714	COMB20	Combination	166,442	13,804	0,000	5,543E-17	0,0000
23	3,05571	COMB20	Combination	166,442	16,127	0,000	5,543E-17	0,0000
23	3,05571	COMB20	Combination	166,442	14,604	0,000	5,543E-17	0,0000
23	3,15429	COMB20	Combination	166,442	16,927	0,000	5,543E-17	0,0000
23	3,15429	COMB20	Combination	166,442	15,433	0,000	5,543E-17	0,0000
23	3,25286	COMB20	Combination	166,442	17,756	0,000	5,543E-17	0,0000
23	3,25286	COMB20	Combination	166,442	16,292	0,000	5,543E-17	0,0000
23	3,35143	COMB20	Combination	166,442	18,614	0,000	5,543E-17	0,0000
23	3,35143	COMB20	Combination	166,442	17,180	0,000	5,543E-17	0,0000
23	3,45000	COMB20	Combination	166,442	19,502	0,000	5,543E-17	0,0000
23	0,00000	COMB21	Combination	62,137	-0,974	0,000	0,0000	0,0000
23	0,09857	COMB21	Combination	62,137	1,349	0,000	0,0000	0,0000
23	0,09857	COMB21	Combination	62,137	-0,599	0,000	0,0000	0,0000
23	0,19714	COMB21	Combination	62,137	1,724	0,000	0,0000	0,0000
23	0,19714	COMB21	Combination	62,137	-0,221	0,000	0,0000	0,0000
23	0,29571	COMB21	Combination	62,137	2,102	0,000	0,0000	0,0000
23	0,29571	COMB21	Combination	62,137	0,160	0,000	0,0000	0,0000
23	0,39429	COMB21	Combination	62,137	2,483	0,000	0,0000	0,0000
23	0,39429	COMB21	Combination	62,137	0,547	0,000	0,0000	0,0000
23	0,49286	COMB21	Combination	62,137	2,869	0,000	0,0000	0,0000
23	0,49286	COMB21	Combination	62,137	0,940	0,000	0,0000	0,0000
23	0,59143	COMB21	Combination	62,137	3,263	0,000	0,0000	0,0000
23	0,59143	COMB21	Combination	62,137	1,341	0,000	0,0000	0,0000
23	0,69000	COMB21	Combination	62,137	3,664	0,000	0,0000	0,0000
23	0,69000	COMB21	Combination	62,137	1,753	0,000	0,0000	0,0000
23	0,78857	COMB21	Combination	62,137	4,075	0,000	0,0000	0,0000
23	0,78857	COMB21	Combination	62,137	2,175	0,000	0,0000	0,0000
23	0,88714	COMB21	Combination	62,137	4,497	0,000	0,0000	0,0000
23	0,88714	COMB21	Combination	62,137	2,610	0,000	0,0000	0,0000
23	0,98571	COMB21	Combination	62,137	4,932	0,000	0,0000	0,0000
23	0,98571	COMB21	Combination	62,137	3,058	0,000	0,0000	0,0000
23	1,08429	COMB21	Combination	62,137	5,381	0,000	0,0000	0,0000

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

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SS0558_F0.doc

Rev
F0

Data
20/06/2011

Frame Text	Station m	OutputCase Text	CaseType Text	P KN	V2 KN	V3 KN	T KN-m	M2 KN-m
23	1,08429	COMB21	Combination	62,137	3,523	0,000	0,0000	0,0000
23	1,18286	COMB21	Combination	62,137	5,845	0,000	0,0000	0,0000
23	1,18286	COMB21	Combination	62,137	4,004	0,000	0,0000	0,0000
23	1,28143	COMB21	Combination	62,137	6,326	0,000	0,0000	0,0000
23	1,28143	COMB21	Combination	62,137	4,503	0,000	0,0000	0,0000
23	1,38000	COMB21	Combination	62,137	6,826	0,000	0,0000	0,0000
23	1,38000	COMB21	Combination	62,137	5,022	0,000	0,0000	0,0000
23	1,47857	COMB21	Combination	62,137	7,344	0,000	0,0000	0,0000
23	1,47857	COMB21	Combination	62,137	5,561	0,000	0,0000	0,0000
23	1,57714	COMB21	Combination	62,137	7,884	0,000	0,0000	0,0000
23	1,57714	COMB21	Combination	62,137	6,123	0,000	0,0000	0,0000
23	1,67571	COMB21	Combination	62,137	8,446	0,000	0,0000	0,0000
23	1,67571	COMB21	Combination	62,137	6,709	0,000	0,0000	0,0000
23	1,77429	COMB21	Combination	62,137	9,031	0,000	0,0000	0,0000
23	1,77429	COMB21	Combination	62,137	7,319	0,000	0,0000	0,0000
23	1,87286	COMB21	Combination	62,137	9,641	0,000	0,0000	0,0000
23	1,87286	COMB21	Combination	62,137	7,955	0,000	0,0000	0,0000
23	1,97143	COMB21	Combination	62,137	10,277	0,000	0,0000	0,0000
23	1,97143	COMB21	Combination	62,137	8,618	0,000	0,0000	0,0000
23	2,07000	COMB21	Combination	62,137	10,941	0,000	0,0000	0,0000
23	2,07000	COMB21	Combination	62,137	9,309	0,000	0,0000	0,0000
23	2,16857	COMB21	Combination	62,137	11,632	0,000	0,0000	0,0000
23	2,16857	COMB21	Combination	62,137	10,030	0,000	0,0000	0,0000
23	2,26714	COMB21	Combination	62,137	12,353	0,000	0,0000	0,0000
23	2,26714	COMB21	Combination	62,137	10,782	0,000	0,0000	0,0000
23	2,36571	COMB21	Combination	62,137	13,104	0,000	0,0000	0,0000
23	2,36571	COMB21	Combination	62,137	11,564	0,000	0,0000	0,0000
23	2,46429	COMB21	Combination	62,137	13,887	0,000	0,0000	0,0000
23	2,46429	COMB21	Combination	62,137	12,379	0,000	0,0000	0,0000
23	2,56286	COMB21	Combination	62,137	14,702	0,000	0,0000	0,0000
23	2,56286	COMB21	Combination	62,137	13,228	0,000	0,0000	0,0000
23	2,66143	COMB21	Combination	62,137	15,550	0,000	0,0000	0,0000
23	2,66143	COMB21	Combination	62,137	14,110	0,000	0,0000	0,0000
23	2,76000	COMB21	Combination	62,137	16,433	0,000	0,0000	0,0000
23	2,76000	COMB21	Combination	62,137	15,028	0,000	0,0000	0,0000
23	2,85857	COMB21	Combination	62,137	17,350	0,000	0,0000	0,0000
23	2,85857	COMB21	Combination	62,137	15,981	0,000	0,0000	0,0000
23	2,95714	COMB21	Combination	62,137	18,304	0,000	0,0000	0,0000
23	2,95714	COMB21	Combination	62,137	16,970	0,000	0,0000	0,0000
23	3,05571	COMB21	Combination	62,137	19,293	0,000	0,0000	0,0000
23	3,05571	COMB21	Combination	62,137	17,997	0,000	0,0000	0,0000
23	3,15429	COMB21	Combination	62,137	20,319	0,000	0,0000	0,0000
23	3,15429	COMB21	Combination	62,137	19,060	0,000	0,0000	0,0000
23	3,25286	COMB21	Combination	62,137	21,383	0,000	0,0000	0,0000
23	3,25286	COMB21	Combination	62,137	20,162	0,000	0,0000	0,0000
23	3,35143	COMB21	Combination	62,137	22,485	0,000	0,0000	0,0000
23	3,35143	COMB21	Combination	62,137	21,301	0,000	0,0000	0,0000
23	3,45000	COMB21	Combination	62,137	23,624	0,000	0,0000	0,0000

Table: Element Forces - Frames, Part 2 of 2

Frame Text	Station m	OutputCase Text	M3 KN-m
6	0,00000	COMB1	-215,7264
6	2,45000	COMB1	-99,9719
6	4,90000	COMB1	389,4381
6	0,00000	COMB2	-388,1647
6	2,45000	COMB2	-39,5726
6	4,90000	COMB2	495,8472
6	0,00000	COMB3	-139,3854
6	2,45000	COMB3	-180,8308
6	4,90000	COMB3	343,9246

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

Codice documento

SS0558_F0.doc

Rev

F0

Data

20/06/2011

Frame Text	Station m	OutputCase Text	M3 KN-m
6	0,00000	COMB4	-400,6846
6	2,45000	COMB4	-89,3079
6	4,90000	COMB4	505,1692
6	0,00000	COMB5	-200,0832
6	2,45000	COMB5	-162,1363
6	4,90000	COMB5	253,2778
6	0,00000	COMB6	-363,8738
6	2,45000	COMB6	56,9430
6	4,90000	COMB6	477,7598
6	0,00000	COMB7	-180,8693
6	2,45000	COMB7	-88,1051
6	4,90000	COMB7	328,4940
6	0,00000	COMB8	-330,3158
6	2,45000	COMB8	-35,7590
6	4,90000	COMB8	420,7152
6	0,00000	COMB9	-114,7071
6	2,45000	COMB9	-158,1828
6	4,90000	COMB9	289,0490
6	0,00000	COMB10	-341,1664
6	2,45000	COMB10	-78,8629
6	4,90000	COMB10	428,7943
6	0,00000	COMB11	-309,2637
6	2,45000	COMB11	47,8879
6	4,90000	COMB11	405,0394
6	0,00000	COMB12	-114,9008
6	2,45000	COMB12	-62,8331
6	4,90000	COMB12	238,3385
6	0,00000	COMB13	40,0124
6	2,45000	COMB13	-52,8572
6	4,90000	COMB13	103,3770
6	0,00000	COMB14	-229,8597
6	2,45000	COMB14	-22,5669
6	4,90000	COMB14	309,2778
6	0,00000	COMB15	-74,9465
6	2,45000	COMB15	-12,5910
6	4,90000	COMB15	174,3164
6	0,00000	COMB16	-64,0068
6	2,45000	COMB16	-116,7390
6	4,90000	COMB16	207,9961
6	0,00000	COMB17	90,9064
6	2,45000	COMB17	-106,7631
6	4,90000	COMB17	73,0346
6	0,00000	COMB18	-238,2063
6	2,45000	COMB18	-55,7237
6	4,90000	COMB18	315,4925
6	0,00000	COMB19	-83,2931
6	2,45000	COMB19	-45,7478
6	4,90000	COMB19	180,5310
6	0,00000	COMB20	-213,6657
6	2,45000	COMB20	41,7769
6	4,90000	COMB20	297,2195
6	0,00000	COMB21	-58,7525
6	2,45000	COMB21	51,7528
6	4,90000	COMB21	162,2581
7	0,00000	COMB1	389,4381
7	0,70000	COMB1	578,5464
7	1,40000	COMB1	783,6410
7	0,00000	COMB2	495,8472
7	0,70000	COMB2	673,4627
7	1,40000	COMB2	859,0714
7	0,00000	COMB3	343,9246
7	0,70000	COMB3	568,5243
7	1,40000	COMB3	817,3496

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

Codice documento
SS0558_F0.doc

<i>Rev</i>	<i>Data</i>
F0	20/06/2011

Frame Text	Station m	OutputCase Text	M3 KN-m
7	0,00000	COMB4	505,1692
7	0,70000	COMB4	712,3546
7	1,40000	COMB4	931,6528
7	0,00000	COMB5	253,2778
7	0,70000	COMB5	421,7473
7	1,40000	COMB5	606,3671
7	0,00000	COMB6	477,7598
7	0,70000	COMB6	597,9931
7	1,40000	COMB6	718,2265
7	0,00000	COMB7	328,4940
7	0,70000	COMB7	490,2289
7	1,40000	COMB7	665,8186
7	0,00000	COMB8	420,7152
7	0,70000	COMB8	572,4897
7	1,40000	COMB8	731,1916
7	0,00000	COMB9	289,0490
7	0,70000	COMB9	481,5431
7	1,40000	COMB9	695,0327
7	0,00000	COMB10	428,7943
7	0,70000	COMB10	606,1960
7	1,40000	COMB10	794,0955
7	0,00000	COMB11	405,0394
7	0,70000	COMB11	507,0827
7	1,40000	COMB11	609,1260
7	0,00000	COMB12	238,3385
7	0,70000	COMB12	357,2387
7	1,40000	COMB12	486,7964
7	0,00000	COMB13	103,3770
7	0,70000	COMB13	180,8666
7	1,40000	COMB13	269,0136
7	0,00000	COMB14	309,2778
7	0,70000	COMB14	420,5162
7	1,40000	COMB14	537,0834
7	0,00000	COMB15	174,3164
7	0,70000	COMB15	244,1441
7	1,40000	COMB15	319,3006
7	0,00000	COMB16	207,9961
7	0,70000	COMB16	350,5572
7	1,40000	COMB16	509,2688
7	0,00000	COMB17	73,0346
7	0,70000	COMB17	174,1851
7	1,40000	COMB17	291,4860
7	0,00000	COMB18	315,4925
7	0,70000	COMB18	446,4441
7	1,40000	COMB18	585,4710
7	0,00000	COMB19	180,5310
7	0,70000	COMB19	270,0720
7	1,40000	COMB19	367,6882
7	0,00000	COMB20	297,2195
7	0,70000	COMB20	370,2031
7	1,40000	COMB20	443,1868
7	0,00000	COMB21	162,2581
7	0,70000	COMB21	193,8310
7	1,40000	COMB21	225,4040
8	0,00000	COMB1	282,7169
8	0,70000	COMB1	94,5689
8	1,40000	COMB1	-45,7284
8	0,00000	COMB2	174,5793
8	0,70000	COMB2	9,3759
8	1,40000	COMB2	-107,9767
8	0,00000	COMB3	316,4255
8	0,70000	COMB3	84,5467
8	1,40000	COMB3	-91,2420

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

Codice documento
SS0558_F0.doc

Rev
F0

Data
20/06/2011

Frame Text	Station m	OutputCase Text	M3 KN-m
8	0,00000	COMB4	152,5607
8	0,70000	COMB4	-44,5492
8	1,40000	COMB4	-185,5690
8	0,00000	COMB5	151,6173
8	0,70000	COMB5	-37,481
8	1,40000	COMB5	-221,8586
8	0,00000	COMB6	217,3024
8	0,70000	COMB6	114,0156
8	1,40000	COMB6	42,5932
8	0,00000	COMB7	239,1055
8	0,70000	COMB7	77,9518
8	1,40000	COMB7	-42,2034
8	0,00000	COMB8	145,3862
8	0,70000	COMB8	4,1179
8	1,40000	COMB8	-96,1519
8	0,00000	COMB9	268,3196
8	0,70000	COMB9	69,2659
8	1,40000	COMB9	-81,6485
8	0,00000	COMB10	126,3035
8	0,70000	COMB10	-42,6172
8	1,40000	COMB10	-163,3986
8	0,00000	COMB11	182,4129
8	0,70000	COMB11	94,8056
8	1,40000	COMB11	34,3420
8	0,00000	COMB12	208,5053
8	0,70000	COMB12	88,3623
8	1,40000	COMB12	-3,4208
8	0,00000	COMB13	269,0136
8	0,70000	COMB13	180,8666
8	1,40000	COMB13	103,3770
8	0,00000	COMB14	136,4135
8	0,70000	COMB14	31,5670
8	1,40000	COMB14	-44,9196
8	0,00000	COMB15	196,9219
8	0,70000	COMB15	124,0713
8	1,40000	COMB15	61,8781
8	0,00000	COMB16	230,9776
8	0,70000	COMB16	81,6808
8	1,40000	COMB16	-33,7631
8	0,00000	COMB17	291,4860
8	0,70000	COMB17	174,1851
8	1,40000	COMB17	73,0346
8	0,00000	COMB18	121,7345
8	0,70000	COMB18	-4,3831
8	1,40000	COMB18	-96,6478
8	0,00000	COMB19	182,2428
8	0,70000	COMB19	88,1212
8	1,40000	COMB19	10,1499
8	0,00000	COMB20	164,8956
8	0,70000	COMB20	101,3267
8	1,40000	COMB20	55,4603
8	0,00000	COMB21	225,4040
8	0,70000	COMB21	193,8310
8	1,40000	COMB21	162,2581
9	0,00000	COMB1	-45,7284
9	2,45000	COMB1	-146,7515
9	4,90000	COMB1	411,7682
9	0,00000	COMB2	-107,9767
9	2,45000	COMB2	-128,6933
9	4,90000	COMB2	510,1328
9	0,00000	COMB3	-91,2420
9	2,45000	COMB3	-227,6103
9	4,90000	COMB3	488,1092

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

Codice documento

SS0558_F0.doc

Rev

F0

Data

20/06/2011

Frame Text	Station m	OutputCase Text	M3 KN-m
9	0,00000	COMB4	-185,5690
9	2,45000	COMB4	-200,2463
9	4,90000	COMB4	637,1643
9	0,00000	COMB5	-221,8586
9	2,45000	COMB5	-380,6509
9	4,90000	COMB5	638,6604
9	0,00000	COMB6	42,5932
9	2,45000	COMB6	10,1635
9	4,90000	COMB6	263,6208
9	0,00000	COMB7	-42,2034
9	2,45000	COMB7	-127,9543
9	4,90000	COMB7	353,6631
9	0,00000	COMB8	-96,1519
9	2,45000	COMB8	-112,3039
9	4,90000	COMB8	438,9124
9	0,00000	COMB9	-81,6485
9	2,45000	COMB9	-198,0320
9	4,90000	COMB9	419,8253
9	0,00000	COMB10	-163,3986
9	2,45000	COMB10	-174,3165
9	4,90000	COMB10	549,0064
9	0,00000	COMB11	34,3420
9	2,45000	COMB11	8,0386
9	4,90000	COMB11	225,2687
9	0,00000	COMB12	-3,4208
9	2,45000	COMB12	-88,8217
9	4,90000	COMB12	233,7073
9	0,00000	COMB13	103,3770
9	2,45000	COMB13	-52,8572
9	4,90000	COMB13	40,0124
9	0,00000	COMB14	-44,9196
9	2,45000	COMB14	-76,7829
9	4,90000	COMB14	299,2837
9	0,00000	COMB15	61,8781
9	2,45000	COMB15	-40,8184
9	4,90000	COMB15	105,5887
9	0,00000	COMB16	-33,7631
9	2,45000	COMB16	-142,7276
9	4,90000	COMB16	284,6013
9	0,00000	COMB17	73,0346
9	2,45000	COMB17	-106,7631
9	4,90000	COMB17	90,9064
9	0,00000	COMB18	-96,6478
9	2,45000	COMB18	-124,4849
9	4,90000	COMB18	383,9713
9	0,00000	COMB19	10,1499
9	2,45000	COMB19	-88,5204
9	4,90000	COMB19	190,2764
9	0,00000	COMB20	55,4603
9	2,45000	COMB20	15,7883
9	4,90000	COMB20	134,9424
9	0,00000	COMB21	162,2581
9	2,45000	COMB21	51,7528
9	4,90000	COMB21	-58,7525
10	0,00000	COMB1	215,7264
10	2,50000	COMB1	57,2591
10	5,00000	COMB1	-101,2083
10	0,00000	COMB2	388,1647
10	2,50000	COMB2	104,8224
10	5,00000	COMB2	-178,5199
10	0,00000	COMB3	139,3854
10	2,50000	COMB3	35,7056
10	5,00000	COMB3	-67,9742

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

Codice documento
SS0558_F0.doc

Rev
F0

Data
20/06/2011

Frame Text	Station m	OutputCase Text	M3 KN-m
10	0,00000	COMB4	400,6846
10	2,50000	COMB4	107,7792
10	5,00000	COMB4	-185,1261
10	0,00000	COMB5	200,0832
10	2,50000	COMB5	52,7478
10	5,00000	COMB5	-94,5875
10	0,00000	COMB6	363,8738
10	2,50000	COMB6	99,0857
10	5,00000	COMB6	-165,7024
10	0,00000	COMB7	180,8693
10	2,50000	COMB7	47,9631
10	5,00000	COMB7	-84,9430
10	0,00000	COMB8	330,3158
10	2,50000	COMB8	89,1847
10	5,00000	COMB8	-151,9465
10	0,00000	COMB9	114,7071
10	2,50000	COMB9	29,2835
10	5,00000	COMB9	-56,1401
10	0,00000	COMB10	341,1664
10	2,50000	COMB10	91,7473
10	5,00000	COMB10	-157,6719
10	0,00000	COMB11	309,2637
10	2,50000	COMB11	84,2129
10	5,00000	COMB11	-140,8379
10	0,00000	COMB12	114,9008
10	2,50000	COMB12	30,3322
10	5,00000	COMB12	-54,2364
10	0,00000	COMB13	-40,0124
10	2,50000	COMB13	-11,7133
10	5,00000	COMB13	16,5858
10	0,00000	COMB14	229,8597
10	2,50000	COMB14	62,0411
10	5,00000	COMB14	-105,7775
10	0,00000	COMB15	74,9465
10	2,50000	COMB15	19,9956
10	5,00000	COMB15	-34,9553
10	0,00000	COMB16	64,0068
10	2,50000	COMB16	15,9633
10	5,00000	COMB16	-32,0803
10	0,00000	COMB17	-90,9064
10	2,50000	COMB17	-26,0823
10	5,00000	COMB17	38,7419
10	0,00000	COMB18	238,2063
10	2,50000	COMB18	64,0123
10	5,00000	COMB18	-110,1816
10	0,00000	COMB19	83,2931
10	2,50000	COMB19	21,9668
10	5,00000	COMB19	-39,3595
10	0,00000	COMB20	213,6657
10	2,50000	COMB20	58,2166
10	5,00000	COMB20	-97,2324
10	0,00000	COMB21	58,7525
10	2,50000	COMB21	16,1711
10	5,00000	COMB21	-26,4103
11	0,00000	COMB1	411,7682
11	2,50000	COMB1	113,8927
11	5,00000	COMB1	-183,9829
11	0,00000	COMB2	510,1328
11	2,50000	COMB2	140,5426
11	5,00000	COMB2	-229,0475
11	0,00000	COMB3	488,1092
11	2,50000	COMB3	135,4461
11	5,00000	COMB3	-217,2170

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

Codice documento
SS0558_F0.doc

<i>Rev</i>	<i>Data</i>
F0	20/06/2011

Frame Text	Station m	OutputCase Text	M3 KN-m
11	0,00000	COMB4	637,1643
11	2,50000	COMB4	175,8297
11	5,00000	COMB4	-285,5049
11	0,00000	COMB5	638,6604
11	2,50000	COMB5	175,1215
11	5,00000	COMB5	-288,4175
11	0,00000	COMB6	263,6208
11	2,50000	COMB6	72,0660
11	5,00000	COMB6	-119,4888
11	0,00000	COMB7	353,6631
11	2,50000	COMB7	97,8328
11	5,00000	COMB7	-157,9976
11	0,00000	COMB8	438,9124
11	2,50000	COMB8	120,9294
11	5,00000	COMB8	-197,0536
11	0,00000	COMB9	419,8253
11	2,50000	COMB9	116,5124
11	5,00000	COMB9	-186,8005
11	0,00000	COMB10	549,0064
11	2,50000	COMB10	151,5115
11	5,00000	COMB10	-245,9833
11	0,00000	COMB11	225,2687
11	2,50000	COMB11	61,5830
11	5,00000	COMB11	-102,1027
11	0,00000	COMB12	233,7073
11	2,50000	COMB12	64,7521
11	5,00000	COMB12	-104,2031
11	0,00000	COMB13	40,0124
11	2,50000	COMB13	11,7133
11	5,00000	COMB13	-16,5858
11	0,00000	COMB14	299,2837
11	2,50000	COMB14	82,5187
11	5,00000	COMB14	-134,2462
11	0,00000	COMB15	105,5887
11	2,50000	COMB15	29,4799
11	5,00000	COMB15	-46,6289
11	0,00000	COMB16	284,6013
11	2,50000	COMB16	79,1210
11	5,00000	COMB16	-126,3592
11	0,00000	COMB17	90,9064
11	2,50000	COMB17	26,0823
11	5,00000	COMB17	-38,7419
11	0,00000	COMB18	383,9713
11	2,50000	COMB18	106,0434
11	5,00000	COMB18	-171,8845
11	0,00000	COMB19	190,2764
11	2,50000	COMB19	53,0046
11	5,00000	COMB19	-84,2671
11	0,00000	COMB20	134,9424
11	2,50000	COMB20	36,8676
11	5,00000	COMB20	-61,2071
11	0,00000	COMB21	-58,7525
11	2,50000	COMB21	-16,1711
11	5,00000	COMB21	26,4103
19	0,00000	COMB1	-783,6410
19	0,49286	COMB1	-529,4863
19	0,98571	COMB1	-308,9277
19	1,47857	COMB1	-121,9652
19	1,97143	COMB1	31,4013
19	2,46429	COMB1	151,1717
19	2,95714	COMB1	237,3461
19	3,45000	COMB1	289,9244
19	3,94286	COMB1	308,9067

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

Codice documento

SS0558_F0.doc

Rev

F0

Data

20/06/2011

Frame Text	Station m	OutputCase Text	M3 KN-m
19	4,43571	COMB1	294,2929
19	4,92857	COMB1	246,0830
19	5,42143	COMB1	164,2771
19	5,91429	COMB1	48,8752
19	6,40714	COMB1	-100,1228
19	6,90000	COMB1	-282,7169
19	0,00000	COMB2	-859,0714
19	0,49286	COMB2	-591,8047
19	0,98571	COMB2	-358,1341
19	1,47857	COMB2	-158,0596
19	1,97143	COMB2	8,4189
19	2,46429	COMB2	141,3014
19	2,95714	COMB2	240,5877
19	3,45000	COMB2	306,2781
19	3,94286	COMB2	338,3723
19	4,43571	COMB2	336,8705
19	4,92857	COMB2	301,7727
19	5,42143	COMB2	233,0788
19	5,91429	COMB2	130,7888
19	6,40714	COMB2	-5,0972
19	6,90000	COMB2	-174,5793
19	0,00000	COMB3	-817,3496
19	0,49286	COMB3	-563,1949
19	0,98571	COMB3	-342,6363
19	1,47857	COMB3	-155,6737
19	1,97143	COMB3	-2,3073
19	2,46429	COMB3	117,4632
19	2,95714	COMB3	203,6376
19	3,45000	COMB3	256,2159
19	3,94286	COMB3	275,1981
19	4,43571	COMB3	260,5843
19	4,92857	COMB3	212,3745
19	5,42143	COMB3	130,5686
19	5,91429	COMB3	15,1666
19	6,40714	COMB3	-133,8314
19	6,90000	COMB3	-316,4255
19	0,00000	COMB4	-931,6528
19	0,49286	COMB4	-657,6290
19	0,98571	COMB4	-417,2012
19	1,47857	COMB4	-210,3695
19	1,97143	COMB4	-37,1339
19	2,46429	COMB4	102,5057
19	2,95714	COMB4	208,5492
19	3,45000	COMB4	280,9966
19	3,94286	COMB4	319,8480
19	4,43571	COMB4	325,1034
19	4,92857	COMB4	296,7627
19	5,42143	COMB4	234,8259
19	5,91429	COMB4	139,2931
19	6,40714	COMB4	10,1642
19	6,90000	COMB4	-152,5607
19	0,00000	COMB5	-606,3671
19	0,49286	COMB5	-452,8707
19	0,98571	COMB5	-317,9919
19	1,47857	COMB5	-201,7307
19	1,97143	COMB5	-104,0871
19	2,46429	COMB5	-25,061
19	2,95714	COMB5	35,3475
19	3,45000	COMB5	77,1384
19	3,94286	COMB5	100,3117
19	4,43571	COMB5	104,8675
19	4,92857	COMB5	90,8057
19	5,42143	COMB5	58,1263

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

Codice documento

SS0558_F0.doc

Rev

F0

Data

20/06/2011

Frame Text	Station m	OutputCase Text	M3 KN-m
19	5,91429	COMB5	6,8294
19	6,40714	COMB5	-63,0852
19	6,90000	COMB5	-151,6173
19	0,00000	COMB6	-718,2265
19	0,49286	COMB6	-464,0718
19	0,98571	COMB6	-243,5132
19	1,47857	COMB6	-56,5507
19	1,97143	COMB6	96,8158
19	2,46429	COMB6	216,5862
19	2,95714	COMB6	302,7606
19	3,45000	COMB6	355,3389
19	3,94286	COMB6	374,3212
19	4,43571	COMB6	359,7074
19	4,92857	COMB6	311,4976
19	5,42143	COMB6	229,6917
19	5,91429	COMB6	114,2897
19	6,40714	COMB6	-34,7083
19	6,90000	COMB6	-217,3024
19	0,00000	COMB7	-665,8186
19	0,49286	COMB7	-450,6667
19	0,98571	COMB7	-263,9259
19	1,47857	COMB7	-105,5962
19	1,97143	COMB7	24,3223
19	2,46429	COMB7	125,8297
19	2,95714	COMB7	198,9259
19	3,45000	COMB7	243,6110
19	3,94286	COMB7	259,8849
19	4,43571	COMB7	247,7477
19	4,92857	COMB7	207,1994
19	5,42143	COMB7	138,2399
19	5,91429	COMB7	40,8692
19	6,40714	COMB7	-84,9126
19	6,90000	COMB7	-239,1055
19	0,00000	COMB8	-731,1916
19	0,49286	COMB8	-504,6759
19	0,98571	COMB8	-306,5714
19	1,47857	COMB8	-136,8780
19	1,97143	COMB8	4,4043
19	2,46429	COMB8	117,2754
19	2,95714	COMB8	201,7353
19	3,45000	COMB8	257,7841
19	3,94286	COMB8	285,4218
19	4,43571	COMB8	284,6483
19	4,92857	COMB8	255,4637
19	5,42143	COMB8	197,8680
19	5,91429	COMB8	111,8610
19	6,40714	COMB8	-2,5570
19	6,90000	COMB8	-145,3862
19	0,00000	COMB9	-695,0327
19	0,49286	COMB9	-479,8807
19	0,98571	COMB9	-293,1399
19	1,47857	COMB9	-134,8103
19	1,97143	COMB9	-4,8918
19	2,46429	COMB9	96,6156
19	2,95714	COMB9	169,7118
19	3,45000	COMB9	214,3969
19	3,94286	COMB9	230,6709
19	4,43571	COMB9	218,5336
19	4,92857	COMB9	177,9853
19	5,42143	COMB9	109,0258
19	5,91429	COMB9	11,6551
19	6,40714	COMB9	-114,1266
19	6,90000	COMB9	-268,3196

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

Codice documento
SS0558_F0.doc

Rev
F0

Data
20/06/2011

Frame Text	Station m	OutputCase Text	M3 KN-m
19	0,00000	COMB10	-794,0955
19	0,49286	COMB10	-561,7236
19	0,98571	COMB10	-357,7629
19	1,47857	COMB10	-182,2133
19	1,97143	COMB10	-35,0749
19	2,46429	COMB10	83,6524
19	2,95714	COMB10	173,9686
19	3,45000	COMB10	235,8736
19	3,94286	COMB10	269,3674
19	4,43571	COMB10	274,4502
19	4,92857	COMB10	251,1217
19	5,42143	COMB10	199,3822
19	5,91429	COMB10	119,2314
19	6,40714	COMB10	10,6696
19	6,90000	COMB10	-126,3035
19	0,00000	COMB11	-609,1260
19	0,49286	COMB11	-393,9741
19	0,98571	COMB11	-207,2333
19	1,47857	COMB11	-48,9036
19	1,97143	COMB11	81,0149
19	2,46429	COMB11	182,5223
19	2,95714	COMB11	255,6185
19	3,45000	COMB11	300,3036
19	3,94286	COMB11	316,5775
19	4,43571	COMB11	304,4403
19	4,92857	COMB11	263,8920
19	5,42143	COMB11	194,9325
19	5,91429	COMB11	97,5618
19	6,40714	COMB11	-28,2200
19	6,90000	COMB11	-182,4129
19	0,00000	COMB12	-486,7964
19	0,49286	COMB12	-323,4823
19	0,98571	COMB12	-182,2352
19	1,47857	COMB12	-63,0553
19	1,97143	COMB12	34,0576
19	2,46429	COMB12	109,1033
19	2,95714	COMB12	162,0819
19	3,45000	COMB12	192,9934
19	3,94286	COMB12	201,8378
19	4,43571	COMB12	188,6151
19	4,92857	COMB12	153,3252
19	5,42143	COMB12	95,9683
19	5,91429	COMB12	16,5442
19	6,40714	COMB12	-84,9470
19	6,90000	COMB12	-208,5053
19	0,00000	COMB13	-269,0136
19	0,49286	COMB13	-156,1529
19	0,98571	COMB13	-60,6553
19	1,47857	COMB13	17,4791
19	1,97143	COMB13	78,2503
19	2,46429	COMB13	121,6583
19	2,95714	COMB13	147,7031
19	3,45000	COMB13	156,3847
19	3,94286	COMB13	147,7031
19	4,43571	COMB13	121,6583
19	4,92857	COMB13	78,2503
19	5,42143	COMB13	17,4791
19	5,91429	COMB13	-60,6553
19	6,40714	COMB13	-156,1529
19	6,90000	COMB13	-269,0136
19	0,00000	COMB14	-537,0834
19	0,49286	COMB14	-365,0278
19	0,98571	COMB14	-215,0395

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

Codice documento

SS0558_F0.doc

Rev

F0

Data

20/06/2011

Frame Text	Station m	OutputCase Text	M3 KN-m
19	1,47857	COMB14	-87,1182
19	1,97143	COMB14	18,7360
19	2,46429	COMB14	102,5231
19	2,95714	COMB14	164,2430
19	3,45000	COMB14	203,8958
19	3,94286	COMB14	221,4815
19	4,43571	COMB14	217,0002
19	4,92857	COMB14	190,4516
19	5,42143	COMB14	141,8360
19	5,91429	COMB14	71,1533
19	6,40714	COMB14	-21,5966
19	6,90000	COMB14	-136,4135
19	0,00000	COMB15	-319,3006
19	0,49286	COMB15	-197,6984
19	0,98571	COMB15	-93,4595
19	1,47857	COMB15	-6,5838
19	1,97143	COMB15	62,9287
19	2,46429	COMB15	115,0780
19	2,95714	COMB15	149,8642
19	3,45000	COMB15	167,2871
19	3,94286	COMB15	167,3468
19	4,43571	COMB15	150,0434
19	4,92857	COMB15	115,3767
19	5,42143	COMB15	63,3469
19	5,91429	COMB15	-6,0462
19	6,40714	COMB15	-92,8024
19	6,90000	COMB15	-196,9219
19	0,00000	COMB16	-509,2688
19	0,49286	COMB16	-345,9546
19	0,98571	COMB16	-204,7076
19	1,47857	COMB16	-85,5276
19	1,97143	COMB16	11,5852
19	2,46429	COMB16	86,6309
19	2,95714	COMB16	139,6095
19	3,45000	COMB16	170,5210
19	3,94286	COMB16	179,3654
19	4,43571	COMB16	166,1427
19	4,92857	COMB16	130,8529
19	5,42143	COMB16	73,4959
19	5,91429	COMB16	-5,9282
19	6,40714	COMB16	-107,4193
19	6,90000	COMB16	-230,9776
19	0,00000	COMB17	-291,4860
19	0,49286	COMB17	-178,6252
19	0,98571	COMB17	-83,1276
19	1,47857	COMB17	-4,9933
19	1,97143	COMB17	55,7779
19	2,46429	COMB17	99,1859
19	2,95714	COMB17	125,2307
19	3,45000	COMB17	133,9123
19	3,94286	COMB17	125,2307
19	4,43571	COMB17	99,1859
19	4,92857	COMB17	55,7779
19	5,42143	COMB17	-4,9933
19	5,91429	COMB17	-83,1276
19	6,40714	COMB17	-178,6252
19	6,90000	COMB17	-291,4860
19	0,00000	COMB18	-585,4710
19	0,49286	COMB18	-408,9107
19	0,98571	COMB18	-254,4175
19	1,47857	COMB18	-121,9915
19	1,97143	COMB18	-11,6326
19	2,46429	COMB18	76,6593

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

Codice documento

SS0558_F0.doc

Rev

F0

Data

20/06/2011

Frame Text	Station m	OutputCase Text	M3 KN-m
19	2,95714	COMB18	142,8840
19	3,45000	COMB18	187,0416
19	3,94286	COMB18	209,1320
19	4,43571	COMB18	209,1554
19	4,92857	COMB18	187,1116
19	5,42143	COMB18	143,0008
19	5,91429	COMB18	76,8228
19	6,40714	COMB18	-11,4223
19	6,90000	COMB18	-121,7345
19	0,00000	COMB19	-367,6882
19	0,49286	COMB19	-241,5813
19	0,98571	COMB19	-132,8376
19	1,47857	COMB19	-41,4571
19	1,97143	COMB19	32,5602
19	2,46429	COMB19	89,2142
19	2,95714	COMB19	128,5051
19	3,45000	COMB19	150,4328
19	3,94286	COMB19	154,9973
19	4,43571	COMB19	142,1986
19	4,92857	COMB19	112,0367
19	5,42143	COMB19	64,5116
19	5,91429	COMB19	-0,3767
19	6,40714	COMB19	-82,6281
19	6,90000	COMB19	-182,2428
19	0,00000	COMB20	-443,1868
19	0,49286	COMB20	-279,8726
19	0,98571	COMB20	-138,6255
19	1,47857	COMB20	-19,4456
19	1,97143	COMB20	77,6673
19	2,46429	COMB20	152,7130
19	2,95714	COMB20	205,6916
19	3,45000	COMB20	236,6031
19	3,94286	COMB20	245,4475
19	4,43571	COMB20	232,2247
19	4,92857	COMB20	196,9349
19	5,42143	COMB20	139,5779
19	5,91429	COMB20	60,1539
19	6,40714	COMB20	-41,3373
19	6,90000	COMB20	-164,8956
19	0,00000	COMB21	-225,4040
19	0,49286	COMB21	-112,5432
19	0,98571	COMB21	-17,0456
19	1,47857	COMB21	61,0888
19	1,97143	COMB21	121,8600
19	2,46429	COMB21	165,2680
19	2,95714	COMB21	191,3128
19	3,45000	COMB21	199,9944
19	3,94286	COMB21	191,3128
19	4,43571	COMB21	165,2680
19	4,92857	COMB21	121,8600
19	5,42143	COMB21	61,0888
19	5,91429	COMB21	-17,0456
19	6,40714	COMB21	-112,5432
19	6,90000	COMB21	-225,4040
22	0,00000	COMB1	0,0000
22	0,09857	COMB1	2,3559
22	0,09857	COMB1	2,3559
22	0,19714	COMB1	4,5847
22	0,19714	COMB1	4,5847
22	0,29571	COMB1	6,6907
22	0,29571	COMB1	6,6907
22	0,39429	COMB1	8,6782
22	0,39429	COMB1	8,6782

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

Codice documento
SS0558_F0.doc

Rev
F0

Data
20/06/2011

Frame Text	Station m	OutputCase Text	M3 KN-m
22	0,49286	COMB1	10,5513
22	0,49286	COMB1	10,5513
22	0,59143	COMB1	12,3141
22	0,59143	COMB1	12,3141
22	0,69000	COMB1	13,9709
22	0,69000	COMB1	13,9709
22	0,78857	COMB1	15,5255
22	0,78857	COMB1	15,5255
22	0,88714	COMB1	16,9820
22	0,88714	COMB1	16,9820
22	0,98571	COMB1	18,3441
22	0,98571	COMB1	18,3441
22	1,08429	COMB1	19,6156
22	1,08429	COMB1	19,6156
22	1,18286	COMB1	20,8003
22	1,18286	COMB1	20,8003
22	1,28143	COMB1	21,9016
22	1,28143	COMB1	21,9016
22	1,38000	COMB1	22,9231
22	1,38000	COMB1	22,9231
22	1,47857	COMB1	23,8681
22	1,47857	COMB1	23,8681
22	1,57714	COMB1	24,7399
22	1,57714	COMB1	24,7399
22	1,67571	COMB1	25,5415
22	1,67571	COMB1	25,5415
22	1,77429	COMB1	26,2761
22	1,77429	COMB1	26,2761
22	1,87286	COMB1	26,9464
22	1,87286	COMB1	26,9464
22	1,97143	COMB1	27,5553
22	1,97143	COMB1	27,5553
22	2,07000	COMB1	28,1053
22	2,07000	COMB1	28,1053
22	2,16857	COMB1	28,5990
22	2,16857	COMB1	28,5990
22	2,26714	COMB1	29,0387
22	2,26714	COMB1	29,0387
22	2,36571	COMB1	29,4267
22	2,36571	COMB1	29,4267
22	2,46429	COMB1	29,7650
22	2,46429	COMB1	29,7650
22	2,56286	COMB1	30,0556
22	2,56286	COMB1	30,0556
22	2,66143	COMB1	30,3002
22	2,66143	COMB1	30,3002
22	2,76000	COMB1	30,5006
22	2,76000	COMB1	30,5006
22	2,85857	COMB1	30,6583
22	2,85857	COMB1	30,6583
22	2,95714	COMB1	30,7746
22	2,95714	COMB1	30,7746
22	3,05571	COMB1	30,8507
22	3,05571	COMB1	30,8507
22	3,15429	COMB1	30,8878
22	3,15429	COMB1	30,8878
22	3,25286	COMB1	30,8868
22	3,25286	COMB1	30,8868
22	3,35143	COMB1	30,8485
22	3,35143	COMB1	30,8485
22	3,45000	COMB1	30,7735
22	0,00000	COMB2	0,0000
22	0,09857	COMB2	2,4243

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

Codice documento
SS0558_F0.doc

Rev
F0

Data
20/06/2011

Frame Text	Station m	OutputCase Text	M3 KN-m
22	0,09857	COMB2	2,4243
22	0,19714	COMB2	4,7152
22	0,19714	COMB2	4,7152
22	0,29571	COMB2	6,8774
22	0,29571	COMB2	6,8774
22	0,39429	COMB2	8,9152
22	0,39429	COMB2	8,9152
22	0,49286	COMB2	10,8330
22	0,49286	COMB2	10,8330
22	0,59143	COMB2	12,6353
22	0,59143	COMB2	12,6353
22	0,69000	COMB2	14,3263
22	0,69000	COMB2	14,3263
22	0,78857	COMB2	15,9102
22	0,78857	COMB2	15,9102
22	0,88714	COMB2	17,3911
22	0,88714	COMB2	17,3911
22	0,98571	COMB2	18,7732
22	0,98571	COMB2	18,7732
22	1,08429	COMB2	20,0604
22	1,08429	COMB2	20,0604
22	1,18286	COMB2	21,2566
22	1,18286	COMB2	21,2566
22	1,28143	COMB2	22,3655
22	1,28143	COMB2	22,3655
22	1,38000	COMB2	23,3908
22	1,38000	COMB2	23,3908
22	1,47857	COMB2	24,3360
22	1,47857	COMB2	24,3360
22	1,57714	COMB2	25,2046
22	1,57714	COMB2	25,2046
22	1,67571	COMB2	26,0000
22	1,67571	COMB2	26,0000
22	1,77429	COMB2	26,7252
22	1,77429	COMB2	26,7252
22	1,87286	COMB2	27,3834
22	1,87286	COMB2	27,3834
22	1,97143	COMB2	27,9775
22	1,97143	COMB2	27,9775
22	2,07000	COMB2	28,5103
22	2,07000	COMB2	28,5103
22	2,16857	COMB2	28,9845
22	2,16857	COMB2	28,9845
22	2,26714	COMB2	29,4026
22	2,26714	COMB2	29,4026
22	2,36571	COMB2	29,7670
22	2,36571	COMB2	29,7670
22	2,46429	COMB2	30,0800
22	2,46429	COMB2	30,0800
22	2,56286	COMB2	30,3436
22	2,56286	COMB2	30,3436
22	2,66143	COMB2	30,5599
22	2,66143	COMB2	30,5599
22	2,76000	COMB2	30,7306
22	2,76000	COMB2	30,7306
22	2,85857	COMB2	30,8575
22	2,85857	COMB2	30,8575
22	2,95714	COMB2	30,9420
22	2,95714	COMB2	30,9420
22	3,05571	COMB2	30,9856
22	3,05571	COMB2	30,9856
22	3,15429	COMB2	30,9896
22	3,15429	COMB2	30,9896

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

Codice documento

SS0558_F0.doc

Rev

F0

Data

20/06/2011

Frame Text	Station m	OutputCase Text	M3 KN-m
22	3,25286	COMB2	30,9549
22	3,25286	COMB2	30,9549
22	3,35143	COMB2	30,8826
22	3,35143	COMB2	30,8826
22	3,45000	COMB2	30,7735
22	0,00000	COMB3	0,0000
22	0,09857	COMB3	2,3559
22	0,09857	COMB3	2,3559
22	0,19714	COMB3	4,5847
22	0,19714	COMB3	4,5847
22	0,29571	COMB3	6,6907
22	0,29571	COMB3	6,6907
22	0,39429	COMB3	8,6782
22	0,39429	COMB3	8,6782
22	0,49286	COMB3	10,5513
22	0,49286	COMB3	10,5513
22	0,59143	COMB3	12,3141
22	0,59143	COMB3	12,3141
22	0,69000	COMB3	13,9709
22	0,69000	COMB3	13,9709
22	0,78857	COMB3	15,5255
22	0,78857	COMB3	15,5255
22	0,88714	COMB3	16,9820
22	0,88714	COMB3	16,9820
22	0,98571	COMB3	18,3441
22	0,98571	COMB3	18,3441
22	1,08429	COMB3	19,6156
22	1,08429	COMB3	19,6156
22	1,18286	COMB3	20,8003
22	1,18286	COMB3	20,8003
22	1,28143	COMB3	21,9016
22	1,28143	COMB3	21,9016
22	1,38000	COMB3	22,9231
22	1,38000	COMB3	22,9231
22	1,47857	COMB3	23,8681
22	1,47857	COMB3	23,8681
22	1,57714	COMB3	24,7399
22	1,57714	COMB3	24,7399
22	1,67571	COMB3	25,5415
22	1,67571	COMB3	25,5415
22	1,77429	COMB3	26,2761
22	1,77429	COMB3	26,2761
22	1,87286	COMB3	26,9464
22	1,87286	COMB3	26,9464
22	1,97143	COMB3	27,5553
22	1,97143	COMB3	27,5553
22	2,07000	COMB3	28,1053
22	2,07000	COMB3	28,1053
22	2,16857	COMB3	28,5990
22	2,16857	COMB3	28,5990
22	2,26714	COMB3	29,0387
22	2,26714	COMB3	29,0387
22	2,36571	COMB3	29,4267
22	2,36571	COMB3	29,4267
22	2,46429	COMB3	29,7650
22	2,46429	COMB3	29,7650
22	2,56286	COMB3	30,0556
22	2,56286	COMB3	30,0556
22	2,66143	COMB3	30,3002
22	2,66143	COMB3	30,3002
22	2,76000	COMB3	30,5006
22	2,76000	COMB3	30,5006
22	2,85857	COMB3	30,6583

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

Codice documento
SS0558_F0.doc

<i>Rev</i>	<i>Data</i>
F0	20/06/2011

Frame Text	Station m	OutputCase Text	M3 KN-m
22	2,85857	COMB3	30,6583
22	2,95714	COMB3	30,7746
22	2,95714	COMB3	30,7746
22	3,05571	COMB3	30,8507
22	3,05571	COMB3	30,8507
22	3,15429	COMB3	30,8878
22	3,15429	COMB3	30,8878
22	3,25286	COMB3	30,8868
22	3,25286	COMB3	30,8868
22	3,35143	COMB3	30,8485
22	3,35143	COMB3	30,8485
22	3,45000	COMB3	30,7735
22	0,00000	COMB4	0,0000
22	0,09857	COMB4	2,4595
22	0,09857	COMB4	2,4595
22	0,19714	COMB4	4,7825
22	0,19714	COMB4	4,7825
22	0,29571	COMB4	6,9736
22	0,29571	COMB4	6,9736
22	0,39429	COMB4	9,0373
22	0,39429	COMB4	9,0373
22	0,49286	COMB4	10,9782
22	0,49286	COMB4	10,9782
22	0,59143	COMB4	12,8008
22	0,59143	COMB4	12,8008
22	0,69000	COMB4	14,5094
22	0,69000	COMB4	14,5094
22	0,78857	COMB4	16,1084
22	0,78857	COMB4	16,1084
22	0,88714	COMB4	17,6020
22	0,88714	COMB4	17,6020
22	0,98571	COMB4	18,9944
22	0,98571	COMB4	18,9944
22	1,08429	COMB4	20,2896
22	1,08429	COMB4	20,2896
22	1,18286	COMB4	21,4917
22	1,18286	COMB4	21,4917
22	1,28143	COMB4	22,6045
22	1,28143	COMB4	22,6045
22	1,38000	COMB4	23,6318
22	1,38000	COMB4	23,6318
22	1,47857	COMB4	24,5771
22	1,47857	COMB4	24,5771
22	1,57714	COMB4	25,4442
22	1,57714	COMB4	25,4442
22	1,67571	COMB4	26,2363
22	1,67571	COMB4	26,2363
22	1,77429	COMB4	26,9567
22	1,77429	COMB4	26,9567
22	1,87286	COMB4	27,6086
22	1,87286	COMB4	27,6086
22	1,97143	COMB4	28,1951
22	1,97143	COMB4	28,1951
22	2,07000	COMB4	28,7191
22	2,07000	COMB4	28,7191
22	2,16857	COMB4	29,1832
22	2,16857	COMB4	29,1832
22	2,26714	COMB4	29,5902
22	2,26714	COMB4	29,5902
22	2,36571	COMB4	29,9424
22	2,36571	COMB4	29,9424
22	2,46429	COMB4	30,2423
22	2,46429	COMB4	30,2423

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

Codice documento
SS0558_F0.doc

Rev
F0

Data
20/06/2011

Frame Text	Station m	OutputCase Text	M3 KN-m
22	2,56286	COMB4	30,4920
22	2,56286	COMB4	30,4920
22	2,66143	COMB4	30,6937
22	2,66143	COMB4	30,6937
22	2,76000	COMB4	30,8491
22	2,76000	COMB4	30,8491
22	2,85857	COMB4	30,9601
22	2,85857	COMB4	30,9601
22	2,95714	COMB4	31,0283
22	2,95714	COMB4	31,0283
22	3,05571	COMB4	31,0551
22	3,05571	COMB4	31,0551
22	3,15429	COMB4	31,0420
22	3,15429	COMB4	31,0420
22	3,25286	COMB4	30,9900
22	3,25286	COMB4	30,9900
22	3,35143	COMB4	30,9002
22	3,35143	COMB4	30,9002
22	3,45000	COMB4	30,7735
22	0,00000	COMB5	0
22	0,09857	COMB5	2,3029
22	0,09857	COMB5	2,3029
22	0,19714	COMB5	4,4821
22	0,19714	COMB5	4,4821
22	0,29571	COMB5	6,5418
22	0,29571	COMB5	6,5418
22	0,39429	COMB5	8,4862
22	0,39429	COMB5	8,4862
22	0,49286	COMB5	10,3192
22	0,49286	COMB5	10,3192
22	0,59143	COMB5	12,0449
22	0,59143	COMB5	12,0449
22	0,69000	COMB5	13,6673
22	0,69000	COMB5	13,6673
22	0,78857	COMB5	15,1903
22	0,78857	COMB5	15,1903
22	0,88714	COMB5	16,6177
22	0,88714	COMB5	16,6177
22	0,98571	COMB5	17,9533
22	0,98571	COMB5	17,9533
22	1,08429	COMB5	19,2007
22	1,08429	COMB5	19,2007
22	1,18286	COMB5	20,3635
22	1,18286	COMB5	20,3635
22	1,28143	COMB5	21,4451
22	1,28143	COMB5	21,4451
22	1,38000	COMB5	22,449
22	1,38000	COMB5	22,449
22	1,47857	COMB5	23,3785
22	1,47857	COMB5	23,3785
22	1,57714	COMB5	24,2366
22	1,57714	COMB5	24,2366
22	1,67571	COMB5	25,0263
22	1,67571	COMB5	25,0263
22	1,77429	COMB5	25,7508
22	1,77429	COMB5	25,7508
22	1,87286	COMB5	26,4126
22	1,87286	COMB5	26,4126
22	1,97143	COMB5	27,0145
22	1,97143	COMB5	27,0145
22	2,07000	COMB5	27,5591
22	2,07000	COMB5	27,5591
22	2,16857	COMB5	28,0487

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

Codice documento

SS0558_F0.doc

Rev

F0

Data

20/06/2011

Frame Text	Station m	OutputCase Text	M3 KN-m
22	2,16857	COMB5	28,0487
22	2,26714	COMB5	28,4857
22	2,26714	COMB5	28,4857
22	2,36571	COMB5	28,8722
22	2,36571	COMB5	28,8722
22	2,46429	COMB5	29,2102
22	2,46429	COMB5	29,2102
22	2,56286	COMB5	29,5016
22	2,56286	COMB5	29,5016
22	2,66143	COMB5	29,7481
22	2,66143	COMB5	29,7481
22	2,76000	COMB5	29,9513
22	2,76000	COMB5	29,9513
22	2,85857	COMB5	30,1128
22	2,85857	COMB5	30,1128
22	2,95714	COMB5	30,2337
22	2,95714	COMB5	30,2337
22	3,05571	COMB5	30,3154
22	3,05571	COMB5	30,3154
22	3,15429	COMB5	30,3587
22	3,15429	COMB5	30,3587
22	3,25286	COMB5	30,3647
22	3,25286	COMB5	30,3647
22	3,35143	COMB5	30,334
22	3,35143	COMB5	30,334
22	3,45000	COMB5	30,2673
22	0,00000	COMB6	0,0000
22	0,09857	COMB6	2,3559
22	0,09857	COMB6	2,3559
22	0,19714	COMB6	4,5847
22	0,19714	COMB6	4,5847
22	0,29571	COMB6	6,6907
22	0,29571	COMB6	6,6907
22	0,39429	COMB6	8,6782
22	0,39429	COMB6	8,6782
22	0,49286	COMB6	10,5513
22	0,49286	COMB6	10,5513
22	0,59143	COMB6	12,3141
22	0,59143	COMB6	12,3141
22	0,69000	COMB6	13,9709
22	0,69000	COMB6	13,9709
22	0,78857	COMB6	15,5255
22	0,78857	COMB6	15,5255
22	0,88714	COMB6	16,9820
22	0,88714	COMB6	16,9820
22	0,98571	COMB6	18,3441
22	0,98571	COMB6	18,3441
22	1,08429	COMB6	19,6156
22	1,08429	COMB6	19,6156
22	1,18286	COMB6	20,8003
22	1,18286	COMB6	20,8003
22	1,28143	COMB6	21,9016
22	1,28143	COMB6	21,9016
22	1,38000	COMB6	22,9231
22	1,38000	COMB6	22,9231
22	1,47857	COMB6	23,8681
22	1,47857	COMB6	23,8681
22	1,57714	COMB6	24,7399
22	1,57714	COMB6	24,7399
22	1,67571	COMB6	25,5415
22	1,67571	COMB6	25,5415
22	1,77429	COMB6	26,2761
22	1,77429	COMB6	26,2761

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

Codice documento

SS0558_F0.doc

Rev

F0

Data

20/06/2011

Frame Text	Station m	OutputCase Text	M3 KN-m
22	1,87286	COMB6	26,9464
22	1,87286	COMB6	26,9464
22	1,97143	COMB6	27,5553
22	1,97143	COMB6	27,5553
22	2,07000	COMB6	28,1053
22	2,07000	COMB6	28,1053
22	2,16857	COMB6	28,5990
22	2,16857	COMB6	28,5990
22	2,26714	COMB6	29,0387
22	2,26714	COMB6	29,0387
22	2,36571	COMB6	29,4267
22	2,36571	COMB6	29,4267
22	2,46429	COMB6	29,7650
22	2,46429	COMB6	29,7650
22	2,56286	COMB6	30,0556
22	2,56286	COMB6	30,0556
22	2,66143	COMB6	30,3002
22	2,66143	COMB6	30,3002
22	2,76000	COMB6	30,5006
22	2,76000	COMB6	30,5006
22	2,85857	COMB6	30,6583
22	2,85857	COMB6	30,6583
22	2,95714	COMB6	30,7746
22	2,95714	COMB6	30,7746
22	3,05571	COMB6	30,8507
22	3,05571	COMB6	30,8507
22	3,15429	COMB6	30,8878
22	3,15429	COMB6	30,8878
22	3,25286	COMB6	30,8868
22	3,25286	COMB6	30,8868
22	3,35143	COMB6	30,8485
22	3,35143	COMB6	30,8485
22	3,45000	COMB6	30,7735
22	0,00000	COMB7	0,0000
22	0,09857	COMB7	1,6624
22	0,09857	COMB7	1,6624
22	0,19714	COMB7	3,2341
22	0,19714	COMB7	3,2341
22	0,29571	COMB7	4,7180
22	0,29571	COMB7	4,7180
22	0,39429	COMB7	6,1173
22	0,39429	COMB7	6,1173
22	0,49286	COMB7	7,4349
22	0,49286	COMB7	7,4349
22	0,59143	COMB7	8,6737
22	0,59143	COMB7	8,6737
22	0,69000	COMB7	9,8368
22	0,69000	COMB7	9,8368
22	0,78857	COMB7	10,9269
22	0,78857	COMB7	10,9269
22	0,88714	COMB7	11,9470
22	0,88714	COMB7	11,9470
22	0,98571	COMB7	12,8996
22	0,98571	COMB7	12,8996
22	1,08429	COMB7	13,7877
22	1,08429	COMB7	13,7877
22	1,18286	COMB7	14,6137
22	1,18286	COMB7	14,6137
22	1,28143	COMB7	15,3803
22	1,28143	COMB7	15,3803
22	1,38000	COMB7	16,0899
22	1,38000	COMB7	16,0899
22	1,47857	COMB7	16,7449

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

Codice documento

SS0558_F0.doc

Rev

F0

Data

20/06/2011

Frame Text	Station m	OutputCase Text	M3 KN-m
22	1,47857	COMB7	16,7449
22	1,57714	COMB7	17,3477
22	1,57714	COMB7	17,3477
22	1,67571	COMB7	17,9006
22	1,67571	COMB7	17,9006
22	1,77429	COMB7	18,4056
22	1,77429	COMB7	18,4056
22	1,87286	COMB7	18,8649
22	1,87286	COMB7	18,8649
22	1,97143	COMB7	19,2805
22	1,97143	COMB7	19,2805
22	2,07000	COMB7	19,6542
22	2,07000	COMB7	19,6542
22	2,16857	COMB7	19,9879
22	2,16857	COMB7	19,9879
22	2,26714	COMB7	20,2833
22	2,26714	COMB7	20,2833
22	2,36571	COMB7	20,5420
22	2,36571	COMB7	20,5420
22	2,46429	COMB7	20,7655
22	2,46429	COMB7	20,7655
22	2,56286	COMB7	20,9552
22	2,56286	COMB7	20,9552
22	2,66143	COMB7	21,1124
22	2,66143	COMB7	21,1124
22	2,76000	COMB7	21,2384
22	2,76000	COMB7	21,2384
22	2,85857	COMB7	21,3343
22	2,85857	COMB7	21,3343
22	2,95714	COMB7	21,4012
22	2,95714	COMB7	21,4012
22	3,05571	COMB7	21,4399
22	3,05571	COMB7	21,4399
22	3,15429	COMB7	21,4512
22	3,15429	COMB7	21,4512
22	3,25286	COMB7	21,4359
22	3,25286	COMB7	21,4359
22	3,35143	COMB7	21,3946
22	3,35143	COMB7	21,3946
22	3,45000	COMB7	21,3279
22	0,00000	COMB8	0,0000
22	0,09857	COMB8	1,7217
22	0,09857	COMB8	1,7217
22	0,19714	COMB8	3,3472
22	0,19714	COMB8	3,3472
22	0,29571	COMB8	4,8798
22	0,29571	COMB8	4,8798
22	0,39429	COMB8	6,3227
22	0,39429	COMB8	6,3227
22	0,49286	COMB8	7,6791
22	0,49286	COMB8	7,6791
22	0,59143	COMB8	8,9521
22	0,59143	COMB8	8,9521
22	0,69000	COMB8	10,1448
22	0,69000	COMB8	10,1448
22	0,78857	COMB8	11,2603
22	0,78857	COMB8	11,2603
22	0,88714	COMB8	12,3016
22	0,88714	COMB8	12,3016
22	0,98571	COMB8	13,2716
22	0,98571	COMB8	13,2716
22	1,08429	COMB8	14,1732
22	1,08429	COMB8	14,1732

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

Codice documento
SS0558_F0.doc

Rev
F0

Data
20/06/2011

Frame Text	Station m	OutputCase Text	M3 KN-m
22	1,18286	COMB8	15,0092
22	1,18286	COMB8	15,0092
22	1,28143	COMB8	15,7823
22	1,28143	COMB8	15,7823
22	1,38000	COMB8	16,4952
22	1,38000	COMB8	16,4952
22	1,47857	COMB8	17,1504
22	1,47857	COMB8	17,1504
22	1,57714	COMB8	17,7505
22	1,57714	COMB8	17,7505
22	1,67571	COMB8	18,2979
22	1,67571	COMB8	18,2979
22	1,77429	COMB8	18,7949
22	1,77429	COMB8	18,7949
22	1,87286	COMB8	19,2437
22	1,87286	COMB8	19,2437
22	1,97143	COMB8	19,6465
22	1,97143	COMB8	19,6465
22	2,07000	COMB8	20,0053
22	2,07000	COMB8	20,0053
22	2,16857	COMB8	20,3221
22	2,16857	COMB8	20,3221
22	2,26714	COMB8	20,5987
22	2,26714	COMB8	20,5987
22	2,36571	COMB8	20,8369
22	2,36571	COMB8	20,8369
22	2,46429	COMB8	21,0384
22	2,46429	COMB8	21,0384
22	2,56286	COMB8	21,2048
22	2,56286	COMB8	21,2048
22	2,66143	COMB8	21,3374
22	2,66143	COMB8	21,3374
22	2,76000	COMB8	21,4377
22	2,76000	COMB8	21,4377
22	2,85857	COMB8	21,5069
22	2,85857	COMB8	21,5069
22	2,95714	COMB8	21,5463
22	2,95714	COMB8	21,5463
22	3,05571	COMB8	21,5568
22	3,05571	COMB8	21,5568
22	3,15429	COMB8	21,5394
22	3,15429	COMB8	21,5394
22	3,25286	COMB8	21,4949
22	3,25286	COMB8	21,4949
22	3,35143	COMB8	21,4242
22	3,35143	COMB8	21,4242
22	3,45000	COMB8	21,3279
22	0,00000	COMB9	0,0000
22	0,09857	COMB9	1,6624
22	0,09857	COMB9	1,6624
22	0,19714	COMB9	3,2341
22	0,19714	COMB9	3,2341
22	0,29571	COMB9	4,7180
22	0,29571	COMB9	4,7180
22	0,39429	COMB9	6,1173
22	0,39429	COMB9	6,1173
22	0,49286	COMB9	7,4349
22	0,49286	COMB9	7,4349
22	0,59143	COMB9	8,6737
22	0,59143	COMB9	8,6737
22	0,69000	COMB9	9,8368
22	0,69000	COMB9	9,8368
22	0,78857	COMB9	10,9269

Frame Text	Station m	OutputCase Text	M3 KN-m
22	0,78857	COMB9	10,9269
22	0,88714	COMB9	11,9470
22	0,88714	COMB9	11,9470
22	0,98571	COMB9	12,8996
22	0,98571	COMB9	12,8996
22	1,08429	COMB9	13,7877
22	1,08429	COMB9	13,7877
22	1,18286	COMB9	14,6137
22	1,18286	COMB9	14,6137
22	1,28143	COMB9	15,3803
22	1,28143	COMB9	15,3803
22	1,38000	COMB9	16,0899
22	1,38000	COMB9	16,0899
22	1,47857	COMB9	16,7449
22	1,47857	COMB9	16,7449
22	1,57714	COMB9	17,3477
22	1,57714	COMB9	17,3477
22	1,67571	COMB9	17,9006
22	1,67571	COMB9	17,9006
22	1,77429	COMB9	18,4056
22	1,77429	COMB9	18,4056
22	1,87286	COMB9	18,8649
22	1,87286	COMB9	18,8649
22	1,97143	COMB9	19,2805
22	1,97143	COMB9	19,2805
22	2,07000	COMB9	19,6542
22	2,07000	COMB9	19,6542
22	2,16857	COMB9	19,9879
22	2,16857	COMB9	19,9879
22	2,26714	COMB9	20,2833
22	2,26714	COMB9	20,2833
22	2,36571	COMB9	20,5420
22	2,36571	COMB9	20,5420
22	2,46429	COMB9	20,7655
22	2,46429	COMB9	20,7655
22	2,56286	COMB9	20,9552
22	2,56286	COMB9	20,9552
22	2,66143	COMB9	21,1124
22	2,66143	COMB9	21,1124
22	2,76000	COMB9	21,2384
22	2,76000	COMB9	21,2384
22	2,85857	COMB9	21,3343
22	2,85857	COMB9	21,3343
22	2,95714	COMB9	21,4012
22	2,95714	COMB9	21,4012
22	3,05571	COMB9	21,4399
22	3,05571	COMB9	21,4399
22	3,15429	COMB9	21,4512
22	3,15429	COMB9	21,4512
22	3,25286	COMB9	21,4359
22	3,25286	COMB9	21,4359
22	3,35143	COMB9	21,3946
22	3,35143	COMB9	21,3946
22	3,45000	COMB9	21,3279
22	0,00000	COMB10	0,0000
22	0,09857	COMB10	1,7522
22	0,09857	COMB10	1,7522
22	0,19714	COMB10	3,4055
22	0,19714	COMB10	3,4055
22	0,29571	COMB10	4,9632
22	0,29571	COMB10	4,9632
22	0,39429	COMB10	6,4285
22	0,39429	COMB10	6,4285

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

Codice documento
SS0558_F0.doc

Rev
F0

Data
20/06/2011

Frame Text	Station m	OutputCase Text	M3 KN-m
22	0,49286	COMB10	7,8049
22	0,49286	COMB10	7,8049
22	0,59143	COMB10	9,0955
22	0,59143	COMB10	9,0955
22	0,69000	COMB10	10,3035
22	0,69000	COMB10	10,3035
22	0,78857	COMB10	11,4321
22	0,78857	COMB10	11,4321
22	0,88714	COMB10	12,4843
22	0,88714	COMB10	12,4843
22	0,98571	COMB10	13,4633
22	0,98571	COMB10	13,4633
22	1,08429	COMB10	14,3718
22	1,08429	COMB10	14,3718
22	1,18286	COMB10	15,2129
22	1,18286	COMB10	15,2129
22	1,28143	COMB10	15,9894
22	1,28143	COMB10	15,9894
22	1,38000	COMB10	16,7040
22	1,38000	COMB10	16,7040
22	1,47857	COMB10	17,3594
22	1,47857	COMB10	17,3594
22	1,57714	COMB10	17,9581
22	1,57714	COMB10	17,9581
22	1,67571	COMB10	18,5027
22	1,67571	COMB10	18,5027
22	1,77429	COMB10	18,9955
22	1,77429	COMB10	18,9955
22	1,87286	COMB10	19,4389
22	1,87286	COMB10	19,4389
22	1,97143	COMB10	19,8350
22	1,97143	COMB10	19,8350
22	2,07000	COMB10	20,1862
22	2,07000	COMB10	20,1862
22	2,16857	COMB10	20,4942
22	2,16857	COMB10	20,4942
22	2,26714	COMB10	20,7612
22	2,26714	COMB10	20,7612
22	2,36571	COMB10	20,9889
22	2,36571	COMB10	20,9889
22	2,46429	COMB10	21,1791
22	2,46429	COMB10	21,1791
22	2,56286	COMB10	21,3334
22	2,56286	COMB10	21,3334
22	2,66143	COMB10	21,4534
22	2,66143	COMB10	21,4534
22	2,76000	COMB10	21,5404
22	2,76000	COMB10	21,5404
22	2,85857	COMB10	21,5959
22	2,85857	COMB10	21,5959
22	2,95714	COMB10	21,6210
22	2,95714	COMB10	21,6210
22	3,05571	COMB10	21,6170
22	3,05571	COMB10	21,6170
22	3,15429	COMB10	21,5848
22	3,15429	COMB10	21,5848
22	3,25286	COMB10	21,5253
22	3,25286	COMB10	21,5253
22	3,35143	COMB10	21,4394
22	3,35143	COMB10	21,4394
22	3,45000	COMB10	21,3279
22	0,00000	COMB11	0,0000
22	0,09857	COMB11	1,6624

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

Codice documento
SS0558_F0.doc

Rev
F0

Data
20/06/2011

Frame Text	Station m	OutputCase Text	M3 KN-m
22	0,09857	COMB11	1,6624
22	0,19714	COMB11	3,2341
22	0,19714	COMB11	3,2341
22	0,29571	COMB11	4,7180
22	0,29571	COMB11	4,7180
22	0,39429	COMB11	6,1173
22	0,39429	COMB11	6,1173
22	0,49286	COMB11	7,4349
22	0,49286	COMB11	7,4349
22	0,59143	COMB11	8,6737
22	0,59143	COMB11	8,6737
22	0,69000	COMB11	9,8368
22	0,69000	COMB11	9,8368
22	0,78857	COMB11	10,9269
22	0,78857	COMB11	10,9269
22	0,88714	COMB11	11,9470
22	0,88714	COMB11	11,9470
22	0,98571	COMB11	12,8996
22	0,98571	COMB11	12,8996
22	1,08429	COMB11	13,7877
22	1,08429	COMB11	13,7877
22	1,18286	COMB11	14,6137
22	1,18286	COMB11	14,6137
22	1,28143	COMB11	15,3803
22	1,28143	COMB11	15,3803
22	1,38000	COMB11	16,0899
22	1,38000	COMB11	16,0899
22	1,47857	COMB11	16,7449
22	1,47857	COMB11	16,7449
22	1,57714	COMB11	17,3477
22	1,57714	COMB11	17,3477
22	1,67571	COMB11	17,9006
22	1,67571	COMB11	17,9006
22	1,77429	COMB11	18,4056
22	1,77429	COMB11	18,4056
22	1,87286	COMB11	18,8649
22	1,87286	COMB11	18,8649
22	1,97143	COMB11	19,2805
22	1,97143	COMB11	19,2805
22	2,07000	COMB11	19,6542
22	2,07000	COMB11	19,6542
22	2,16857	COMB11	19,9879
22	2,16857	COMB11	19,9879
22	2,26714	COMB11	20,2833
22	2,26714	COMB11	20,2833
22	2,36571	COMB11	20,5420
22	2,36571	COMB11	20,5420
22	2,46429	COMB11	20,7655
22	2,46429	COMB11	20,7655
22	2,56286	COMB11	20,9552
22	2,56286	COMB11	20,9552
22	2,66143	COMB11	21,1124
22	2,66143	COMB11	21,1124
22	2,76000	COMB11	21,2384
22	2,76000	COMB11	21,2384
22	2,85857	COMB11	21,3343
22	2,85857	COMB11	21,3343
22	2,95714	COMB11	21,4012
22	2,95714	COMB11	21,4012
22	3,05571	COMB11	21,4399
22	3,05571	COMB11	21,4399
22	3,15429	COMB11	21,4512
22	3,15429	COMB11	21,4512

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

Codice documento
SS0558_F0.doc

Rev
F0

Data
20/06/2011

Frame Text	Station m	OutputCase Text	M3 KN-m
22	3,25286	COMB11	21,4359
22	3,25286	COMB11	21,4359
22	3,35143	COMB11	21,3946
22	3,35143	COMB11	21,3946
22	3,45000	COMB11	21,3279
22	0,00000	COMB12	0,0000
22	0,09857	COMB12	2,0152
22	0,09857	COMB12	2,0152
22	0,19714	COMB12	3,9241
22	0,19714	COMB12	3,9241
22	0,29571	COMB12	5,7300
22	0,29571	COMB12	5,7300
22	0,39429	COMB12	7,4367
22	0,39429	COMB12	7,4367
22	0,49286	COMB12	9,0475
22	0,49286	COMB12	9,0475
22	0,59143	COMB12	10,5660
22	0,59143	COMB12	10,5660
22	0,69000	COMB12	11,9956
22	0,69000	COMB12	11,9956
22	0,78857	COMB12	13,3396
22	0,78857	COMB12	13,3396
22	0,88714	COMB12	14,6012
22	0,88714	COMB12	14,6012
22	0,98571	COMB12	15,7838
22	0,98571	COMB12	15,7838
22	1,08429	COMB12	16,8904
22	1,08429	COMB12	16,8904
22	1,18286	COMB12	17,9242
22	1,18286	COMB12	17,9242
22	1,28143	COMB12	18,8880
22	1,28143	COMB12	18,8880
22	1,38000	COMB12	19,7848
22	1,38000	COMB12	19,7848
22	1,47857	COMB12	20,6174
22	1,47857	COMB12	20,6174
22	1,57714	COMB12	21,3884
22	1,57714	COMB12	21,3884
22	1,67571	COMB12	22,1004
22	1,67571	COMB12	22,1004
22	1,77429	COMB12	22,7560
22	1,77429	COMB12	22,7560
22	1,87286	COMB12	23,3575
22	1,87286	COMB12	23,3575
22	1,97143	COMB12	23,9072
22	1,97143	COMB12	23,9072
22	2,07000	COMB12	24,4073
22	2,07000	COMB12	24,4073
22	2,16857	COMB12	24,8597
22	2,16857	COMB12	24,8597
22	2,26714	COMB12	25,2664
22	2,26714	COMB12	25,2664
22	2,36571	COMB12	25,6293
22	2,36571	COMB12	25,6293
22	2,46429	COMB12	25,9499
22	2,46429	COMB12	25,9499
22	2,56286	COMB12	26,2299
22	2,56286	COMB12	26,2299
22	2,66143	COMB12	26,4708
22	2,66143	COMB12	26,4708
22	2,76000	COMB12	26,6738
22	2,76000	COMB12	26,6738
22	2,85857	COMB12	26,8401

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

Codice documento
SS0558_F0.doc

Rev
F0

Data
20/06/2011

Frame Text	Station m	OutputCase Text	M3 KN-m
22	2,85857	COMB12	26,8401
22	2,95714	COMB12	26,9708
22	2,95714	COMB12	26,9708
22	3,05571	COMB12	27,0668
22	3,05571	COMB12	27,0668
22	3,15429	COMB12	27,1290
22	3,15429	COMB12	27,1290
22	3,25286	COMB12	27,1580
22	3,25286	COMB12	27,1580
22	3,35143	COMB12	27,1544
22	3,35143	COMB12	27,1544
22	3,45000	COMB12	27,1186
22	0,00000	COMB13	0,0000
22	0,09857	COMB13	2,2142
22	0,09857	COMB13	2,2142
22	0,19714	COMB13	4,3160
22	0,19714	COMB13	4,3160
22	0,29571	COMB13	6,3093
22	0,29571	COMB13	6,3093
22	0,39429	COMB13	8,1978
22	0,39429	COMB13	8,1978
22	0,49286	COMB13	9,9850
22	0,49286	COMB13	9,9850
22	0,59143	COMB13	11,6748
22	0,59143	COMB13	11,6748
22	0,69000	COMB13	13,2706
22	0,69000	COMB13	13,2706
22	0,78857	COMB13	14,7759
22	0,78857	COMB13	14,7759
22	0,88714	COMB13	16,1943
22	0,88714	COMB13	16,1943
22	0,98571	COMB13	17,5290
22	0,98571	COMB13	17,5290
22	1,08429	COMB13	18,7834
22	1,08429	COMB13	18,7834
22	1,18286	COMB13	19,9606
22	1,18286	COMB13	19,9606
22	1,28143	COMB13	21,0638
22	1,28143	COMB13	21,0638
22	1,38000	COMB13	22,0959
22	1,38000	COMB13	22,0959
22	1,47857	COMB13	23,0599
22	1,47857	COMB13	23,0599
22	1,57714	COMB13	23,9584
22	1,57714	COMB13	23,9584
22	1,67571	COMB13	24,7943
22	1,67571	COMB13	24,7943
22	1,77429	COMB13	25,5701
22	1,77429	COMB13	25,5701
22	1,87286	COMB13	26,2881
22	1,87286	COMB13	26,2881
22	1,97143	COMB13	26,9508
22	1,97143	COMB13	26,9508
22	2,07000	COMB13	27,5603
22	2,07000	COMB13	27,5603
22	2,16857	COMB13	28,1186
22	2,16857	COMB13	28,1186
22	2,26714	COMB13	28,6277
22	2,26714	COMB13	28,6277
22	2,36571	COMB13	29,0894
22	2,36571	COMB13	29,0894
22	2,46429	COMB13	29,5054
22	2,46429	COMB13	29,5054

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

Codice documento
SS0558_F0.doc

<i>Rev</i>	<i>Data</i>
F0	20/06/2011

Frame Text	Station m	OutputCase Text	M3 KN-m
22	2,56286	COMB13	29,8771
22	2,56286	COMB13	29,8771
22	2,66143	COMB13	30,2059
22	2,66143	COMB13	30,2059
22	2,76000	COMB13	30,4932
22	2,76000	COMB13	30,4932
22	2,85857	COMB13	30,7399
22	2,85857	COMB13	30,7399
22	2,95714	COMB13	30,9470
22	2,95714	COMB13	30,9470
22	3,05571	COMB13	31,1154
22	3,05571	COMB13	31,1154
22	3,15429	COMB13	31,2456
22	3,15429	COMB13	31,2456
22	3,25286	COMB13	31,3383
22	3,25286	COMB13	31,3383
22	3,35143	COMB13	31,3938
22	3,35143	COMB13	31,3938
22	3,45000	COMB13	31,4122
22	0,00000	COMB14	0,0000
22	0,09857	COMB14	2,0608
22	0,09857	COMB14	2,0608
22	0,19714	COMB14	4,0111
22	0,19714	COMB14	4,0111
22	0,29571	COMB14	5,8545
22	0,29571	COMB14	5,8545
22	0,39429	COMB14	7,5947
22	0,39429	COMB14	7,5947
22	0,49286	COMB14	9,2354
22	0,49286	COMB14	9,2354
22	0,59143	COMB14	10,7801
22	0,59143	COMB14	10,7801
22	0,69000	COMB14	12,2325
22	0,69000	COMB14	12,2325
22	0,78857	COMB14	13,5960
22	0,78857	COMB14	13,5960
22	0,88714	COMB14	14,8740
22	0,88714	COMB14	14,8740
22	0,98571	COMB14	16,0699
22	0,98571	COMB14	16,0699
22	1,08429	COMB14	17,1870
22	1,08429	COMB14	17,1870
22	1,18286	COMB14	18,2284
22	1,18286	COMB14	18,2284
22	1,28143	COMB14	19,1972
22	1,28143	COMB14	19,1972
22	1,38000	COMB14	20,0966
22	1,38000	COMB14	20,0966
22	1,47857	COMB14	20,9293
22	1,47857	COMB14	20,9293
22	1,57714	COMB14	21,6982
22	1,57714	COMB14	21,6982
22	1,67571	COMB14	22,4061
22	1,67571	COMB14	22,4061
22	1,77429	COMB14	23,0555
22	1,77429	COMB14	23,0555
22	1,87286	COMB14	23,6489
22	1,87286	COMB14	23,6489
22	1,97143	COMB14	24,1887
22	1,97143	COMB14	24,1887
22	2,07000	COMB14	24,6773
22	2,07000	COMB14	24,6773
22	2,16857	COMB14	25,1167

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

Codice documento
SS0558_F0.doc

<i>Rev</i>	<i>Data</i>
F0	20/06/2011

Frame Text	Station m	OutputCase Text	M3 KN-m
22	2,16857	COMB14	25,1167
22	2,26714	COMB14	25,5090
22	2,26714	COMB14	25,5090
22	2,36571	COMB14	25,8561
22	2,36571	COMB14	25,8561
22	2,46429	COMB14	26,1599
22	2,46429	COMB14	26,1599
22	2,56286	COMB14	26,4220
22	2,56286	COMB14	26,4220
22	2,66143	COMB14	26,6439
22	2,66143	COMB14	26,6439
22	2,76000	COMB14	26,8271
22	2,76000	COMB14	26,8271
22	2,85857	COMB14	26,9728
22	2,85857	COMB14	26,9728
22	2,95714	COMB14	27,0824
22	2,95714	COMB14	27,0824
22	3,05571	COMB14	27,1567
22	3,05571	COMB14	27,1567
22	3,15429	COMB14	27,1968
22	3,15429	COMB14	27,1968
22	3,25286	COMB14	27,2033
22	3,25286	COMB14	27,2033
22	3,35143	COMB14	27,1771
22	3,35143	COMB14	27,1771
22	3,45000	COMB14	27,1186
22	0,00000	COMB15	0,0000
22	0,09857	COMB15	2,2598
22	0,09857	COMB15	2,2598
22	0,19714	COMB15	4,4031
22	0,19714	COMB15	4,4031
22	0,29571	COMB15	6,4338
22	0,29571	COMB15	6,4338
22	0,39429	COMB15	8,3558
22	0,39429	COMB15	8,3558
22	0,49286	COMB15	10,1729
22	0,49286	COMB15	10,1729
22	0,59143	COMB15	11,8889
22	0,59143	COMB15	11,8889
22	0,69000	COMB15	13,5075
22	0,69000	COMB15	13,5075
22	0,78857	COMB15	15,0324
22	0,78857	COMB15	15,0324
22	0,88714	COMB15	16,4671
22	0,88714	COMB15	16,4671
22	0,98571	COMB15	17,8151
22	0,98571	COMB15	17,8151
22	1,08429	COMB15	19,0799
22	1,08429	COMB15	19,0799
22	1,18286	COMB15	20,2648
22	1,18286	COMB15	20,2648
22	1,28143	COMB15	21,3730
22	1,28143	COMB15	21,3730
22	1,38000	COMB15	22,4077
22	1,38000	COMB15	22,4077
22	1,47857	COMB15	23,3718
22	1,47857	COMB15	23,3718
22	1,57714	COMB15	24,2683
22	1,57714	COMB15	24,2683
22	1,67571	COMB15	25,1000
22	1,67571	COMB15	25,1000
22	1,77429	COMB15	25,8695
22	1,77429	COMB15	25,8695

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

Codice documento
SS0558_F0.doc

Rev
F0

Data
20/06/2011

Frame Text	Station m	OutputCase Text	M3 KN-m
22	1,87286	COMB15	26,5795
22	1,87286	COMB15	26,5795
22	1,97143	COMB15	27,2323
22	1,97143	COMB15	27,2323
22	2,07000	COMB15	27,8303
22	2,07000	COMB15	27,8303
22	2,16857	COMB15	28,3756
22	2,16857	COMB15	28,3756
22	2,26714	COMB15	28,8703
22	2,26714	COMB15	28,8703
22	2,36571	COMB15	29,3163
22	2,36571	COMB15	29,3163
22	2,46429	COMB15	29,7154
22	2,46429	COMB15	29,7154
22	2,56286	COMB15	30,0691
22	2,56286	COMB15	30,0691
22	2,66143	COMB15	30,3790
22	2,66143	COMB15	30,3790
22	2,76000	COMB15	30,6465
22	2,76000	COMB15	30,6465
22	2,85857	COMB15	30,8726
22	2,85857	COMB15	30,8726
22	2,95714	COMB15	31,0586
22	2,95714	COMB15	31,0586
22	3,05571	COMB15	31,2053
22	3,05571	COMB15	31,2053
22	3,15429	COMB15	31,3134
22	3,15429	COMB15	31,3134
22	3,25286	COMB15	31,3837
22	3,25286	COMB15	31,3837
22	3,35143	COMB15	31,4165
22	3,35143	COMB15	31,4165
22	3,45000	COMB15	31,4122
22	0,00000	COMB16	0,0000
22	0,09857	COMB16	2,0152
22	0,09857	COMB16	2,0152
22	0,19714	COMB16	3,9241
22	0,19714	COMB16	3,9241
22	0,29571	COMB16	5,7300
22	0,29571	COMB16	5,7300
22	0,39429	COMB16	7,4367
22	0,39429	COMB16	7,4367
22	0,49286	COMB16	9,0475
22	0,49286	COMB16	9,0475
22	0,59143	COMB16	10,5660
22	0,59143	COMB16	10,5660
22	0,69000	COMB16	11,9956
22	0,69000	COMB16	11,9956
22	0,78857	COMB16	13,3396
22	0,78857	COMB16	13,3396
22	0,88714	COMB16	14,6012
22	0,88714	COMB16	14,6012
22	0,98571	COMB16	15,7838
22	0,98571	COMB16	15,7838
22	1,08429	COMB16	16,8904
22	1,08429	COMB16	16,8904
22	1,18286	COMB16	17,9242
22	1,18286	COMB16	17,9242
22	1,28143	COMB16	18,8880
22	1,28143	COMB16	18,8880
22	1,38000	COMB16	19,7848
22	1,38000	COMB16	19,7848
22	1,47857	COMB16	20,6174

Frame Text	Station m	OutputCase Text	M3 KN-m
22	1,47857	COMB16	20,6174
22	1,57714	COMB16	21,3884
22	1,57714	COMB16	21,3884
22	1,67571	COMB16	22,1004
22	1,67571	COMB16	22,1004
22	1,77429	COMB16	22,7560
22	1,77429	COMB16	22,7560
22	1,87286	COMB16	23,3575
22	1,87286	COMB16	23,3575
22	1,97143	COMB16	23,9072
22	1,97143	COMB16	23,9072
22	2,07000	COMB16	24,4073
22	2,07000	COMB16	24,4073
22	2,16857	COMB16	24,8597
22	2,16857	COMB16	24,8597
22	2,26714	COMB16	25,2664
22	2,26714	COMB16	25,2664
22	2,36571	COMB16	25,6293
22	2,36571	COMB16	25,6293
22	2,46429	COMB16	25,9499
22	2,46429	COMB16	25,9499
22	2,56286	COMB16	26,2299
22	2,56286	COMB16	26,2299
22	2,66143	COMB16	26,4708
22	2,66143	COMB16	26,4708
22	2,76000	COMB16	26,6738
22	2,76000	COMB16	26,6738
22	2,85857	COMB16	26,8401
22	2,85857	COMB16	26,8401
22	2,95714	COMB16	26,9708
22	2,95714	COMB16	26,9708
22	3,05571	COMB16	27,0668
22	3,05571	COMB16	27,0668
22	3,15429	COMB16	27,1290
22	3,15429	COMB16	27,1290
22	3,25286	COMB16	27,1580
22	3,25286	COMB16	27,1580
22	3,35143	COMB16	27,1544
22	3,35143	COMB16	27,1544
22	3,45000	COMB16	27,1186
22	0,00000	COMB17	0,0000
22	0,09857	COMB17	2,2142
22	0,09857	COMB17	2,2142
22	0,19714	COMB17	4,3160
22	0,19714	COMB17	4,3160
22	0,29571	COMB17	6,3093
22	0,29571	COMB17	6,3093
22	0,39429	COMB17	8,1978
22	0,39429	COMB17	8,1978
22	0,49286	COMB17	9,9850
22	0,49286	COMB17	9,9850
22	0,59143	COMB17	11,6748
22	0,59143	COMB17	11,6748
22	0,69000	COMB17	13,2706
22	0,69000	COMB17	13,2706
22	0,78857	COMB17	14,7759
22	0,78857	COMB17	14,7759
22	0,88714	COMB17	16,1943
22	0,88714	COMB17	16,1943
22	0,98571	COMB17	17,5290
22	0,98571	COMB17	17,5290
22	1,08429	COMB17	18,7834
22	1,08429	COMB17	18,7834

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

Codice documento
SS0558_F0.doc

<i>Rev</i>	<i>Data</i>
F0	20/06/2011

Frame Text	Station m	OutputCase Text	M3 KN-m
22	1,18286	COMB17	19,9606
22	1,18286	COMB17	19,9606
22	1,28143	COMB17	21,0638
22	1,28143	COMB17	21,0638
22	1,38000	COMB17	22,0959
22	1,38000	COMB17	22,0959
22	1,47857	COMB17	23,0599
22	1,47857	COMB17	23,0599
22	1,57714	COMB17	23,9584
22	1,57714	COMB17	23,9584
22	1,67571	COMB17	24,7943
22	1,67571	COMB17	24,7943
22	1,77429	COMB17	25,5701
22	1,77429	COMB17	25,5701
22	1,87286	COMB17	26,2881
22	1,87286	COMB17	26,2881
22	1,97143	COMB17	26,9508
22	1,97143	COMB17	26,9508
22	2,07000	COMB17	27,5603
22	2,07000	COMB17	27,5603
22	2,16857	COMB17	28,1186
22	2,16857	COMB17	28,1186
22	2,26714	COMB17	28,6277
22	2,26714	COMB17	28,6277
22	2,36571	COMB17	29,0894
22	2,36571	COMB17	29,0894
22	2,46429	COMB17	29,5054
22	2,46429	COMB17	29,5054
22	2,56286	COMB17	29,8771
22	2,56286	COMB17	29,8771
22	2,66143	COMB17	30,2059
22	2,66143	COMB17	30,2059
22	2,76000	COMB17	30,4932
22	2,76000	COMB17	30,4932
22	2,85857	COMB17	30,7399
22	2,85857	COMB17	30,7399
22	2,95714	COMB17	30,9470
22	2,95714	COMB17	30,9470
22	3,05571	COMB17	31,1154
22	3,05571	COMB17	31,1154
22	3,15429	COMB17	31,2456
22	3,15429	COMB17	31,2456
22	3,25286	COMB17	31,3383
22	3,25286	COMB17	31,3383
22	3,35143	COMB17	31,3938
22	3,35143	COMB17	31,3938
22	3,45000	COMB17	31,4122
22	0,00000	COMB18	0,0000
22	0,09857	COMB18	2,0843
22	0,09857	COMB18	2,0843
22	0,19714	COMB18	4,0559
22	0,19714	COMB18	4,0559
22	0,29571	COMB18	5,9186
22	0,29571	COMB18	5,9186
22	0,39429	COMB18	7,6761
22	0,39429	COMB18	7,6761
22	0,49286	COMB18	9,3322
22	0,49286	COMB18	9,3322
22	0,59143	COMB18	10,8905
22	0,59143	COMB18	10,8905
22	0,69000	COMB18	12,3546
22	0,69000	COMB18	12,3546
22	0,78857	COMB18	13,7281

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

Codice documento
SS0558_F0.doc

Rev
F0

Data
20/06/2011

Frame Text	Station m	OutputCase Text	M3 KN-m
22	0,78857	COMB18	13,7281
22	0,88714	COMB18	15,0146
22	0,88714	COMB18	15,0146
22	0,98571	COMB18	16,2173
22	0,98571	COMB18	16,2173
22	1,08429	COMB18	17,3398
22	1,08429	COMB18	17,3398
22	1,18286	COMB18	18,3851
22	1,18286	COMB18	18,3851
22	1,28143	COMB18	19,3566
22	1,28143	COMB18	19,3566
22	1,38000	COMB18	20,2572
22	1,38000	COMB18	20,2572
22	1,47857	COMB18	21,0900
22	1,47857	COMB18	21,0900
22	1,57714	COMB18	21,8579
22	1,57714	COMB18	21,8579
22	1,67571	COMB18	22,5636
22	1,67571	COMB18	22,5636
22	1,77429	COMB18	23,2098
22	1,77429	COMB18	23,2098
22	1,87286	COMB18	23,7990
22	1,87286	COMB18	23,7990
22	1,97143	COMB18	24,3338
22	1,97143	COMB18	24,3338
22	2,07000	COMB18	24,8164
22	2,07000	COMB18	24,8164
22	2,16857	COMB18	25,2491
22	2,16857	COMB18	25,2491
22	2,26714	COMB18	25,6340
22	2,26714	COMB18	25,6340
22	2,36571	COMB18	25,9731
22	2,36571	COMB18	25,9731
22	2,46429	COMB18	26,2681
22	2,46429	COMB18	26,2681
22	2,56286	COMB18	26,5209
22	2,56286	COMB18	26,5209
22	2,66143	COMB18	26,7331
22	2,66143	COMB18	26,7331
22	2,76000	COMB18	26,9061
22	2,76000	COMB18	26,9061
22	2,85857	COMB18	27,0413
22	2,85857	COMB18	27,0413
22	2,95714	COMB18	27,1399
22	2,95714	COMB18	27,1399
22	3,05571	COMB18	27,2030
22	3,05571	COMB18	27,2030
22	3,15429	COMB18	27,2317
22	3,15429	COMB18	27,2317
22	3,25286	COMB18	27,2267
22	3,25286	COMB18	27,2267
22	3,35143	COMB18	27,1888
22	3,35143	COMB18	27,1888
22	3,45000	COMB18	27,1186
22	0,00000	COMB19	0,0000
22	0,09857	COMB19	2,2833
22	0,09857	COMB19	2,2833
22	0,19714	COMB19	4,4479
22	0,19714	COMB19	4,4479
22	0,29571	COMB19	6,4979
22	0,29571	COMB19	6,4979
22	0,39429	COMB19	8,4372
22	0,39429	COMB19	8,4372

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

Codice documento
SS0558_F0.doc

Rev
F0

Data
20/06/2011

Frame Text	Station m	OutputCase Text	M3 KN-m
22	0,49286	COMB19	10,2697
22	0,49286	COMB19	10,2697
22	0,59143	COMB19	11,9992
22	0,59143	COMB19	11,9992
22	0,69000	COMB19	13,6296
22	0,69000	COMB19	13,6296
22	0,78857	COMB19	15,1645
22	0,78857	COMB19	15,1645
22	0,88714	COMB19	16,6076
22	0,88714	COMB19	16,6076
22	0,98571	COMB19	17,9625
22	0,98571	COMB19	17,9625
22	1,08429	COMB19	19,2327
22	1,08429	COMB19	19,2327
22	1,18286	COMB19	20,4216
22	1,18286	COMB19	20,4216
22	1,28143	COMB19	21,5324
22	1,28143	COMB19	21,5324
22	1,38000	COMB19	22,5683
22	1,38000	COMB19	22,5683
22	1,47857	COMB19	23,5325
22	1,47857	COMB19	23,5325
22	1,57714	COMB19	24,4280
22	1,57714	COMB19	24,4280
22	1,67571	COMB19	25,2575
22	1,67571	COMB19	25,2575
22	1,77429	COMB19	26,0238
22	1,77429	COMB19	26,0238
22	1,87286	COMB19	26,7296
22	1,87286	COMB19	26,7296
22	1,97143	COMB19	27,3774
22	1,97143	COMB19	27,3774
22	2,07000	COMB19	27,9694
22	2,07000	COMB19	27,9694
22	2,16857	COMB19	28,5081
22	2,16857	COMB19	28,5081
22	2,26714	COMB19	28,9953
22	2,26714	COMB19	28,9953
22	2,36571	COMB19	29,4332
22	2,36571	COMB19	29,4332
22	2,46429	COMB19	29,8236
22	2,46429	COMB19	29,8236
22	2,56286	COMB19	30,1681
22	2,56286	COMB19	30,1681
22	2,66143	COMB19	30,4682
22	2,66143	COMB19	30,4682
22	2,76000	COMB19	30,7255
22	2,76000	COMB19	30,7255
22	2,85857	COMB19	30,9411
22	2,85857	COMB19	30,9411
22	2,95714	COMB19	31,1161
22	2,95714	COMB19	31,1161
22	3,05571	COMB19	31,2516
22	3,05571	COMB19	31,2516
22	3,15429	COMB19	31,3484
22	3,15429	COMB19	31,3484
22	3,25286	COMB19	31,4071
22	3,25286	COMB19	31,4071
22	3,35143	COMB19	31,4282
22	3,35143	COMB19	31,4282
22	3,45000	COMB19	31,4122
22	0,00000	COMB20	0,0000
22	0,09857	COMB20	2,0152

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

Codice documento
SS0558_F0.doc

Rev
F0

Data
20/06/2011

Frame Text	Station m	OutputCase Text	M3 KN-m
22	0,09857	COMB20	2,0152
22	0,19714	COMB20	3,9241
22	0,19714	COMB20	3,9241
22	0,29571	COMB20	5,7300
22	0,29571	COMB20	5,7300
22	0,39429	COMB20	7,4367
22	0,39429	COMB20	7,4367
22	0,49286	COMB20	9,0475
22	0,49286	COMB20	9,0475
22	0,59143	COMB20	10,5660
22	0,59143	COMB20	10,5660
22	0,69000	COMB20	11,9956
22	0,69000	COMB20	11,9956
22	0,78857	COMB20	13,3396
22	0,78857	COMB20	13,3396
22	0,88714	COMB20	14,6012
22	0,88714	COMB20	14,6012
22	0,98571	COMB20	15,7838
22	0,98571	COMB20	15,7838
22	1,08429	COMB20	16,8904
22	1,08429	COMB20	16,8904
22	1,18286	COMB20	17,9242
22	1,18286	COMB20	17,9242
22	1,28143	COMB20	18,8880
22	1,28143	COMB20	18,8880
22	1,38000	COMB20	19,7848
22	1,38000	COMB20	19,7848
22	1,47857	COMB20	20,6174
22	1,47857	COMB20	20,6174
22	1,57714	COMB20	21,3884
22	1,57714	COMB20	21,3884
22	1,67571	COMB20	22,1004
22	1,67571	COMB20	22,1004
22	1,77429	COMB20	22,7560
22	1,77429	COMB20	22,7560
22	1,87286	COMB20	23,3575
22	1,87286	COMB20	23,3575
22	1,97143	COMB20	23,9072
22	1,97143	COMB20	23,9072
22	2,07000	COMB20	24,4073
22	2,07000	COMB20	24,4073
22	2,16857	COMB20	24,8597
22	2,16857	COMB20	24,8597
22	2,26714	COMB20	25,2664
22	2,26714	COMB20	25,2664
22	2,36571	COMB20	25,6293
22	2,36571	COMB20	25,6293
22	2,46429	COMB20	25,9499
22	2,46429	COMB20	25,9499
22	2,56286	COMB20	26,2299
22	2,56286	COMB20	26,2299
22	2,66143	COMB20	26,4708
22	2,66143	COMB20	26,4708
22	2,76000	COMB20	26,6738
22	2,76000	COMB20	26,6738
22	2,85857	COMB20	26,8401
22	2,85857	COMB20	26,8401
22	2,95714	COMB20	26,9708
22	2,95714	COMB20	26,9708
22	3,05571	COMB20	27,0668
22	3,05571	COMB20	27,0668
22	3,15429	COMB20	27,1290
22	3,15429	COMB20	27,1290

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

Codice documento
SS0558_F0.doc

<i>Rev</i>	<i>Data</i>
F0	20/06/2011

Frame Text	Station m	OutputCase Text	M3 KN-m
22	3,25286	COMB20	27,1580
22	3,25286	COMB20	27,1580
22	3,35143	COMB20	27,1544
22	3,35143	COMB20	27,1544
22	3,45000	COMB20	27,1186
22	0,00000	COMB21	0,0000
22	0,09857	COMB21	2,2142
22	0,09857	COMB21	2,2142
22	0,19714	COMB21	4,3160
22	0,19714	COMB21	4,3160
22	0,29571	COMB21	6,3093
22	0,29571	COMB21	6,3093
22	0,39429	COMB21	8,1978
22	0,39429	COMB21	8,1978
22	0,49286	COMB21	9,9850
22	0,49286	COMB21	9,9850
22	0,59143	COMB21	11,6748
22	0,59143	COMB21	11,6748
22	0,69000	COMB21	13,2706
22	0,69000	COMB21	13,2706
22	0,78857	COMB21	14,7759
22	0,78857	COMB21	14,7759
22	0,88714	COMB21	16,1943
22	0,88714	COMB21	16,1943
22	0,98571	COMB21	17,5290
22	0,98571	COMB21	17,5290
22	1,08429	COMB21	18,7834
22	1,08429	COMB21	18,7834
22	1,18286	COMB21	19,9606
22	1,18286	COMB21	19,9606
22	1,28143	COMB21	21,0638
22	1,28143	COMB21	21,0638
22	1,38000	COMB21	22,0959
22	1,38000	COMB21	22,0959
22	1,47857	COMB21	23,0599
22	1,47857	COMB21	23,0599
22	1,57714	COMB21	23,9584
22	1,57714	COMB21	23,9584
22	1,67571	COMB21	24,7943
22	1,67571	COMB21	24,7943
22	1,77429	COMB21	25,5701
22	1,77429	COMB21	25,5701
22	1,87286	COMB21	26,2881
22	1,87286	COMB21	26,2881
22	1,97143	COMB21	26,9508
22	1,97143	COMB21	26,9508
22	2,07000	COMB21	27,5603
22	2,07000	COMB21	27,5603
22	2,16857	COMB21	28,1186
22	2,16857	COMB21	28,1186
22	2,26714	COMB21	28,6277
22	2,26714	COMB21	28,6277
22	2,36571	COMB21	29,0894
22	2,36571	COMB21	29,0894
22	2,46429	COMB21	29,5054
22	2,46429	COMB21	29,5054
22	2,56286	COMB21	29,8771
22	2,56286	COMB21	29,8771
22	2,66143	COMB21	30,2059
22	2,66143	COMB21	30,2059
22	2,76000	COMB21	30,4932
22	2,76000	COMB21	30,4932
22	2,85857	COMB21	30,7399

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

Codice documento
SS0558_F0.doc

<i>Rev</i>	<i>Data</i>
F0	20/06/2011

Frame Text	Station m	OutputCase Text	M3 KN-m
22	2,85857	COMB21	30,7399
22	2,95714	COMB21	30,9470
22	2,95714	COMB21	30,9470
22	3,05571	COMB21	31,1154
22	3,05571	COMB21	31,1154
22	3,15429	COMB21	31,2456
22	3,15429	COMB21	31,2456
22	3,25286	COMB21	31,3383
22	3,25286	COMB21	31,3383
22	3,35143	COMB21	31,3938
22	3,35143	COMB21	31,3938
22	3,45000	COMB21	31,4122
23	0,00000	COMB1	30,7735
23	0,09857	COMB1	30,6623
23	0,09857	COMB1	30,6623
23	0,19714	COMB1	30,5153
23	0,19714	COMB1	30,5153
23	0,29571	COMB1	30,3327
23	0,29571	COMB1	30,3327
23	0,39429	COMB1	30,1146
23	0,39429	COMB1	30,1146
23	0,49286	COMB1	29,8609
23	0,49286	COMB1	29,8609
23	0,59143	COMB1	29,5714
23	0,59143	COMB1	29,5714
23	0,69000	COMB1	29,2457
23	0,69000	COMB1	29,2457
23	0,78857	COMB1	28,8834
23	0,78857	COMB1	28,8834
23	0,88714	COMB1	28,4837
23	0,88714	COMB1	28,4837
23	0,98571	COMB1	28,0461
23	0,98571	COMB1	28,0461
23	1,08429	COMB1	27,5694
23	1,08429	COMB1	27,5694
23	1,18286	COMB1	27,0528
23	1,18286	COMB1	27,0528
23	1,28143	COMB1	26,4951
23	1,28143	COMB1	26,4951
23	1,38000	COMB1	25,8949
23	1,38000	COMB1	25,8949
23	1,47857	COMB1	25,2508
23	1,47857	COMB1	25,2508
23	1,57714	COMB1	24,5613
23	1,57714	COMB1	24,5613
23	1,67571	COMB1	23,8248
23	1,67571	COMB1	23,8248
23	1,77429	COMB1	23,0395
23	1,77429	COMB1	23,0395
23	1,87286	COMB1	22,2034
23	1,87286	COMB1	22,2034
23	1,97143	COMB1	21,3145
23	1,97143	COMB1	21,3145
23	2,07000	COMB1	20,3709
23	2,07000	COMB1	20,3709
23	2,16857	COMB1	19,3701
23	2,16857	COMB1	19,3701
23	2,26714	COMB1	18,3100
23	2,26714	COMB1	18,3100
23	2,36571	COMB1	17,1881
23	2,36571	COMB1	17,1881
23	2,46429	COMB1	16,0019
23	2,46429	COMB1	16,0019

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

Codice documento
SS0558_F0.doc

<i>Rev</i>	<i>Data</i>
F0	20/06/2011

Frame Text	Station m	OutputCase Text	M3 KN-m
23	2,56286	COMB1	14,7488
23	2,56286	COMB1	14,7488
23	2,66143	COMB1	13,4262
23	2,66143	COMB1	13,4262
23	2,76000	COMB1	12,0314
23	2,76000	COMB1	12,0314
23	2,85857	COMB1	10,5614
23	2,85857	COMB1	10,5614
23	2,95714	COMB1	9,0134
23	2,95714	COMB1	9,0134
23	3,05571	COMB1	7,3846
23	3,05571	COMB1	7,3846
23	3,15429	COMB1	5,6719
23	3,15429	COMB1	5,6719
23	3,25286	COMB1	3,8722
23	3,25286	COMB1	3,8722
23	3,35143	COMB1	1,9827
23	3,35143	COMB1	1,9827
23	3,45000	COMB1	8,496E-14
23	0,00000	COMB2	30,7735
23	0,09857	COMB2	30,6282
23	0,09857	COMB2	30,6282
23	0,19714	COMB2	30,4472
23	0,19714	COMB2	30,4472
23	0,29571	COMB2	30,2310
23	0,29571	COMB2	30,2310
23	0,39429	COMB2	29,9797
23	0,39429	COMB2	29,9797
23	0,49286	COMB2	29,6935
23	0,49286	COMB2	29,6935
23	0,59143	COMB2	29,3722
23	0,59143	COMB2	29,3722
23	0,69000	COMB2	29,0158
23	0,69000	COMB2	29,0158
23	0,78857	COMB2	28,6238
23	0,78857	COMB2	28,6238
23	0,88714	COMB2	28,1957
23	0,88714	COMB2	28,1957
23	0,98571	COMB2	27,7311
23	0,98571	COMB2	27,7311
23	1,08429	COMB2	27,2291
23	1,08429	COMB2	27,2291
23	1,18286	COMB2	26,6889
23	1,18286	COMB2	26,6889
23	1,28143	COMB2	26,1096
23	1,28143	COMB2	26,1096
23	1,38000	COMB2	25,4898
23	1,38000	COMB2	25,4898
23	1,47857	COMB2	24,8286
23	1,47857	COMB2	24,8286
23	1,57714	COMB2	24,1243
23	1,57714	COMB2	24,1243
23	1,67571	COMB2	23,3757
23	1,67571	COMB2	23,3757
23	1,77429	COMB2	22,5810
23	1,77429	COMB2	22,5810
23	1,87286	COMB2	21,7386
23	1,87286	COMB2	21,7386
23	1,97143	COMB2	20,8466
23	1,97143	COMB2	20,8466
23	2,07000	COMB2	19,9032
23	2,07000	COMB2	19,9032
23	2,16857	COMB2	18,9063

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

Codice documento
SS0558_F0.doc

<i>Rev</i>	<i>Data</i>
F0	20/06/2011

Frame Text	Station m	OutputCase Text	M3 KN-m
23	2,16857	COMB2	18,9063
23	2,26714	COMB2	17,8537
23	2,26714	COMB2	17,8537
23	2,36571	COMB2	16,7433
23	2,36571	COMB2	16,7433
23	2,46429	COMB2	15,5727
23	2,46429	COMB2	15,5727
23	2,56286	COMB2	14,3397
23	2,56286	COMB2	14,3397
23	2,66143	COMB2	13,0416
23	2,66143	COMB2	13,0416
23	2,76000	COMB2	11,6760
23	2,76000	COMB2	11,6760
23	2,85857	COMB2	10,2402
23	2,85857	COMB2	10,2402
23	2,95714	COMB2	8,7317
23	2,95714	COMB2	8,7317
23	3,05571	COMB2	7,1476
23	3,05571	COMB2	7,1476
23	3,15429	COMB2	5,4852
23	3,15429	COMB2	5,4852
23	3,25286	COMB2	3,7417
23	3,25286	COMB2	3,7417
23	3,35143	COMB2	1,9143
23	3,35143	COMB2	1,9143
23	3,45000	COMB2	8,109E-14
23	0,00000	COMB3	30,7735
23	0,09857	COMB3	30,6623
23	0,09857	COMB3	30,6623
23	0,19714	COMB3	30,5153
23	0,19714	COMB3	30,5153
23	0,29571	COMB3	30,3327
23	0,29571	COMB3	30,3327
23	0,39429	COMB3	30,1146
23	0,39429	COMB3	30,1146
23	0,49286	COMB3	29,8609
23	0,49286	COMB3	29,8609
23	0,59143	COMB3	29,5714
23	0,59143	COMB3	29,5714
23	0,69000	COMB3	29,2457
23	0,69000	COMB3	29,2457
23	0,78857	COMB3	28,8834
23	0,78857	COMB3	28,8834
23	0,88714	COMB3	28,4837
23	0,88714	COMB3	28,4837
23	0,98571	COMB3	28,0461
23	0,98571	COMB3	28,0461
23	1,08429	COMB3	27,5694
23	1,08429	COMB3	27,5694
23	1,18286	COMB3	27,0528
23	1,18286	COMB3	27,0528
23	1,28143	COMB3	26,4951
23	1,28143	COMB3	26,4951
23	1,38000	COMB3	25,8949
23	1,38000	COMB3	25,8949
23	1,47857	COMB3	25,2508
23	1,47857	COMB3	25,2508
23	1,57714	COMB3	24,5613
23	1,57714	COMB3	24,5613
23	1,67571	COMB3	23,8248
23	1,67571	COMB3	23,8248
23	1,77429	COMB3	23,0395
23	1,77429	COMB3	23,0395

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

Codice documento
SS0558_F0.doc

<i>Rev</i>	<i>Data</i>
F0	20/06/2011

Frame Text	Station m	OutputCase Text	M3 KN-m
23	1,87286	COMB3	22,2034
23	1,87286	COMB3	22,2034
23	1,97143	COMB3	21,3145
23	1,97143	COMB3	21,3145
23	2,07000	COMB3	20,3709
23	2,07000	COMB3	20,3709
23	2,16857	COMB3	19,3701
23	2,16857	COMB3	19,3701
23	2,26714	COMB3	18,3100
23	2,26714	COMB3	18,3100
23	2,36571	COMB3	17,1881
23	2,36571	COMB3	17,1881
23	2,46429	COMB3	16,0019
23	2,46429	COMB3	16,0019
23	2,56286	COMB3	14,7488
23	2,56286	COMB3	14,7488
23	2,66143	COMB3	13,4262
23	2,66143	COMB3	13,4262
23	2,76000	COMB3	12,0314
23	2,76000	COMB3	12,0314
23	2,85857	COMB3	10,5614
23	2,85857	COMB3	10,5614
23	2,95714	COMB3	9,0134
23	2,95714	COMB3	9,0134
23	3,05571	COMB3	7,3846
23	3,05571	COMB3	7,3846
23	3,15429	COMB3	5,6719
23	3,15429	COMB3	5,6719
23	3,25286	COMB3	3,8722
23	3,25286	COMB3	3,8722
23	3,35143	COMB3	1,9827
23	3,35143	COMB3	1,9827
23	3,45000	COMB3	8,947E-14
23	0,00000	COMB4	30,7735
23	0,09857	COMB4	30,6106
23	0,09857	COMB4	30,6106
23	0,19714	COMB4	30,4122
23	0,19714	COMB4	30,4122
23	0,29571	COMB4	30,1786
23	0,29571	COMB4	30,1786
23	0,39429	COMB4	29,9102
23	0,39429	COMB4	29,9102
23	0,49286	COMB4	29,6072
23	0,49286	COMB4	29,6072
23	0,59143	COMB4	29,2696
23	0,59143	COMB4	29,2696
23	0,69000	COMB4	28,8973
23	0,69000	COMB4	28,8973
23	0,78857	COMB4	28,4900
23	0,78857	COMB4	28,4900
23	0,88714	COMB4	28,0473
23	0,88714	COMB4	28,0473
23	0,98571	COMB4	27,5688
23	0,98571	COMB4	27,5688
23	1,08429	COMB4	27,0538
23	1,08429	COMB4	27,0538
23	1,18286	COMB4	26,5014
23	1,18286	COMB4	26,5014
23	1,28143	COMB4	25,9109
23	1,28143	COMB4	25,9109
23	1,38000	COMB4	25,2811
23	1,38000	COMB4	25,2811
23	1,47857	COMB4	24,6110

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

Codice documento
SS0558_F0.doc

<i>Rev</i>	<i>Data</i>
F0	20/06/2011

Frame Text	Station m	OutputCase Text	M3 KN-m
23	1,47857	COMB4	24,6110
23	1,57714	COMB4	23,8991
23	1,57714	COMB4	23,8991
23	1,67571	COMB4	23,1442
23	1,67571	COMB4	23,1442
23	1,77429	COMB4	22,3447
23	1,77429	COMB4	22,3447
23	1,87286	COMB4	21,4991
23	1,87286	COMB4	21,4991
23	1,97143	COMB4	20,6055
23	1,97143	COMB4	20,6055
23	2,07000	COMB4	19,6622
23	2,07000	COMB4	19,6622
23	2,16857	COMB4	18,6672
23	2,16857	COMB4	18,6672
23	2,26714	COMB4	17,6186
23	2,26714	COMB4	17,6186
23	2,36571	COMB4	16,5141
23	2,36571	COMB4	16,5141
23	2,46429	COMB4	15,3516
23	2,46429	COMB4	15,3516
23	2,56286	COMB4	14,1288
23	2,56286	COMB4	14,1288
23	2,66143	COMB4	12,8434
23	2,66143	COMB4	12,8434
23	2,76000	COMB4	11,4928
23	2,76000	COMB4	11,4928
23	2,85857	COMB4	10,0747
23	2,85857	COMB4	10,0747
23	2,95714	COMB4	8,5865
23	2,95714	COMB4	8,5865
23	3,05571	COMB4	7,0254
23	3,05571	COMB4	7,0254
23	3,15429	COMB4	5,3890
23	3,15429	COMB4	5,3890
23	3,25286	COMB4	3,6744
23	3,25286	COMB4	3,6744
23	3,35143	COMB4	1,8790
23	3,35143	COMB4	1,8790
23	3,45000	COMB4	9,463E-14
23	0,00000	COMB5	30,2673
23	0,09857	COMB5	30,165
23	0,09857	COMB5	30,165
23	0,19714	COMB5	30,0274
23	0,19714	COMB5	30,0274
23	0,29571	COMB5	29,8548
23	0,29571	COMB5	29,8548
23	0,39429	COMB5	29,6471
23	0,39429	COMB5	29,6471
23	0,49286	COMB5	29,4043
23	0,49286	COMB5	29,4043
23	0,59143	COMB5	29,126
23	0,59143	COMB5	29,126
23	0,69000	COMB5	28,8121
23	0,69000	COMB5	28,8121
23	0,78857	COMB5	28,4618
23	0,78857	COMB5	28,4618
23	0,88714	COMB5	28,0746
23	0,88714	COMB5	28,0746
23	0,98571	COMB5	27,6497
23	0,98571	COMB5	27,6497
23	1,08429	COMB5	27,1861
23	1,08429	COMB5	27,1861

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

Codice documento
SS0558_F0.doc

<i>Rev</i>	<i>Data</i>
F0	20/06/2011

Frame Text	Station m	OutputCase Text	M3 KN-m
23	1,18286	COMB5	26,6828
23	1,18286	COMB5	26,6828
23	1,28143	COMB5	26,1387
23	1,28143	COMB5	26,1387
23	1,38000	COMB5	25,5524
23	1,38000	COMB5	25,5524
23	1,47857	COMB5	24,9225
23	1,47857	COMB5	24,9225
23	1,57714	COMB5	24,2474
23	1,57714	COMB5	24,2474
23	1,67571	COMB5	23,5254
23	1,67571	COMB5	23,5254
23	1,77429	COMB5	22,7549
23	1,77429	COMB5	22,7549
23	1,87286	COMB5	21,9338
23	1,87286	COMB5	21,9338
23	1,97143	COMB5	21,0603
23	1,97143	COMB5	21,0603
23	2,07000	COMB5	20,132
23	2,07000	COMB5	20,132
23	2,16857	COMB5	19,147
23	2,16857	COMB5	19,147
23	2,26714	COMB5	18,1027
23	2,26714	COMB5	18,1027
23	2,36571	COMB5	16,9969
23	2,36571	COMB5	16,9969
23	2,46429	COMB5	15,827
23	2,46429	COMB5	15,827
23	2,56286	COMB5	14,5904
23	2,56286	COMB5	14,5904
23	2,66143	COMB5	13,2845
23	2,66143	COMB5	13,2845
23	2,76000	COMB5	11,9065
23	2,76000	COMB5	11,9065
23	2,85857	COMB5	10,4537
23	2,85857	COMB5	10,4537
23	2,95714	COMB5	8,9231
23	2,95714	COMB5	8,9231
23	3,05571	COMB5	7,3118
23	3,05571	COMB5	7,3118
23	3,15429	COMB5	5,6169
23	3,15429	COMB5	5,6169
23	3,25286	COMB5	3,8354
23	3,25286	COMB5	3,8354
23	3,35143	COMB5	1,9641
23	3,35143	COMB5	1,9641
23	3,45000	COMB5	7,831E-14
23	0,00000	COMB6	30,7735
23	0,09857	COMB6	30,6623
23	0,09857	COMB6	30,6623
23	0,19714	COMB6	30,5153
23	0,19714	COMB6	30,5153
23	0,29571	COMB6	30,3327
23	0,29571	COMB6	30,3327
23	0,39429	COMB6	30,1146
23	0,39429	COMB6	30,1146
23	0,49286	COMB6	29,8609
23	0,49286	COMB6	29,8609
23	0,59143	COMB6	29,5714
23	0,59143	COMB6	29,5714
23	0,69000	COMB6	29,2457
23	0,69000	COMB6	29,2457
23	0,78857	COMB6	28,8834

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

Codice documento
SS0558_F0.doc

<i>Rev</i>	<i>Data</i>
F0	20/06/2011

Frame Text	Station m	OutputCase Text	M3 KN-m
23	0,78857	COMB6	28,8834
23	0,88714	COMB6	28,4837
23	0,88714	COMB6	28,4837
23	0,98571	COMB6	28,0461
23	0,98571	COMB6	28,0461
23	1,08429	COMB6	27,5694
23	1,08429	COMB6	27,5694
23	1,18286	COMB6	27,0528
23	1,18286	COMB6	27,0528
23	1,28143	COMB6	26,4951
23	1,28143	COMB6	26,4951
23	1,38000	COMB6	25,8949
23	1,38000	COMB6	25,8949
23	1,47857	COMB6	25,2508
23	1,47857	COMB6	25,2508
23	1,57714	COMB6	24,5613
23	1,57714	COMB6	24,5613
23	1,67571	COMB6	23,8248
23	1,67571	COMB6	23,8248
23	1,77429	COMB6	23,0395
23	1,77429	COMB6	23,0395
23	1,87286	COMB6	22,2034
23	1,87286	COMB6	22,2034
23	1,97143	COMB6	21,3145
23	1,97143	COMB6	21,3145
23	2,07000	COMB6	20,3709
23	2,07000	COMB6	20,3709
23	2,16857	COMB6	19,3701
23	2,16857	COMB6	19,3701
23	2,26714	COMB6	18,3100
23	2,26714	COMB6	18,3100
23	2,36571	COMB6	17,1881
23	2,36571	COMB6	17,1881
23	2,46429	COMB6	16,0019
23	2,46429	COMB6	16,0019
23	2,56286	COMB6	14,7488
23	2,56286	COMB6	14,7488
23	2,66143	COMB6	13,4262
23	2,66143	COMB6	13,4262
23	2,76000	COMB6	12,0314
23	2,76000	COMB6	12,0314
23	2,85857	COMB6	10,5614
23	2,85857	COMB6	10,5614
23	2,95714	COMB6	9,0134
23	2,95714	COMB6	9,0134
23	3,05571	COMB6	7,3846
23	3,05571	COMB6	7,3846
23	3,15429	COMB6	5,6719
23	3,15429	COMB6	5,6719
23	3,25286	COMB6	3,8722
23	3,25286	COMB6	3,8722
23	3,35143	COMB6	1,9827
23	3,35143	COMB6	1,9827
23	3,45000	COMB6	8,947E-14
23	0,00000	COMB7	21,3279
23	0,09857	COMB7	21,2360
23	0,09857	COMB7	21,2360
23	0,19714	COMB7	21,1194
23	0,19714	COMB7	21,1194
23	0,29571	COMB7	20,9783
23	0,29571	COMB7	20,9783
23	0,39429	COMB7	20,8128
23	0,39429	COMB7	20,8128

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

Codice documento
SS0558_F0.doc

Rev
F0

Data
20/06/2011

Frame Text	Station m	OutputCase Text	M3 KN-m
23	0,49286	COMB7	20,6229
23	0,49286	COMB7	20,6229
23	0,59143	COMB7	20,4085
23	0,59143	COMB7	20,4085
23	0,69000	COMB7	20,1694
23	0,69000	COMB7	20,1694
23	0,78857	COMB7	19,9054
23	0,78857	COMB7	19,9054
23	0,88714	COMB7	19,6162
23	0,88714	COMB7	19,6162
23	0,98571	COMB7	19,3012
23	0,98571	COMB7	19,3012
23	1,08429	COMB7	18,9599
23	1,08429	COMB7	18,9599
23	1,18286	COMB7	18,5916
23	1,18286	COMB7	18,5916
23	1,28143	COMB7	18,1957
23	1,28143	COMB7	18,1957
23	1,38000	COMB7	17,7713
23	1,38000	COMB7	17,7713
23	1,47857	COMB7	17,3174
23	1,47857	COMB7	17,3174
23	1,57714	COMB7	16,8332
23	1,57714	COMB7	16,8332
23	1,67571	COMB7	16,3175
23	1,67571	COMB7	16,3175
23	1,77429	COMB7	15,7692
23	1,77429	COMB7	15,7692
23	1,87286	COMB7	15,1870
23	1,87286	COMB7	15,1870
23	1,97143	COMB7	14,5696
23	1,97143	COMB7	14,5696
23	2,07000	COMB7	13,9157
23	2,07000	COMB7	13,9157
23	2,16857	COMB7	13,2238
23	2,16857	COMB7	13,2238
23	2,26714	COMB7	12,4923
23	2,26714	COMB7	12,4923
23	2,36571	COMB7	11,7198
23	2,36571	COMB7	11,7198
23	2,46429	COMB7	10,9045
23	2,46429	COMB7	10,9045
23	2,56286	COMB7	10,0447
23	2,56286	COMB7	10,0447
23	2,66143	COMB7	9,1386
23	2,66143	COMB7	9,1386
23	2,76000	COMB7	8,1846
23	2,76000	COMB7	8,1846
23	2,85857	COMB7	7,1806
23	2,85857	COMB7	7,1806
23	2,95714	COMB7	6,1249
23	2,95714	COMB7	6,1249
23	3,05571	COMB7	5,0154
23	3,05571	COMB7	5,0154
23	3,15429	COMB7	3,8501
23	3,15429	COMB7	3,8501
23	3,25286	COMB7	2,6272
23	3,25286	COMB7	2,6272
23	3,35143	COMB7	1,3445
23	3,35143	COMB7	1,3445
23	3,45000	COMB7	6,034E-14
23	0,00000	COMB8	21,3279
23	0,09857	COMB8	21,2065

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

Codice documento
SS0558_F0.doc

Rev
F0

Data
20/06/2011

Frame Text	Station m	OutputCase Text	M3 KN-m
23	0,09857	COMB8	21,2065
23	0,19714	COMB8	21,0604
23	0,19714	COMB8	21,0604
23	0,29571	COMB8	20,8902
23	0,29571	COMB8	20,8902
23	0,39429	COMB8	20,6959
23	0,39429	COMB8	20,6959
23	0,49286	COMB8	20,4778
23	0,49286	COMB8	20,4778
23	0,59143	COMB8	20,2359
23	0,59143	COMB8	20,2359
23	0,69000	COMB8	19,9701
23	0,69000	COMB8	19,9701
23	0,78857	COMB8	19,6804
23	0,78857	COMB8	19,6804
23	0,88714	COMB8	19,3666
23	0,88714	COMB8	19,3666
23	0,98571	COMB8	19,0282
23	0,98571	COMB8	19,0282
23	1,08429	COMB8	18,6649
23	1,08429	COMB8	18,6649
23	1,18286	COMB8	18,2762
23	1,18286	COMB8	18,2762
23	1,28143	COMB8	17,8616
23	1,28143	COMB8	17,8616
23	1,38000	COMB8	17,4202
23	1,38000	COMB8	17,4202
23	1,47857	COMB8	16,9515
23	1,47857	COMB8	16,9515
23	1,57714	COMB8	16,4545
23	1,57714	COMB8	16,4545
23	1,67571	COMB8	15,9282
23	1,67571	COMB8	15,9282
23	1,77429	COMB8	15,3718
23	1,77429	COMB8	15,3718
23	1,87286	COMB8	14,7842
23	1,87286	COMB8	14,7842
23	1,97143	COMB8	14,1641
23	1,97143	COMB8	14,1641
23	2,07000	COMB8	13,5104
23	2,07000	COMB8	13,5104
23	2,16857	COMB8	12,8218
23	2,16857	COMB8	12,8218
23	2,26714	COMB8	12,0969
23	2,26714	COMB8	12,0969
23	2,36571	COMB8	11,3343
23	2,36571	COMB8	11,3343
23	2,46429	COMB8	10,5325
23	2,46429	COMB8	10,5325
23	2,56286	COMB8	9,6900
23	2,56286	COMB8	9,6900
23	2,66143	COMB8	8,8053
23	2,66143	COMB8	8,8053
23	2,76000	COMB8	7,8766
23	2,76000	COMB8	7,8766
23	2,85857	COMB8	6,9023
23	2,85857	COMB8	6,9023
23	2,95714	COMB8	5,8807
23	2,95714	COMB8	5,8807
23	3,05571	COMB8	4,8099
23	3,05571	COMB8	4,8099
23	3,15429	COMB8	3,6883
23	3,15429	COMB8	3,6883

Frame Text	Station m	OutputCase Text	M3 KN-m
23	3,25286	COMB8	2,5141
23	3,25286	COMB8	2,5141
23	3,35143	COMB8	1,2852
23	3,35143	COMB8	1,2852
23	3,45000	COMB8	5,699E-14
23	0,00000	COMB9	21,3279
23	0,09857	COMB9	21,2360
23	0,09857	COMB9	21,2360
23	0,19714	COMB9	21,1194
23	0,19714	COMB9	21,1194
23	0,29571	COMB9	20,9783
23	0,29571	COMB9	20,9783
23	0,39429	COMB9	20,8128
23	0,39429	COMB9	20,8128
23	0,49286	COMB9	20,6229
23	0,49286	COMB9	20,6229
23	0,59143	COMB9	20,4085
23	0,59143	COMB9	20,4085
23	0,69000	COMB9	20,1694
23	0,69000	COMB9	20,1694
23	0,78857	COMB9	19,9054
23	0,78857	COMB9	19,9054
23	0,88714	COMB9	19,6162
23	0,88714	COMB9	19,6162
23	0,98571	COMB9	19,3012
23	0,98571	COMB9	19,3012
23	1,08429	COMB9	18,9599
23	1,08429	COMB9	18,9599
23	1,18286	COMB9	18,5916
23	1,18286	COMB9	18,5916
23	1,28143	COMB9	18,1957
23	1,28143	COMB9	18,1957
23	1,38000	COMB9	17,7713
23	1,38000	COMB9	17,7713
23	1,47857	COMB9	17,3174
23	1,47857	COMB9	17,3174
23	1,57714	COMB9	16,8332
23	1,57714	COMB9	16,8332
23	1,67571	COMB9	16,3175
23	1,67571	COMB9	16,3175
23	1,77429	COMB9	15,7692
23	1,77429	COMB9	15,7692
23	1,87286	COMB9	15,1870
23	1,87286	COMB9	15,1870
23	1,97143	COMB9	14,5696
23	1,97143	COMB9	14,5696
23	2,07000	COMB9	13,9157
23	2,07000	COMB9	13,9157
23	2,16857	COMB9	13,2238
23	2,16857	COMB9	13,2238
23	2,26714	COMB9	12,4923
23	2,26714	COMB9	12,4923
23	2,36571	COMB9	11,7198
23	2,36571	COMB9	11,7198
23	2,46429	COMB9	10,9045
23	2,46429	COMB9	10,9045
23	2,56286	COMB9	10,0447
23	2,56286	COMB9	10,0447
23	2,66143	COMB9	9,1386
23	2,66143	COMB9	9,1386
23	2,76000	COMB9	8,1846
23	2,76000	COMB9	8,1846
23	2,85857	COMB9	7,1806

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

Codice documento
SS0558_F0.doc

<i>Rev</i>	<i>Data</i>
F0	20/06/2011

Frame Text	Station m	OutputCase Text	M3 KN-m
23	2,85857	COMB9	7,1806
23	2,95714	COMB9	6,1249
23	2,95714	COMB9	6,1249
23	3,05571	COMB9	5,0154
23	3,05571	COMB9	5,0154
23	3,15429	COMB9	3,8501
23	3,15429	COMB9	3,8501
23	3,25286	COMB9	2,6272
23	3,25286	COMB9	2,6272
23	3,35143	COMB9	1,3445
23	3,35143	COMB9	1,3445
23	3,45000	COMB9	6,425E-14
23	0,00000	COMB10	21,3279
23	0,09857	COMB10	21,1912
23	0,09857	COMB10	21,1912
23	0,19714	COMB10	21,0300
23	0,19714	COMB10	21,0300
23	0,29571	COMB10	20,8447
23	0,29571	COMB10	20,8447
23	0,39429	COMB10	20,6356
23	0,39429	COMB10	20,6356
23	0,49286	COMB10	20,4030
23	0,49286	COMB10	20,4030
23	0,59143	COMB10	20,1469
23	0,59143	COMB10	20,1469
23	0,69000	COMB10	19,8674
23	0,69000	COMB10	19,8674
23	0,78857	COMB10	19,5645
23	0,78857	COMB10	19,5645
23	0,88714	COMB10	19,2379
23	0,88714	COMB10	19,2379
23	0,98571	COMB10	18,8875
23	0,98571	COMB10	18,8875
23	1,08429	COMB10	18,5129
23	1,08429	COMB10	18,5129
23	1,18286	COMB10	18,1137
23	1,18286	COMB10	18,1137
23	1,28143	COMB10	17,6894
23	1,28143	COMB10	17,6894
23	1,38000	COMB10	17,2393
23	1,38000	COMB10	17,2393
23	1,47857	COMB10	16,7629
23	1,47857	COMB10	16,7629
23	1,57714	COMB10	16,2593
23	1,57714	COMB10	16,2593
23	1,67571	COMB10	15,7276
23	1,67571	COMB10	15,7276
23	1,77429	COMB10	15,1671
23	1,77429	COMB10	15,1671
23	1,87286	COMB10	14,5766
23	1,87286	COMB10	14,5766
23	1,97143	COMB10	13,9551
23	1,97143	COMB10	13,9551
23	2,07000	COMB10	13,3015
23	2,07000	COMB10	13,3015
23	2,16857	COMB10	12,6146
23	2,16857	COMB10	12,6146
23	2,26714	COMB10	11,8931
23	2,26714	COMB10	11,8931
23	2,36571	COMB10	11,1356
23	2,36571	COMB10	11,1356
23	2,46429	COMB10	10,3408
23	2,46429	COMB10	10,3408

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

Codice documento
SS0558_F0.doc

Rev
F0

Data
20/06/2011

Frame Text	Station m	OutputCase Text	M3 KN-m
23	2,56286	COMB10	9,5073
23	2,56286	COMB10	9,5073
23	2,66143	COMB10	8,6335
23	2,66143	COMB10	8,6335
23	2,76000	COMB10	7,7179
23	2,76000	COMB10	7,7179
23	2,85857	COMB10	6,7588
23	2,85857	COMB10	6,7588
23	2,95714	COMB10	5,7548
23	2,95714	COMB10	5,7548
23	3,05571	COMB10	4,7041
23	3,05571	COMB10	4,7041
23	3,15429	COMB10	3,6050
23	3,15429	COMB10	3,6050
23	3,25286	COMB10	2,4558
23	3,25286	COMB10	2,4558
23	3,35143	COMB10	1,2547
23	3,35143	COMB10	1,2547
23	3,45000	COMB10	6,872E-14
23	0,00000	COMB11	21,3279
23	0,09857	COMB11	21,2360
23	0,09857	COMB11	21,2360
23	0,19714	COMB11	21,1194
23	0,19714	COMB11	21,1194
23	0,29571	COMB11	20,9783
23	0,29571	COMB11	20,9783
23	0,39429	COMB11	20,8128
23	0,39429	COMB11	20,8128
23	0,49286	COMB11	20,6229
23	0,49286	COMB11	20,6229
23	0,59143	COMB11	20,4085
23	0,59143	COMB11	20,4085
23	0,69000	COMB11	20,1694
23	0,69000	COMB11	20,1694
23	0,78857	COMB11	19,9054
23	0,78857	COMB11	19,9054
23	0,88714	COMB11	19,6162
23	0,88714	COMB11	19,6162
23	0,98571	COMB11	19,3012
23	0,98571	COMB11	19,3012
23	1,08429	COMB11	18,9599
23	1,08429	COMB11	18,9599
23	1,18286	COMB11	18,5916
23	1,18286	COMB11	18,5916
23	1,28143	COMB11	18,1957
23	1,28143	COMB11	18,1957
23	1,38000	COMB11	17,7713
23	1,38000	COMB11	17,7713
23	1,47857	COMB11	17,3174
23	1,47857	COMB11	17,3174
23	1,57714	COMB11	16,8332
23	1,57714	COMB11	16,8332
23	1,67571	COMB11	16,3175
23	1,67571	COMB11	16,3175
23	1,77429	COMB11	15,7692
23	1,77429	COMB11	15,7692
23	1,87286	COMB11	15,1870
23	1,87286	COMB11	15,1870
23	1,97143	COMB11	14,5696
23	1,97143	COMB11	14,5696
23	2,07000	COMB11	13,9157
23	2,07000	COMB11	13,9157
23	2,16857	COMB11	13,2238

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

Codice documento
SS0558_F0.doc

Rev
F0

Data
20/06/2011

Frame Text	Station m	OutputCase Text	M3 KN-m
23	2,16857	COMB11	13,2238
23	2,26714	COMB11	12,4923
23	2,26714	COMB11	12,4923
23	2,36571	COMB11	11,7198
23	2,36571	COMB11	11,7198
23	2,46429	COMB11	10,9045
23	2,46429	COMB11	10,9045
23	2,56286	COMB11	10,0447
23	2,56286	COMB11	10,0447
23	2,66143	COMB11	9,1386
23	2,66143	COMB11	9,1386
23	2,76000	COMB11	8,1846
23	2,76000	COMB11	8,1846
23	2,85857	COMB11	7,1806
23	2,85857	COMB11	7,1806
23	2,95714	COMB11	6,1249
23	2,95714	COMB11	6,1249
23	3,05571	COMB11	5,0154
23	3,05571	COMB11	5,0154
23	3,15429	COMB11	3,8501
23	3,15429	COMB11	3,8501
23	3,25286	COMB11	2,6272
23	3,25286	COMB11	2,6272
23	3,35143	COMB11	1,3445
23	3,35143	COMB11	1,3445
23	3,45000	COMB11	6,425E-14
23	0,00000	COMB12	27,1186
23	0,09857	COMB12	27,0509
23	0,09857	COMB12	27,0509
23	0,19714	COMB12	26,9516
23	0,19714	COMB12	26,9516
23	0,29571	COMB12	26,8206
23	0,29571	COMB12	26,8206
23	0,39429	COMB12	26,6578
23	0,39429	COMB12	26,6578
23	0,49286	COMB12	26,4632
23	0,49286	COMB12	26,4632
23	0,59143	COMB12	26,2362
23	0,59143	COMB12	26,2362
23	0,69000	COMB12	25,9766
23	0,69000	COMB12	25,9766
23	0,78857	COMB12	25,6836
23	0,78857	COMB12	25,6836
23	0,88714	COMB12	25,3567
23	0,88714	COMB12	25,3567
23	0,98571	COMB12	24,9949
23	0,98571	COMB12	24,9949
23	1,08429	COMB12	24,5974
23	1,08429	COMB12	24,5974
23	1,18286	COMB12	24,1631
23	1,18286	COMB12	24,1631
23	1,28143	COMB12	23,6908
23	1,28143	COMB12	23,6908
23	1,38000	COMB12	23,1792
23	1,38000	COMB12	23,1792
23	1,47857	COMB12	22,6270
23	1,47857	COMB12	22,6270
23	1,57714	COMB12	22,0325
23	1,57714	COMB12	22,0325
23	1,67571	COMB12	21,3942
23	1,67571	COMB12	21,3942
23	1,77429	COMB12	20,7104
23	1,77429	COMB12	20,7104

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

Codice documento
SS0558_F0.doc

Rev
F0

Data
20/06/2011

Frame Text	Station m	OutputCase Text	M3 KN-m
23	1,87286	COMB12	19,9792
23	1,87286	COMB12	19,9792
23	1,97143	COMB12	19,1987
23	1,97143	COMB12	19,1987
23	2,07000	COMB12	18,3669
23	2,07000	COMB12	18,3669
23	2,16857	COMB12	17,4816
23	2,16857	COMB12	17,4816
23	2,26714	COMB12	16,5407
23	2,26714	COMB12	16,5407
23	2,36571	COMB12	15,5418
23	2,36571	COMB12	15,5418
23	2,46429	COMB12	14,4826
23	2,46429	COMB12	14,4826
23	2,56286	COMB12	13,3606
23	2,56286	COMB12	13,3606
23	2,66143	COMB12	12,1733
23	2,66143	COMB12	12,1733
23	2,76000	COMB12	10,9181
23	2,76000	COMB12	10,9181
23	2,85857	COMB12	9,5923
23	2,85857	COMB12	9,5923
23	2,95714	COMB12	8,1932
23	2,95714	COMB12	8,1932
23	3,05571	COMB12	6,7180
23	3,05571	COMB12	6,7180
23	3,15429	COMB12	5,1640
23	3,15429	COMB12	5,1640
23	3,25286	COMB12	3,5283
23	3,25286	COMB12	3,5283
23	3,35143	COMB12	1,8079
23	3,35143	COMB12	1,8079
23	3,45000	COMB12	7,627E-14
23	0,00000	COMB13	31,4122
23	0,09857	COMB13	31,3938
23	0,09857	COMB13	31,3938
23	0,19714	COMB13	31,3383
23	0,19714	COMB13	31,3383
23	0,29571	COMB13	31,2456
23	0,29571	COMB13	31,2456
23	0,39429	COMB13	31,1154
23	0,39429	COMB13	31,1154
23	0,49286	COMB13	30,9470
23	0,49286	COMB13	30,9470
23	0,59143	COMB13	30,7399
23	0,59143	COMB13	30,7399
23	0,69000	COMB13	30,4932
23	0,69000	COMB13	30,4932
23	0,78857	COMB13	30,2059
23	0,78857	COMB13	30,2059
23	0,88714	COMB13	29,8771
23	0,88714	COMB13	29,8771
23	0,98571	COMB13	29,5054
23	0,98571	COMB13	29,5054
23	1,08429	COMB13	29,0894
23	1,08429	COMB13	29,0894
23	1,18286	COMB13	28,6277
23	1,18286	COMB13	28,6277
23	1,28143	COMB13	28,1186
23	1,28143	COMB13	28,1186
23	1,38000	COMB13	27,5603
23	1,38000	COMB13	27,5603
23	1,47857	COMB13	26,9508

Frame Text	Station m	OutputCase Text	M3 KN-m
23	1,47857	COMB13	26,9508
23	1,57714	COMB13	26,2881
23	1,57714	COMB13	26,2881
23	1,67571	COMB13	25,5701
23	1,67571	COMB13	25,5701
23	1,77429	COMB13	24,7943
23	1,77429	COMB13	24,7943
23	1,87286	COMB13	23,9584
23	1,87286	COMB13	23,9584
23	1,97143	COMB13	23,0599
23	1,97143	COMB13	23,0599
23	2,07000	COMB13	22,0959
23	2,07000	COMB13	22,0959
23	2,16857	COMB13	21,0638
23	2,16857	COMB13	21,0638
23	2,26714	COMB13	19,9606
23	2,26714	COMB13	19,9606
23	2,36571	COMB13	18,7834
23	2,36571	COMB13	18,7834
23	2,46429	COMB13	17,5290
23	2,46429	COMB13	17,5290
23	2,56286	COMB13	16,1943
23	2,56286	COMB13	16,1943
23	2,66143	COMB13	14,7759
23	2,66143	COMB13	14,7759
23	2,76000	COMB13	13,2706
23	2,76000	COMB13	13,2706
23	2,85857	COMB13	11,6748
23	2,85857	COMB13	11,6748
23	2,95714	COMB13	9,9850
23	2,95714	COMB13	9,9850
23	3,05571	COMB13	8,1978
23	3,05571	COMB13	8,1978
23	3,15429	COMB13	6,3093
23	3,15429	COMB13	6,3093
23	3,25286	COMB13	4,3160
23	3,25286	COMB13	4,3160
23	3,35143	COMB13	2,2142
23	3,35143	COMB13	2,2142
23	3,45000	COMB13	1,010E-13
23	0,00000	COMB14	27,1186
23	0,09857	COMB14	27,0282
23	0,09857	COMB14	27,0282
23	0,19714	COMB14	26,9062
23	0,19714	COMB14	26,9062
23	0,29571	COMB14	26,7528
23	0,29571	COMB14	26,7528
23	0,39429	COMB14	26,5679
23	0,39429	COMB14	26,5679
23	0,49286	COMB14	26,3515
23	0,49286	COMB14	26,3515
23	0,59143	COMB14	26,1035
23	0,59143	COMB14	26,1035
23	0,69000	COMB14	25,8233
23	0,69000	COMB14	25,8233
23	0,78857	COMB14	25,5106
23	0,78857	COMB14	25,5106
23	0,88714	COMB14	25,1647
23	0,88714	COMB14	25,1647
23	0,98571	COMB14	24,7850
23	0,98571	COMB14	24,7850
23	1,08429	COMB14	24,3706
23	1,08429	COMB14	24,3706

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

Codice documento
SS0558_F0.doc

Rev
F0

Data
20/06/2011

Frame Text	Station m	OutputCase Text	M3 KN-m
23	1,18286	COMB14	23,9205
23	1,18286	COMB14	23,9205
23	1,28143	COMB14	23,4338
23	1,28143	COMB14	23,4338
23	1,38000	COMB14	22,9092
23	1,38000	COMB14	22,9092
23	1,47857	COMB14	22,3455
23	1,47857	COMB14	22,3455
23	1,57714	COMB14	21,7411
23	1,57714	COMB14	21,7411
23	1,67571	COMB14	21,0948
23	1,67571	COMB14	21,0948
23	1,77429	COMB14	20,4048
23	1,77429	COMB14	20,4048
23	1,87286	COMB14	19,6694
23	1,87286	COMB14	19,6694
23	1,97143	COMB14	18,8868
23	1,97143	COMB14	18,8868
23	2,07000	COMB14	18,0551
23	2,07000	COMB14	18,0551
23	2,16857	COMB14	17,1724
23	2,16857	COMB14	17,1724
23	2,26714	COMB14	16,2365
23	2,26714	COMB14	16,2365
23	2,36571	COMB14	15,2453
23	2,36571	COMB14	15,2453
23	2,46429	COMB14	14,1965
23	2,46429	COMB14	14,1965
23	2,56286	COMB14	13,0878
23	2,56286	COMB14	13,0878
23	2,66143	COMB14	11,9168
23	2,66143	COMB14	11,9168
23	2,76000	COMB14	10,6811
23	2,76000	COMB14	10,6811
23	2,85857	COMB14	9,3782
23	2,85857	COMB14	9,3782
23	2,95714	COMB14	8,0053
23	2,95714	COMB14	8,0053
23	3,05571	COMB14	6,5600
23	3,05571	COMB14	6,5600
23	3,15429	COMB14	5,0396
23	3,15429	COMB14	5,0396
23	3,25286	COMB14	3,4413
23	3,25286	COMB14	3,4413
23	3,35143	COMB14	1,7623
23	3,35143	COMB14	1,7623
23	3,45000	COMB14	7,369E-14
23	0,00000	COMB15	31,4122
23	0,09857	COMB15	31,3710
23	0,09857	COMB15	31,3710
23	0,19714	COMB15	31,2929
23	0,19714	COMB15	31,2929
23	0,29571	COMB15	31,1778
23	0,29571	COMB15	31,1778
23	0,39429	COMB15	31,0254
23	0,39429	COMB15	31,0254
23	0,49286	COMB15	30,8354
23	0,49286	COMB15	30,8354
23	0,59143	COMB15	30,6071
23	0,59143	COMB15	30,6071
23	0,69000	COMB15	30,3399
23	0,69000	COMB15	30,3399
23	0,78857	COMB15	30,0329

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

Codice documento
SS0558_F0.doc

Rev
F0

Data
20/06/2011

Frame Text	Station m	OutputCase Text	M3 KN-m
23	0,78857	COMB15	30,0329
23	0,88714	COMB15	29,6851
23	0,88714	COMB15	29,6851
23	0,98571	COMB15	29,2954
23	0,98571	COMB15	29,2954
23	1,08429	COMB15	28,8626
23	1,08429	COMB15	28,8626
23	1,18286	COMB15	28,3852
23	1,18286	COMB15	28,3852
23	1,28143	COMB15	27,8616
23	1,28143	COMB15	27,8616
23	1,38000	COMB15	27,2903
23	1,38000	COMB15	27,2903
23	1,47857	COMB15	26,6693
23	1,47857	COMB15	26,6693
23	1,57714	COMB15	25,9968
23	1,57714	COMB15	25,9968
23	1,67571	COMB15	25,2707
23	1,67571	COMB15	25,2707
23	1,77429	COMB15	24,4887
23	1,77429	COMB15	24,4887
23	1,87286	COMB15	23,6486
23	1,87286	COMB15	23,6486
23	1,97143	COMB15	22,7479
23	1,97143	COMB15	22,7479
23	2,07000	COMB15	21,7841
23	2,07000	COMB15	21,7841
23	2,16857	COMB15	20,7545
23	2,16857	COMB15	20,7545
23	2,26714	COMB15	19,6564
23	2,26714	COMB15	19,6564
23	2,36571	COMB15	18,4868
23	2,36571	COMB15	18,4868
23	2,46429	COMB15	17,2429
23	2,46429	COMB15	17,2429
23	2,56286	COMB15	15,9215
23	2,56286	COMB15	15,9215
23	2,66143	COMB15	14,5195
23	2,66143	COMB15	14,5195
23	2,76000	COMB15	13,0336
23	2,76000	COMB15	13,0336
23	2,85857	COMB15	11,4607
23	2,85857	COMB15	11,4607
23	2,95714	COMB15	9,7972
23	2,95714	COMB15	9,7972
23	3,05571	COMB15	8,0398
23	3,05571	COMB15	8,0398
23	3,15429	COMB15	6,1849
23	3,15429	COMB15	6,1849
23	3,25286	COMB15	4,2290
23	3,25286	COMB15	4,2290
23	3,35143	COMB15	2,1686
23	3,35143	COMB15	2,1686
23	3,45000	COMB15	9,842E-14
23	0,00000	COMB16	27,1186
23	0,09857	COMB16	27,0509
23	0,09857	COMB16	27,0509
23	0,19714	COMB16	26,9516
23	0,19714	COMB16	26,9516
23	0,29571	COMB16	26,8206
23	0,29571	COMB16	26,8206
23	0,39429	COMB16	26,6578
23	0,39429	COMB16	26,6578

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

Codice documento
SS0558_F0.doc

Rev
F0

Data
20/06/2011

Frame Text	Station m	OutputCase Text	M3 KN-m
23	0,49286	COMB16	26,4632
23	0,49286	COMB16	26,4632
23	0,59143	COMB16	26,2362
23	0,59143	COMB16	26,2362
23	0,69000	COMB16	25,9766
23	0,69000	COMB16	25,9766
23	0,78857	COMB16	25,6836
23	0,78857	COMB16	25,6836
23	0,88714	COMB16	25,3567
23	0,88714	COMB16	25,3567
23	0,98571	COMB16	24,9949
23	0,98571	COMB16	24,9949
23	1,08429	COMB16	24,5974
23	1,08429	COMB16	24,5974
23	1,18286	COMB16	24,1631
23	1,18286	COMB16	24,1631
23	1,28143	COMB16	23,6908
23	1,28143	COMB16	23,6908
23	1,38000	COMB16	23,1792
23	1,38000	COMB16	23,1792
23	1,47857	COMB16	22,6270
23	1,47857	COMB16	22,6270
23	1,57714	COMB16	22,0325
23	1,57714	COMB16	22,0325
23	1,67571	COMB16	21,3942
23	1,67571	COMB16	21,3942
23	1,77429	COMB16	20,7104
23	1,77429	COMB16	20,7104
23	1,87286	COMB16	19,9792
23	1,87286	COMB16	19,9792
23	1,97143	COMB16	19,1987
23	1,97143	COMB16	19,1987
23	2,07000	COMB16	18,3669
23	2,07000	COMB16	18,3669
23	2,16857	COMB16	17,4816
23	2,16857	COMB16	17,4816
23	2,26714	COMB16	16,5407
23	2,26714	COMB16	16,5407
23	2,36571	COMB16	15,5418
23	2,36571	COMB16	15,5418
23	2,46429	COMB16	14,4826
23	2,46429	COMB16	14,4826
23	2,56286	COMB16	13,3606
23	2,56286	COMB16	13,3606
23	2,66143	COMB16	12,1733
23	2,66143	COMB16	12,1733
23	2,76000	COMB16	10,9181
23	2,76000	COMB16	10,9181
23	2,85857	COMB16	9,5923
23	2,85857	COMB16	9,5923
23	2,95714	COMB16	8,1932
23	2,95714	COMB16	8,1932
23	3,05571	COMB16	6,7180
23	3,05571	COMB16	6,7180
23	3,15429	COMB16	5,1640
23	3,15429	COMB16	5,1640
23	3,25286	COMB16	3,5283
23	3,25286	COMB16	3,5283
23	3,35143	COMB16	1,8079
23	3,35143	COMB16	1,8079
23	3,45000	COMB16	7,927E-14
23	0,00000	COMB17	31,4122
23	0,09857	COMB17	31,3938

Frame Text	Station m	OutputCase Text	M3 KN-m
23	0,09857	COMB17	31,3938
23	0,19714	COMB17	31,3383
23	0,19714	COMB17	31,3383
23	0,29571	COMB17	31,2456
23	0,29571	COMB17	31,2456
23	0,39429	COMB17	31,1154
23	0,39429	COMB17	31,1154
23	0,49286	COMB17	30,9470
23	0,49286	COMB17	30,9470
23	0,59143	COMB17	30,7399
23	0,59143	COMB17	30,7399
23	0,69000	COMB17	30,4932
23	0,69000	COMB17	30,4932
23	0,78857	COMB17	30,2059
23	0,78857	COMB17	30,2059
23	0,88714	COMB17	29,8771
23	0,88714	COMB17	29,8771
23	0,98571	COMB17	29,5054
23	0,98571	COMB17	29,5054
23	1,08429	COMB17	29,0894
23	1,08429	COMB17	29,0894
23	1,18286	COMB17	28,6277
23	1,18286	COMB17	28,6277
23	1,28143	COMB17	28,1186
23	1,28143	COMB17	28,1186
23	1,38000	COMB17	27,5603
23	1,38000	COMB17	27,5603
23	1,47857	COMB17	26,9508
23	1,47857	COMB17	26,9508
23	1,57714	COMB17	26,2881
23	1,57714	COMB17	26,2881
23	1,67571	COMB17	25,5701
23	1,67571	COMB17	25,5701
23	1,77429	COMB17	24,7943
23	1,77429	COMB17	24,7943
23	1,87286	COMB17	23,9584
23	1,87286	COMB17	23,9584
23	1,97143	COMB17	23,0599
23	1,97143	COMB17	23,0599
23	2,07000	COMB17	22,0959
23	2,07000	COMB17	22,0959
23	2,16857	COMB17	21,0638
23	2,16857	COMB17	21,0638
23	2,26714	COMB17	19,9606
23	2,26714	COMB17	19,9606
23	2,36571	COMB17	18,7834
23	2,36571	COMB17	18,7834
23	2,46429	COMB17	17,5290
23	2,46429	COMB17	17,5290
23	2,56286	COMB17	16,1943
23	2,56286	COMB17	16,1943
23	2,66143	COMB17	14,7759
23	2,66143	COMB17	14,7759
23	2,76000	COMB17	13,2706
23	2,76000	COMB17	13,2706
23	2,85857	COMB17	11,6748
23	2,85857	COMB17	11,6748
23	2,95714	COMB17	9,9850
23	2,95714	COMB17	9,9850
23	3,05571	COMB17	8,1978
23	3,05571	COMB17	8,1978
23	3,15429	COMB17	6,3093
23	3,15429	COMB17	6,3093

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

Codice documento
SS0558_F0.doc

Rev
F0

Data
20/06/2011

Frame Text	Station m	OutputCase Text	M3 KN-m
23	3,25286	COMB17	4,3160
23	3,25286	COMB17	4,3160
23	3,35143	COMB17	2,2142
23	3,35143	COMB17	2,2142
23	3,45000	COMB17	1,040E-13
23	0,00000	COMB18	27,1186
23	0,09857	COMB18	27,0165
23	0,09857	COMB18	27,0165
23	0,19714	COMB18	26,8828
23	0,19714	COMB18	26,8828
23	0,29571	COMB18	26,7178
23	0,29571	COMB18	26,7178
23	0,39429	COMB18	26,5216
23	0,39429	COMB18	26,5216
23	0,49286	COMB18	26,2940
23	0,49286	COMB18	26,2940
23	0,59143	COMB18	26,0350
23	0,59143	COMB18	26,0350
23	0,69000	COMB18	25,7443
23	0,69000	COMB18	25,7443
23	0,78857	COMB18	25,4214
23	0,78857	COMB18	25,4214
23	0,88714	COMB18	25,0657
23	0,88714	COMB18	25,0657
23	0,98571	COMB18	24,6768
23	0,98571	COMB18	24,6768
23	1,08429	COMB18	24,2537
23	1,08429	COMB18	24,2537
23	1,18286	COMB18	23,7955
23	1,18286	COMB18	23,7955
23	1,28143	COMB18	23,3014
23	1,28143	COMB18	23,3014
23	1,38000	COMB18	22,7701
23	1,38000	COMB18	22,7701
23	1,47857	COMB18	22,2004
23	1,47857	COMB18	22,2004
23	1,57714	COMB18	21,5910
23	1,57714	COMB18	21,5910
23	1,67571	COMB18	20,9405
23	1,67571	COMB18	20,9405
23	1,77429	COMB18	20,2472
23	1,77429	COMB18	20,2472
23	1,87286	COMB18	19,5097
23	1,87286	COMB18	19,5097
23	1,97143	COMB18	18,7260
23	1,97143	COMB18	18,7260
23	2,07000	COMB18	17,8944
23	2,07000	COMB18	17,8944
23	2,16857	COMB18	17,0130
23	2,16857	COMB18	17,0130
23	2,26714	COMB18	16,0797
23	2,26714	COMB18	16,0797
23	2,36571	COMB18	15,0925
23	2,36571	COMB18	15,0925
23	2,46429	COMB18	14,0490
23	2,46429	COMB18	14,0490
23	2,56286	COMB18	12,9472
23	2,56286	COMB18	12,9472
23	2,66143	COMB18	11,7847
23	2,66143	COMB18	11,7847
23	2,76000	COMB18	10,5590
23	2,76000	COMB18	10,5590
23	2,85857	COMB18	9,2678

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

Codice documento
SS0558_F0.doc

<i>Rev</i>	<i>Data</i>
F0	20/06/2011

Frame Text	Station m	OutputCase Text	M3 KN-m
23	2,85857	COMB18	9,2678
23	2,95714	COMB18	7,9085
23	2,95714	COMB18	7,9085
23	3,05571	COMB18	6,4786
23	3,05571	COMB18	6,4786
23	3,15429	COMB18	4,9754
23	3,15429	COMB18	4,9754
23	3,25286	COMB18	3,3964
23	3,25286	COMB18	3,3964
23	3,35143	COMB18	1,7388
23	3,35143	COMB18	1,7388
23	3,45000	COMB18	8,272E-14
23	0,00000	COMB19	31,4122
23	0,09857	COMB19	31,3593
23	0,09857	COMB19	31,3593
23	0,19714	COMB19	31,2695
23	0,19714	COMB19	31,2695
23	0,29571	COMB19	31,1429
23	0,29571	COMB19	31,1429
23	0,39429	COMB19	30,9791
23	0,39429	COMB19	30,9791
23	0,49286	COMB19	30,7779
23	0,49286	COMB19	30,7779
23	0,59143	COMB19	30,5387
23	0,59143	COMB19	30,5387
23	0,69000	COMB19	30,2609
23	0,69000	COMB19	30,2609
23	0,78857	COMB19	29,9437
23	0,78857	COMB19	29,9437
23	0,88714	COMB19	29,5861
23	0,88714	COMB19	29,5861
23	0,98571	COMB19	29,1872
23	0,98571	COMB19	29,1872
23	1,08429	COMB19	28,7457
23	1,08429	COMB19	28,7457
23	1,18286	COMB19	28,2601
23	1,18286	COMB19	28,2601
23	1,28143	COMB19	27,7292
23	1,28143	COMB19	27,7292
23	1,38000	COMB19	27,1511
23	1,38000	COMB19	27,1511
23	1,47857	COMB19	26,5242
23	1,47857	COMB19	26,5242
23	1,57714	COMB19	25,8467
23	1,57714	COMB19	25,8467
23	1,67571	COMB19	25,1164
23	1,67571	COMB19	25,1164
23	1,77429	COMB19	24,3312
23	1,77429	COMB19	24,3312
23	1,87286	COMB19	23,4889
23	1,87286	COMB19	23,4889
23	1,97143	COMB19	22,5872
23	1,97143	COMB19	22,5872
23	2,07000	COMB19	21,6235
23	2,07000	COMB19	21,6235
23	2,16857	COMB19	20,5952
23	2,16857	COMB19	20,5952
23	2,26714	COMB19	19,4996
23	2,26714	COMB19	19,4996
23	2,36571	COMB19	18,3340
23	2,36571	COMB19	18,3340
23	2,46429	COMB19	17,0954
23	2,46429	COMB19	17,0954

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

Codice documento
SS0558_F0.doc

<i>Rev</i>	<i>Data</i>
F0	20/06/2011

Frame Text	Station m	OutputCase Text	M3 KN-m
23	2,56286	COMB19	15,7809
23	2,56286	COMB19	15,7809
23	2,66143	COMB19	14,3873
23	2,66143	COMB19	14,3873
23	2,76000	COMB19	12,9116
23	2,76000	COMB19	12,9116
23	2,85857	COMB19	11,3503
23	2,85857	COMB19	11,3503
23	2,95714	COMB19	9,7004
23	2,95714	COMB19	9,7004
23	3,05571	COMB19	7,9583
23	3,05571	COMB19	7,9583
23	3,15429	COMB19	6,1207
23	3,15429	COMB19	6,1207
23	3,25286	COMB19	4,1842
23	3,25286	COMB19	4,1842
23	3,35143	COMB19	2,1451
23	3,35143	COMB19	2,1451
23	3,45000	COMB19	1,074E-13
23	0,00000	COMB20	27,1186
23	0,09857	COMB20	27,0509
23	0,09857	COMB20	27,0509
23	0,19714	COMB20	26,9516
23	0,19714	COMB20	26,9516
23	0,29571	COMB20	26,8206
23	0,29571	COMB20	26,8206
23	0,39429	COMB20	26,6578
23	0,39429	COMB20	26,6578
23	0,49286	COMB20	26,4632
23	0,49286	COMB20	26,4632
23	0,59143	COMB20	26,2362
23	0,59143	COMB20	26,2362
23	0,69000	COMB20	25,9766
23	0,69000	COMB20	25,9766
23	0,78857	COMB20	25,6836
23	0,78857	COMB20	25,6836
23	0,88714	COMB20	25,3567
23	0,88714	COMB20	25,3567
23	0,98571	COMB20	24,9949
23	0,98571	COMB20	24,9949
23	1,08429	COMB20	24,5974
23	1,08429	COMB20	24,5974
23	1,18286	COMB20	24,1631
23	1,18286	COMB20	24,1631
23	1,28143	COMB20	23,6908
23	1,28143	COMB20	23,6908
23	1,38000	COMB20	23,1792
23	1,38000	COMB20	23,1792
23	1,47857	COMB20	22,6270
23	1,47857	COMB20	22,6270
23	1,57714	COMB20	22,0325
23	1,57714	COMB20	22,0325
23	1,67571	COMB20	21,3942
23	1,67571	COMB20	21,3942
23	1,77429	COMB20	20,7104
23	1,77429	COMB20	20,7104
23	1,87286	COMB20	19,9792
23	1,87286	COMB20	19,9792
23	1,97143	COMB20	19,1987
23	1,97143	COMB20	19,1987
23	2,07000	COMB20	18,3669
23	2,07000	COMB20	18,3669
23	2,16857	COMB20	17,4816

RELAZIONE DI CALCOLO SOTTOPASSO LATO NORD

Codice documento
SS0558_F0.doc

Rev
F0

Data
20/06/2011

Frame Text	Station m	OutputCase Text	M3 KN-m
23	2,16857	COMB20	17,4816
23	2,26714	COMB20	16,5407
23	2,26714	COMB20	16,5407
23	2,36571	COMB20	15,5418
23	2,36571	COMB20	15,5418
23	2,46429	COMB20	14,4826
23	2,46429	COMB20	14,4826
23	2,56286	COMB20	13,3606
23	2,56286	COMB20	13,3606
23	2,66143	COMB20	12,1733
23	2,66143	COMB20	12,1733
23	2,76000	COMB20	10,9181
23	2,76000	COMB20	10,9181
23	2,85857	COMB20	9,5923
23	2,85857	COMB20	9,5923
23	2,95714	COMB20	8,1932
23	2,95714	COMB20	8,1932
23	3,05571	COMB20	6,7180
23	3,05571	COMB20	6,7180
23	3,15429	COMB20	5,1640
23	3,15429	COMB20	5,1640
23	3,25286	COMB20	3,5283
23	3,25286	COMB20	3,5283
23	3,35143	COMB20	1,8079
23	3,35143	COMB20	1,8079
23	3,45000	COMB20	7,927E-14
23	0,00000	COMB21	31,4122
23	0,09857	COMB21	31,3938
23	0,09857	COMB21	31,3938
23	0,19714	COMB21	31,3383
23	0,19714	COMB21	31,3383
23	0,29571	COMB21	31,2456
23	0,29571	COMB21	31,2456
23	0,39429	COMB21	31,1154
23	0,39429	COMB21	31,1154
23	0,49286	COMB21	30,9470
23	0,49286	COMB21	30,9470
23	0,59143	COMB21	30,7399
23	0,59143	COMB21	30,7399
23	0,69000	COMB21	30,4932
23	0,69000	COMB21	30,4932
23	0,78857	COMB21	30,2059
23	0,78857	COMB21	30,2059
23	0,88714	COMB21	29,8771
23	0,88714	COMB21	29,8771
23	0,98571	COMB21	29,5054
23	0,98571	COMB21	29,5054
23	1,08429	COMB21	29,0894
23	1,08429	COMB21	29,0894
23	1,18286	COMB21	28,6277
23	1,18286	COMB21	28,6277
23	1,28143	COMB21	28,1186
23	1,28143	COMB21	28,1186
23	1,38000	COMB21	27,5603
23	1,38000	COMB21	27,5603
23	1,47857	COMB21	26,9508
23	1,47857	COMB21	26,9508
23	1,57714	COMB21	26,2881
23	1,57714	COMB21	26,2881
23	1,67571	COMB21	25,5701
23	1,67571	COMB21	25,5701
23	1,77429	COMB21	24,7943
23	1,77429	COMB21	24,7943

Frame Text	Station m	OutputCase Text	M3 KN-m
23	1,87286	COMB21	23,9584
23	1,87286	COMB21	23,9584
23	1,97143	COMB21	23,0599
23	1,97143	COMB21	23,0599
23	2,07000	COMB21	22,0959
23	2,07000	COMB21	22,0959
23	2,16857	COMB21	21,0638
23	2,16857	COMB21	21,0638
23	2,26714	COMB21	19,9606
23	2,26714	COMB21	19,9606
23	2,36571	COMB21	18,7834
23	2,36571	COMB21	18,7834
23	2,46429	COMB21	17,5290
23	2,46429	COMB21	17,5290
23	2,56286	COMB21	16,1943
23	2,56286	COMB21	16,1943
23	2,66143	COMB21	14,7759
23	2,66143	COMB21	14,7759
23	2,76000	COMB21	13,2706
23	2,76000	COMB21	13,2706
23	2,85857	COMB21	11,6748
23	2,85857	COMB21	11,6748
23	2,95714	COMB21	9,9850
23	2,95714	COMB21	9,9850
23	3,05571	COMB21	8,1978
23	3,05571	COMB21	8,1978
23	3,15429	COMB21	6,3093
23	3,15429	COMB21	6,3093
23	3,25286	COMB21	4,3160
23	3,25286	COMB21	4,3160
23	3,35143	COMB21	2,2142
23	3,35143	COMB21	2,2142
23	3,45000	COMB21	1,040E-13

Table: Joint Reactions

Joint Text	OutputCase Text	CaseType Text	U1 KN	U2 KN	U3 KN	R1 KN-m	R2 KN-m	R3 KN-m
7	COMB1	Combination	-3,224E-17	-63,387	868,577	101,2083	-2,301E-17	1,112E-16
7	COMB2	Combination	-4,425E-17	-113,337	894,455	178,5199	-3,144E-17	1,527E-16
7	COMB3	Combination	-3,224E-17	-41,472	868,577	67,9742	-2,301E-17	1,112E-16
7	COMB4	Combination	-5,044E-17	-117,162	907,791	185,1261	-3,579E-17	1,740E-16
7	COMB5	Combination	-3,077E-17	-58,934	580,139	94,5875	-2,083E-17	1,062E-16
7	COMB6	Combination	-3,224E-17	-105,915	868,577	165,7024	-2,301E-17	1,112E-16
7	COMB7	Combination	-2,746E-17	-53,162	708,724	84,9430	-1,960E-17	9,475E-17
7	COMB8	Combination	-3,787E-17	-96,452	731,151	151,9465	-2,691E-17	1,307E-16
7	COMB9	Combination	-2,746E-17	-34,169	708,724	56,1401	-1,960E-17	9,475E-17
7	COMB10	Combination	-4,323E-17	-99,768	742,709	157,6719	-3,068E-17	1,492E-16
7	COMB11	Combination	-2,746E-17	-90,020	708,724	140,8379	-1,960E-17	9,475E-17
7	COMB12	Combination	-1,791E-17	-33,827	601,946	54,2364	-1,278E-17	6,179E-17
7	COMB13	Combination	0,000	11,320	499,057	-16,5858	0,0000	0,0000
7	COMB14	Combination	-2,592E-17	-67,127	619,198	105,7775	-1,841E-17	8,941E-17
7	COMB15	Combination	-8,005E-18	-21,980	516,309	34,9553	-5,623E-18	2,762E-17
7	COMB16	Combination	-1,791E-17	-19,217	601,946	32,0803	-1,278E-17	6,179E-17
7	COMB17	Combination	0,000	25,930	499,057	-38,7419	0,0000	0,0000
7	COMB18	Combination	-3,004E-17	-69,678	628,089	110,1816	-2,130E-17	1,036E-16
7	COMB19	Combination	-1,213E-17	-24,531	525,199	39,3595	-8,520E-18	4,185E-17
7	COMB20	Combination	-1,791E-17	-62,180	601,946	97,2324	-1,278E-17	6,179E-17
7	COMB21	Combination	0,000	-17,033	499,057	26,4103	0,0000	0,0000
8	COMB1	Combination	3,224E-17	-119,150	727,347	183,9829	2,301E-17	1,112E-16
8	COMB2	Combination	4,425E-17	-147,836	701,469	229,0475	3,144E-17	1,527E-16
8	COMB3	Combination	3,224E-17	-141,065	727,347	217,2170	2,301E-17	1,112E-16

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Joint Text	OutputCase Text	CaseType Text	U1 KN	U2 KN	U3 KN	R1 KN-m	R2 KN-m	R3 KN-m
8	COMB4	Combination	5,044E-17	-184,534	688,133	285,5049	3,579E-17	1,740E-16
8	COMB5	Combination	3,077E-17	-185,416	451,926	288,4175	2,083E-17	1,062E-16
8	COMB6	Combination	3,224E-17	-76,622	727,347	119,4888	2,301E-17	1,112E-16
8	COMB7	Combination	2,746E-17	-102,332	588,417	157,9976	1,960E-17	9,475E-17
8	COMB8	Combination	3,787E-17	-127,193	565,989	197,0536	2,691E-17	1,307E-16
8	COMB9	Combination	2,746E-17	-121,325	588,417	186,8005	1,960E-17	9,475E-17
8	COMB10	Combination	4,323E-17	-158,998	554,432	245,9833	3,068E-17	1,492E-16
8	COMB11	Combination	2,746E-17	-65,474	588,417	102,1027	1,960E-17	9,475E-17
8	COMB12	Combination	1,791E-17	-67,582	523,485	104,2031	1,278E-17	6,179E-17
8	COMB13	Combination	0,000	-11,320	499,057	16,5858	0,0000	0,0000
8	COMB14	Combination	2,592E-17	-86,706	506,233	134,2462	1,841E-17	8,941E-17
8	COMB15	Combination	8,005E-18	-30,444	481,805	46,6289	5,623E-18	2,762E-17
8	COMB16	Combination	1,791E-17	-82,192	523,485	126,3592	1,278E-17	6,179E-17
8	COMB17	Combination	0,000	-25,930	499,057	38,7419	0,0000	0,0000
8	COMB18	Combination	3,004E-17	-111,171	497,343	171,8845	2,130E-17	1,036E-16
8	COMB19	Combination	1,213E-17	-54,909	472,915	84,2671	8,520E-18	4,185E-17
8	COMB20	Combination	1,791E-17	-39,230	523,485	61,2071	1,278E-17	6,179E-17
8	COMB21	Combination	0,000	17,033	499,057	-26,4103	0,0000	0,0000