



**REGIONE PIEMONTE  
PROVINCIA di TORINO  
COMUNE di SCALENGHE**

**PROGETTO ESECUTIVO**

**Oggetto: Comune di Scalenghe  
Completamento dei lavori di regimazione acque a protezione dell'abitato  
(tratto via Santa Caterina - strada Barattina)  
CIG 67848760CD - CUP F78G11000200006**

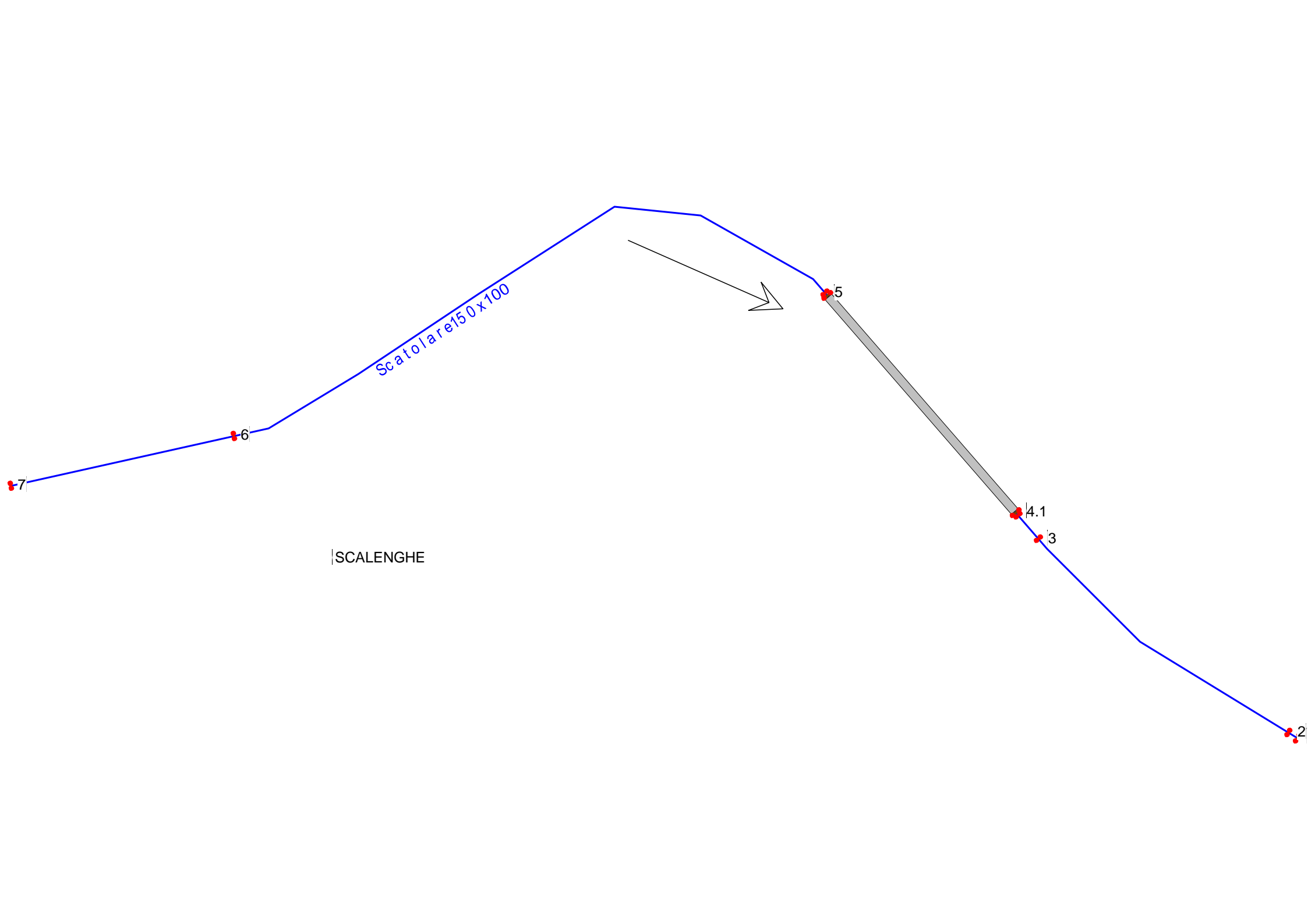
**ALLEGATI ALLA RELAZIONE IDRAULICA**

Rev.	Data	Redazione	Verifica	Autorizzazione	Modifiche
1	Settembre 2016				

	<b><u>Il Progettista:</u></b> <b>Benedetto ing. Giovanni,</b> via Madonna del Rosario 5 – 10019 – Strambino tel/fax 0125 713367 cell. 339 7021999 e-mail <a href="mailto:giovanbenedetto@gmail.com">giovanbenedetto@gmail.com</a> <a href="http://www.studiobenedetto.com">www.studiobenedetto.com</a>	
	Allegato n.	Elaborato n.  <b>02</b>

## **SIMULAZIONE 1:**

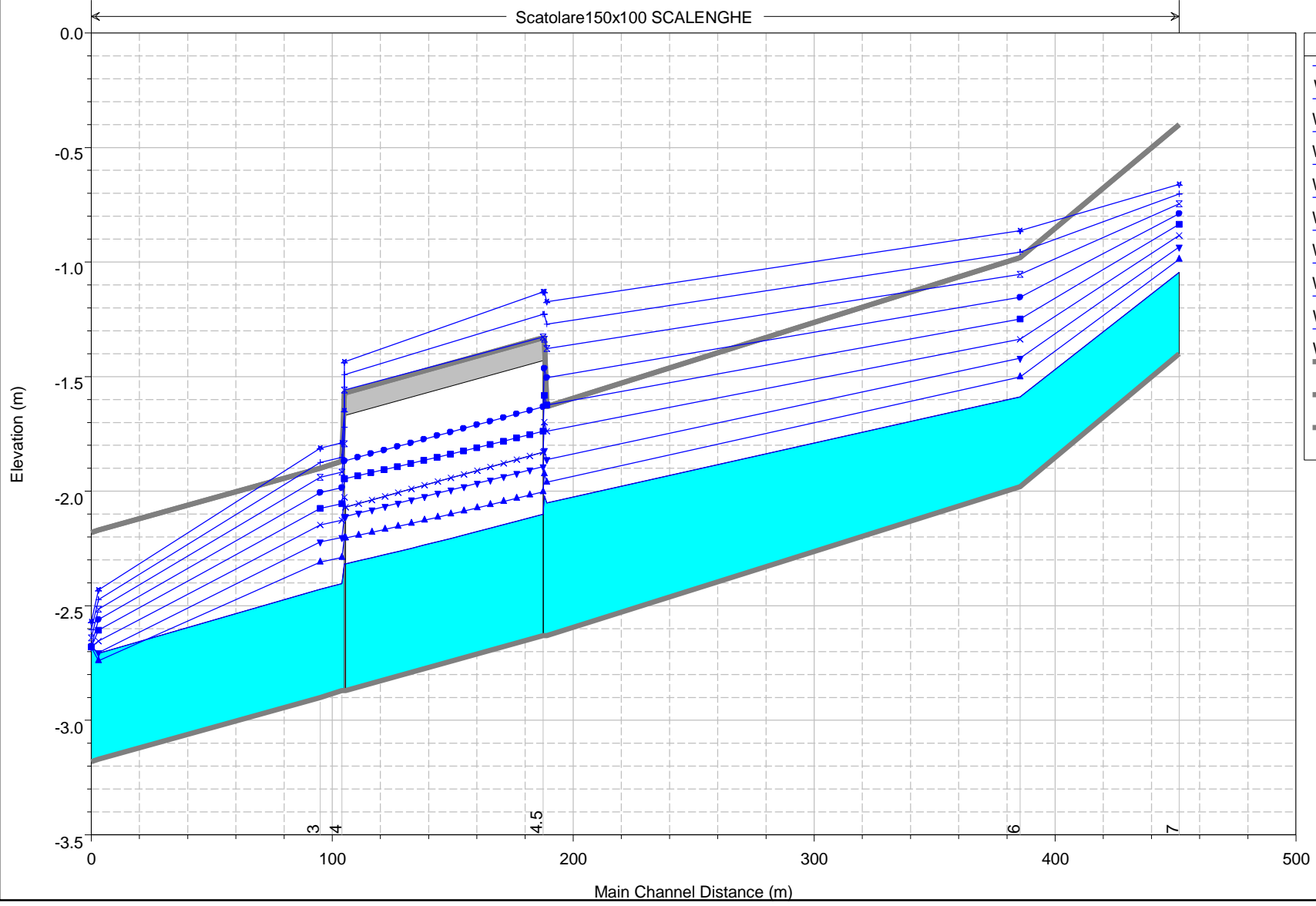
- **Altezza d'acqua nella sezione di valle pari al 50% di riempimento.**
- **Portate variabile tra 1 e 3 m<sup>3</sup>/s**



Scatolare 150x100

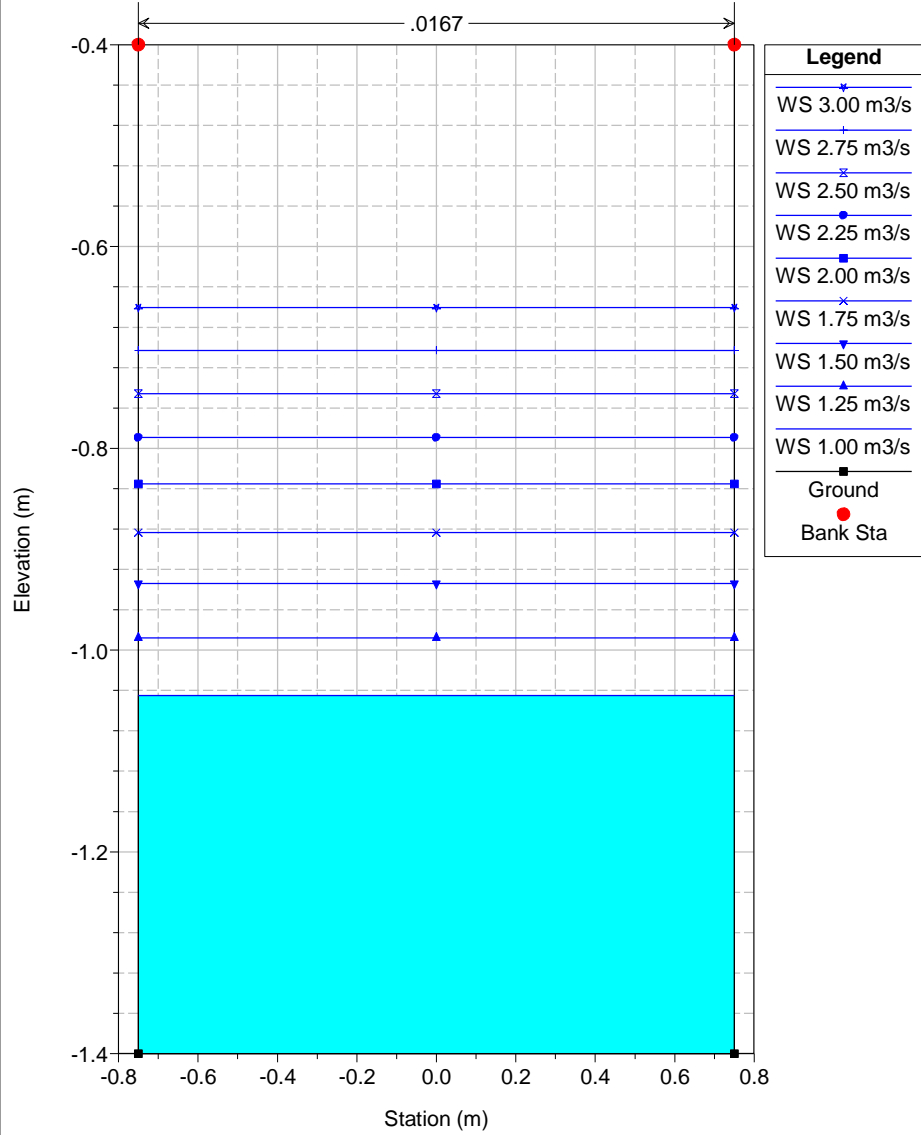
SCALENGHE

Scatolare150x100 SCALENGHE

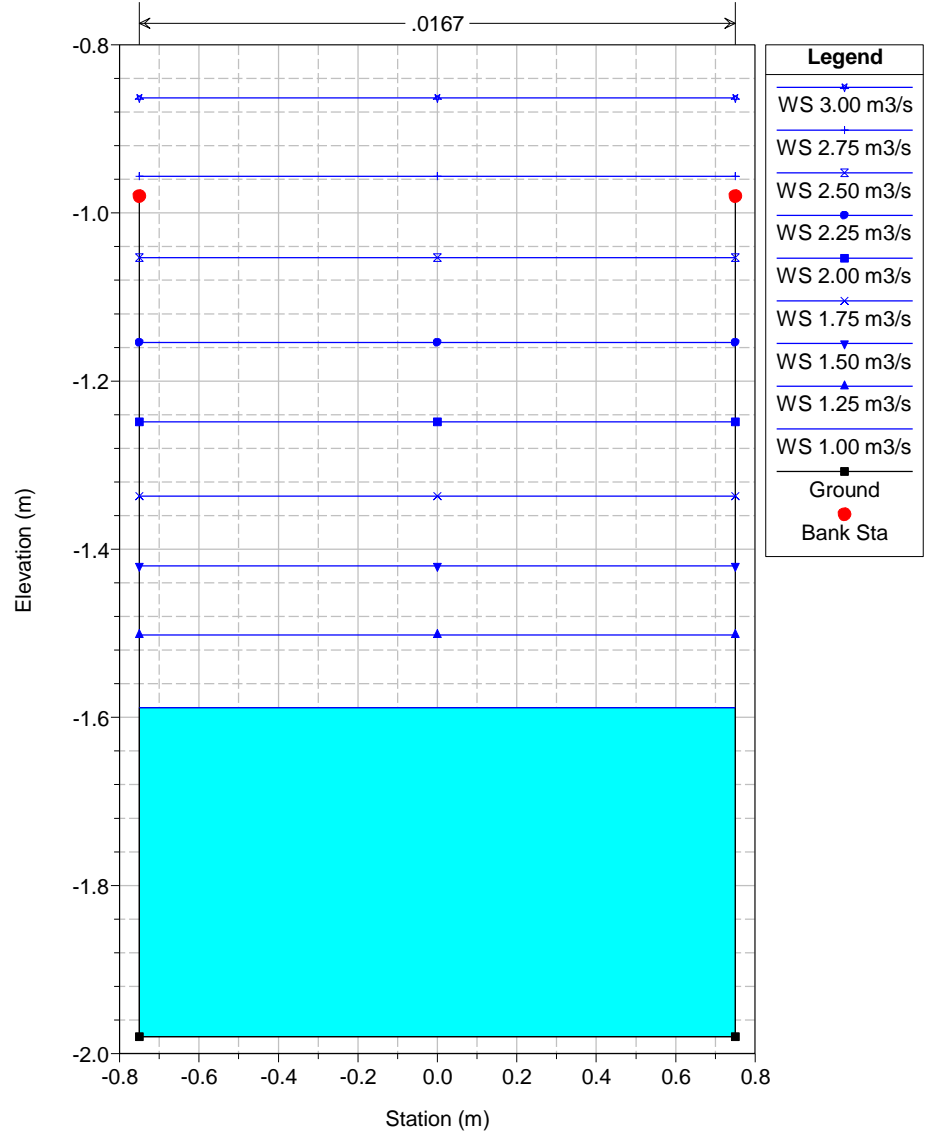


Legend	
WS 3.00 m3/s	Blue line with asterisk markers
WS 2.75 m3/s	Blue line with plus markers
WS 2.50 m3/s	Blue line with square markers
WS 2.25 m3/s	Blue line with diamond markers
WS 2.00 m3/s	Blue line with cross markers
WS 1.75 m3/s	Blue line with downward triangle markers
WS 1.50 m3/s	Blue line with upward triangle markers
WS 1.25 m3/s	Blue line with diamond markers
WS 1.00 m3/s	Blue line with asterisk markers
Ground	Thick grey line
LOB	Thin grey line
ROB	Thin grey line

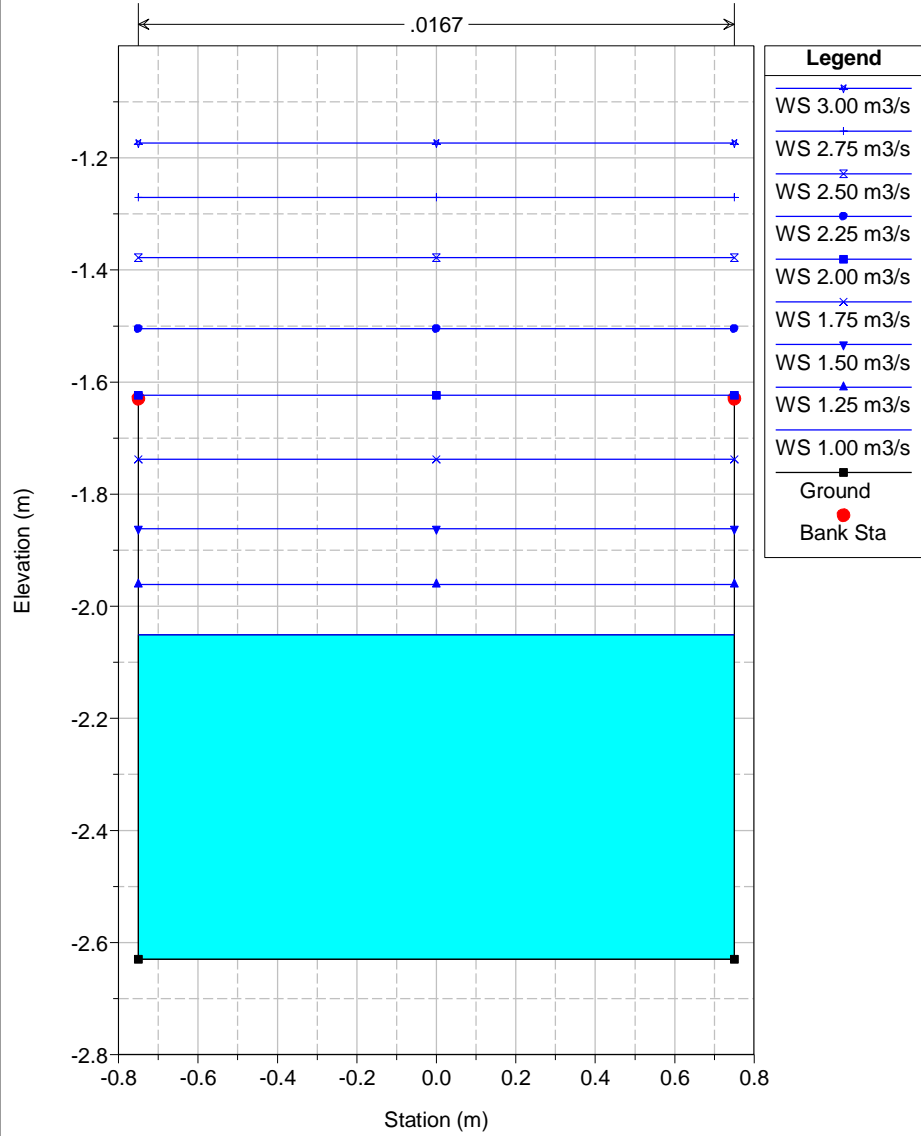
RS = 7



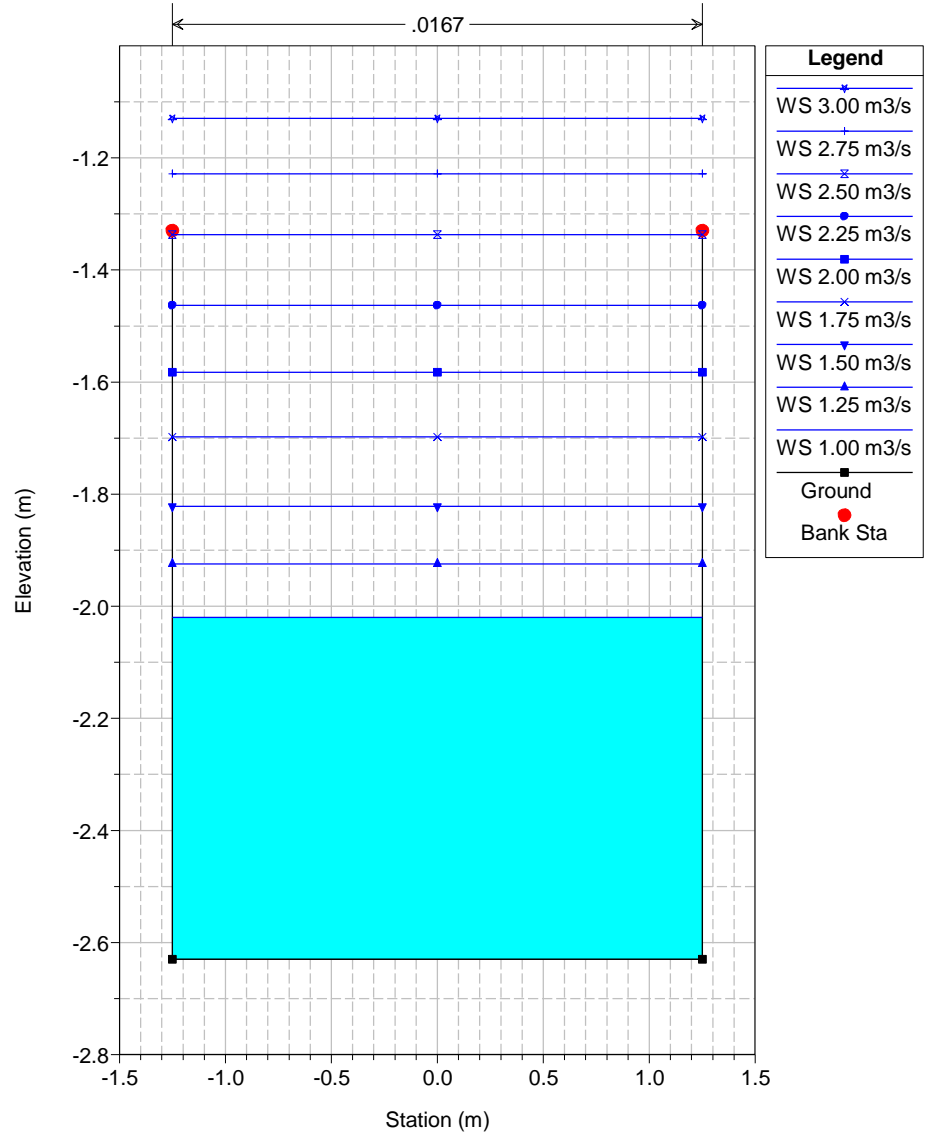
RS = 6



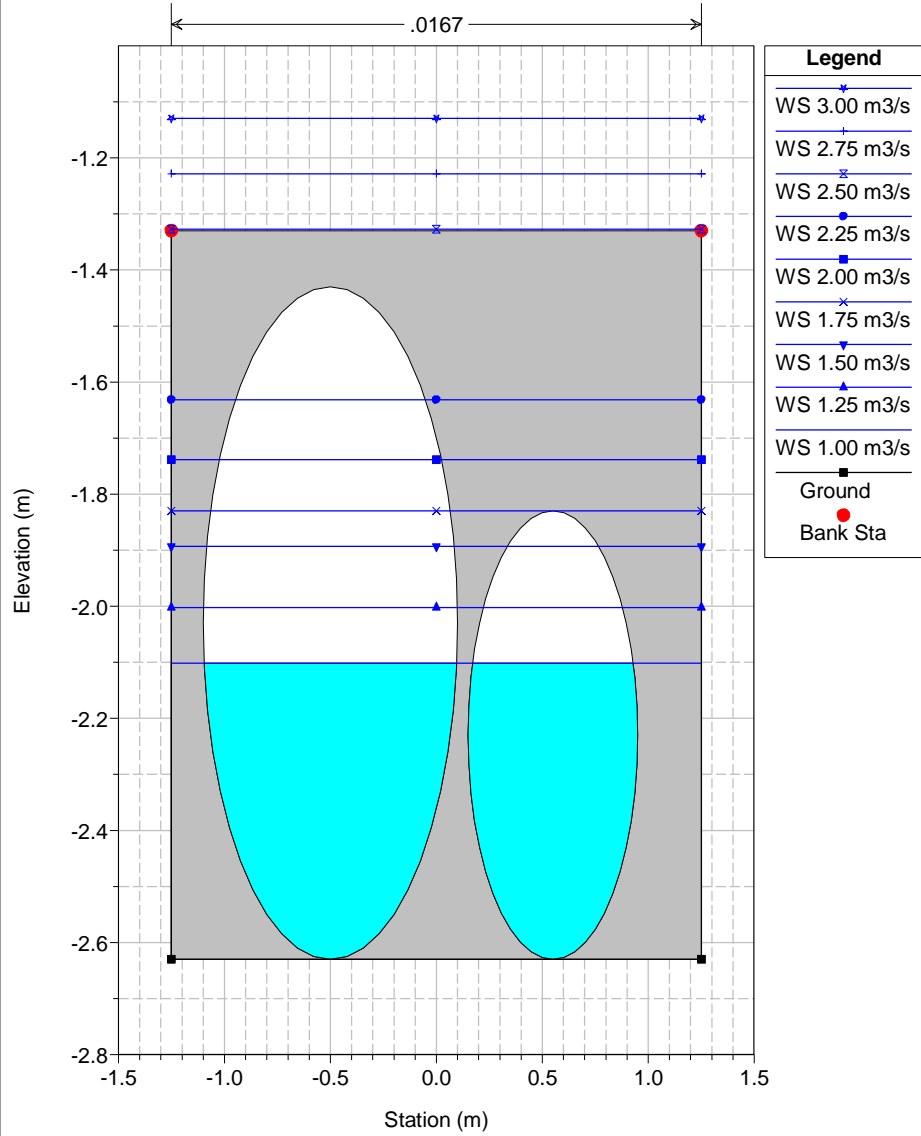
RS = 5



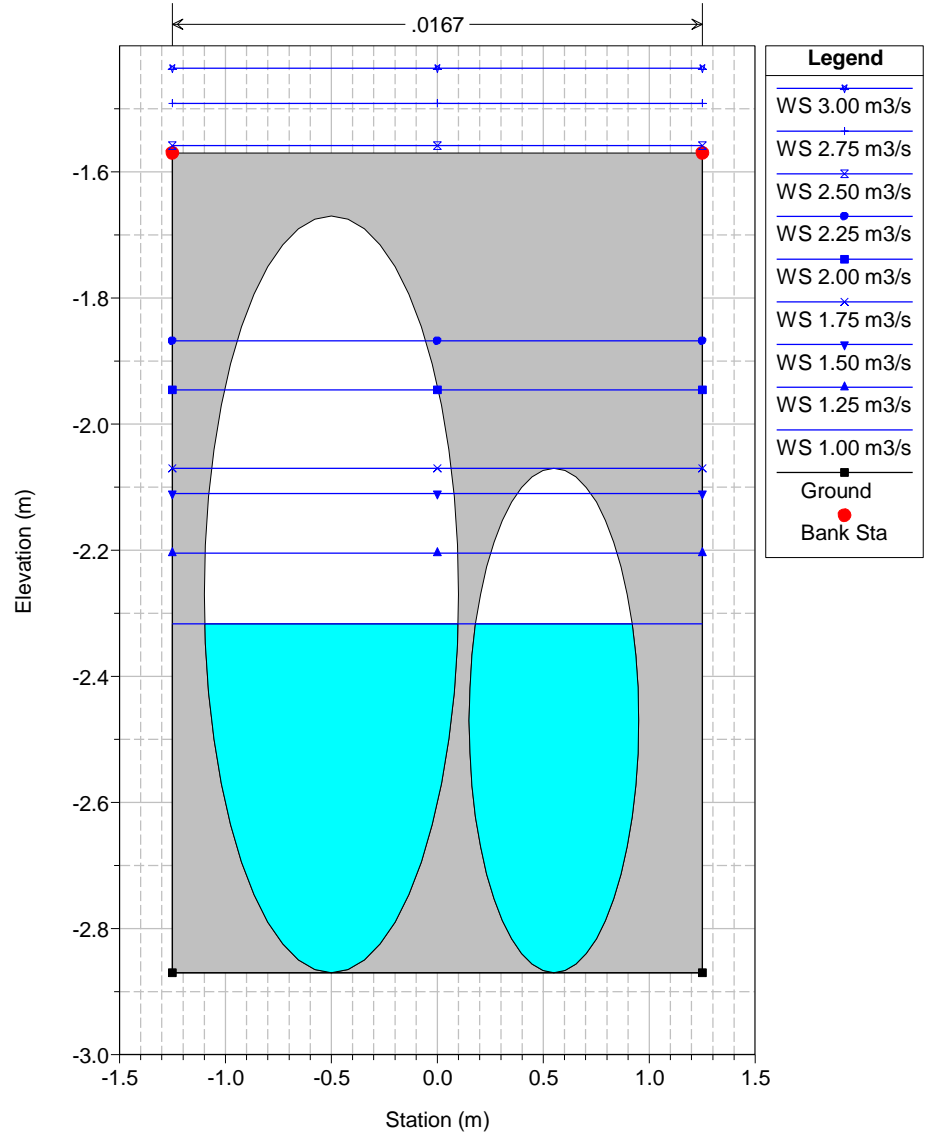
RS = 4.9



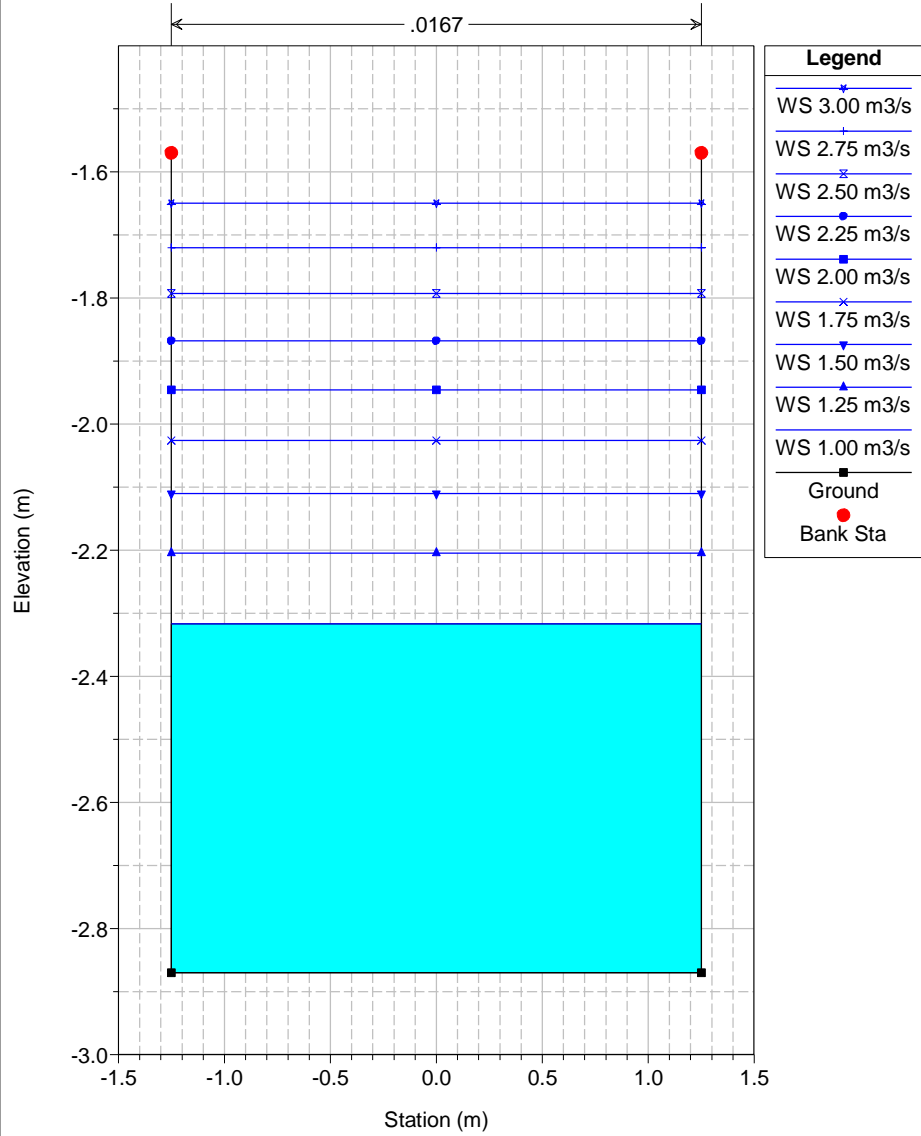
RS = 4.5 Culv



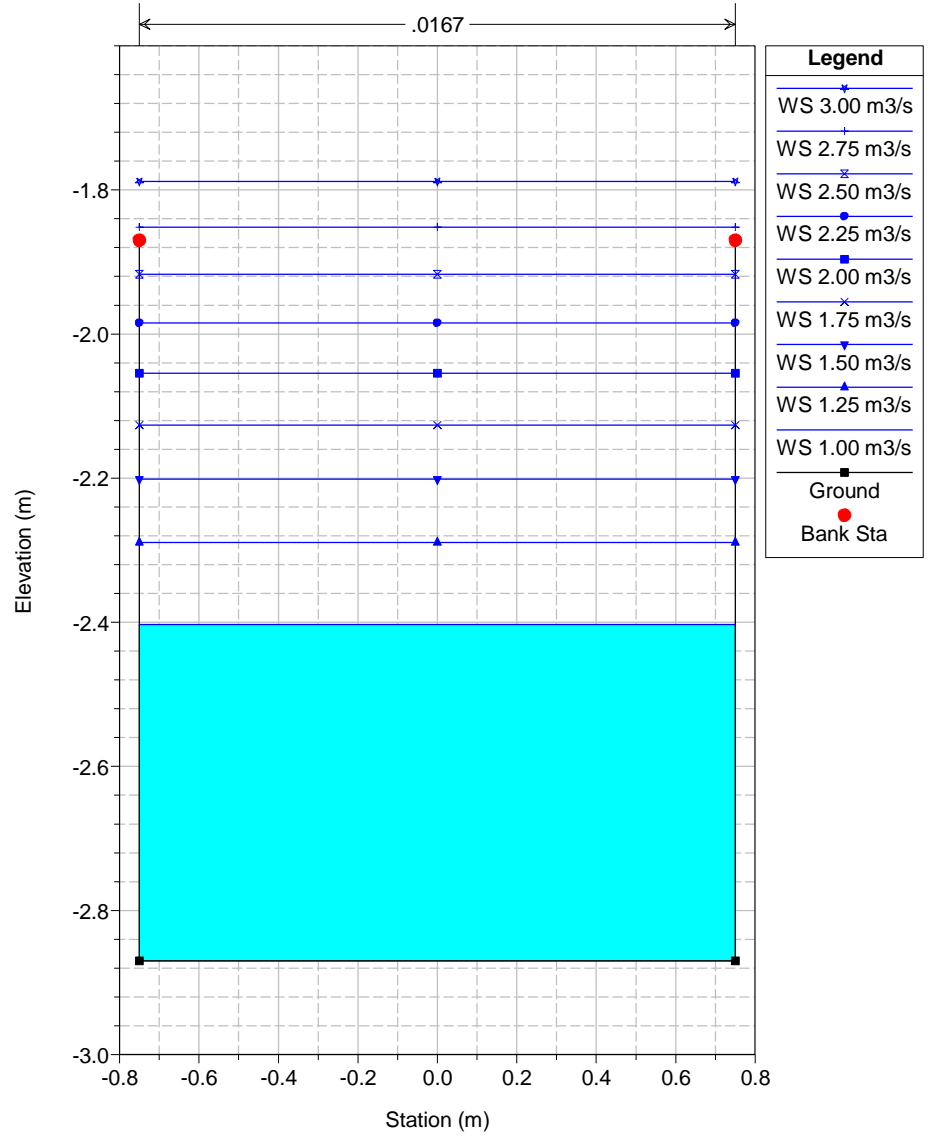
RS = 4.5 Culv



RS = 4.1

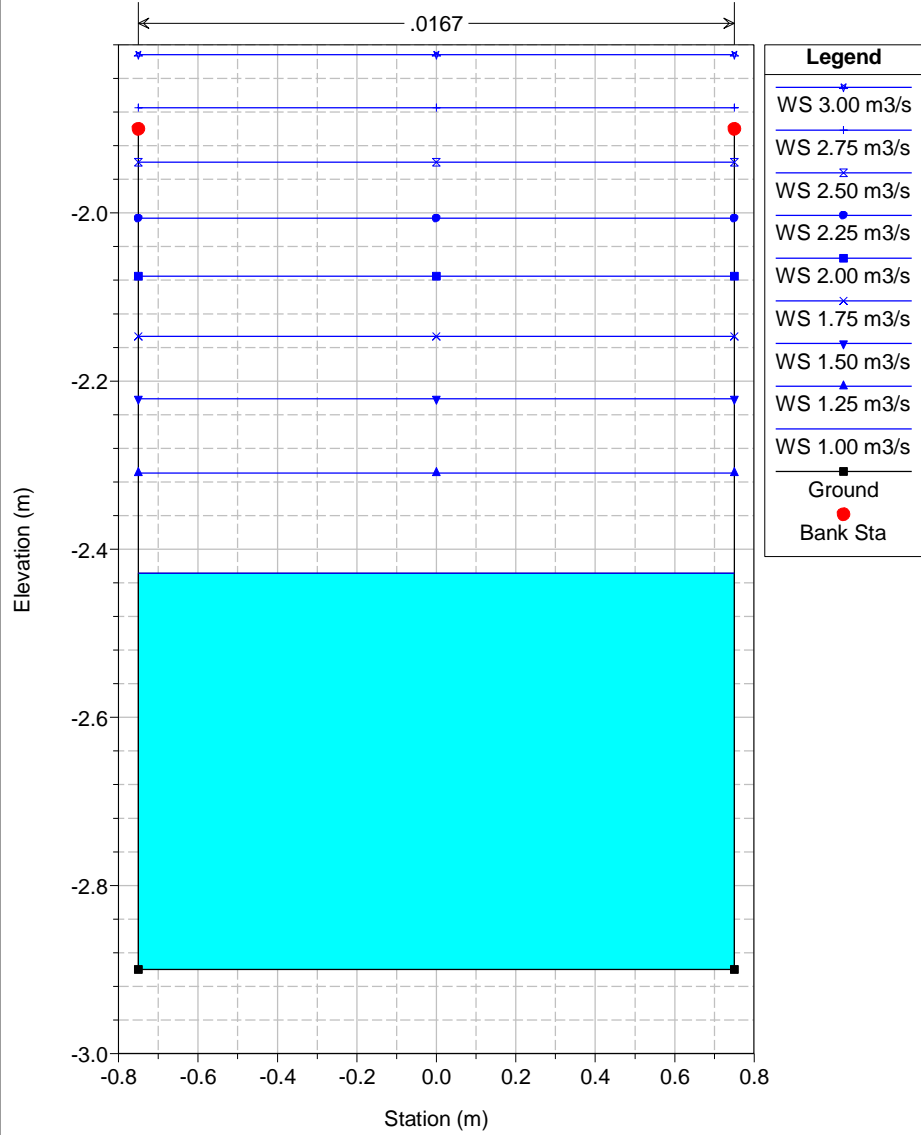


RS = 4

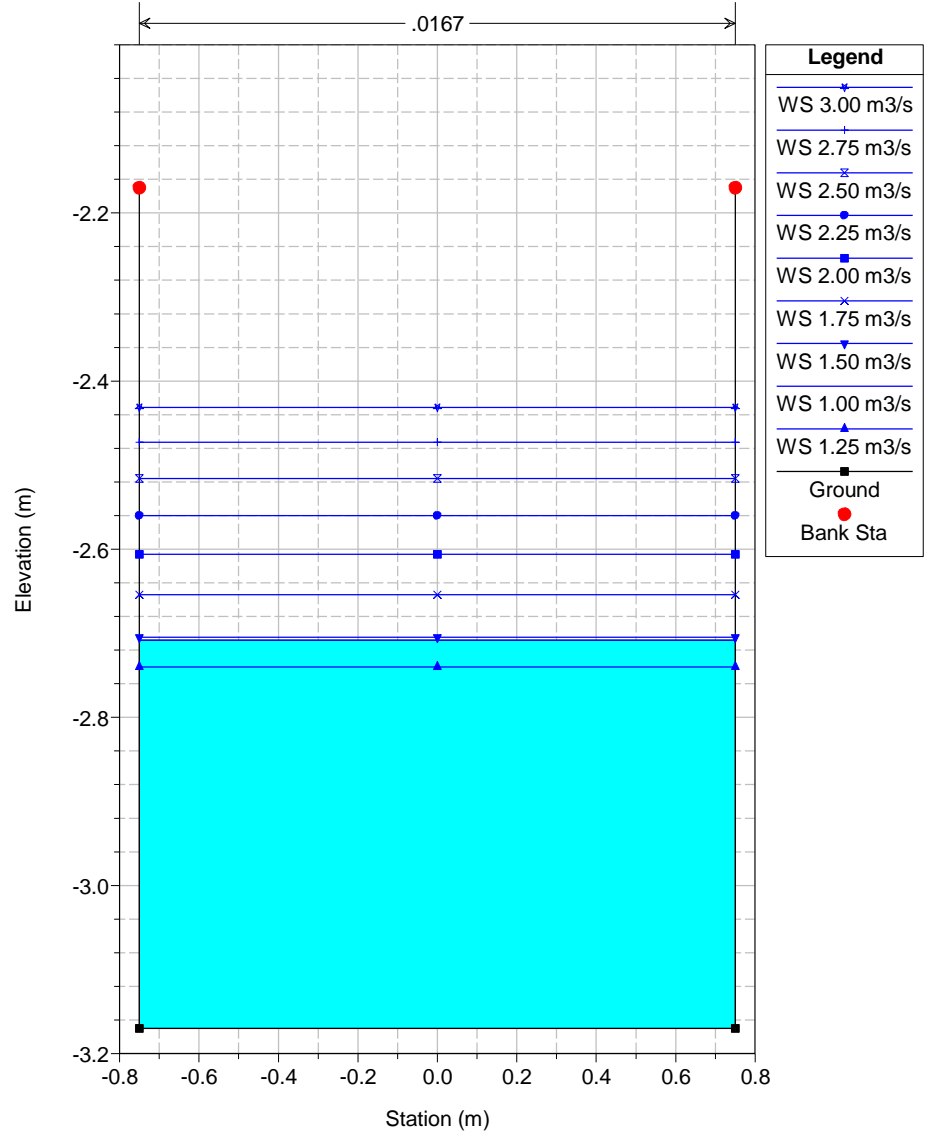




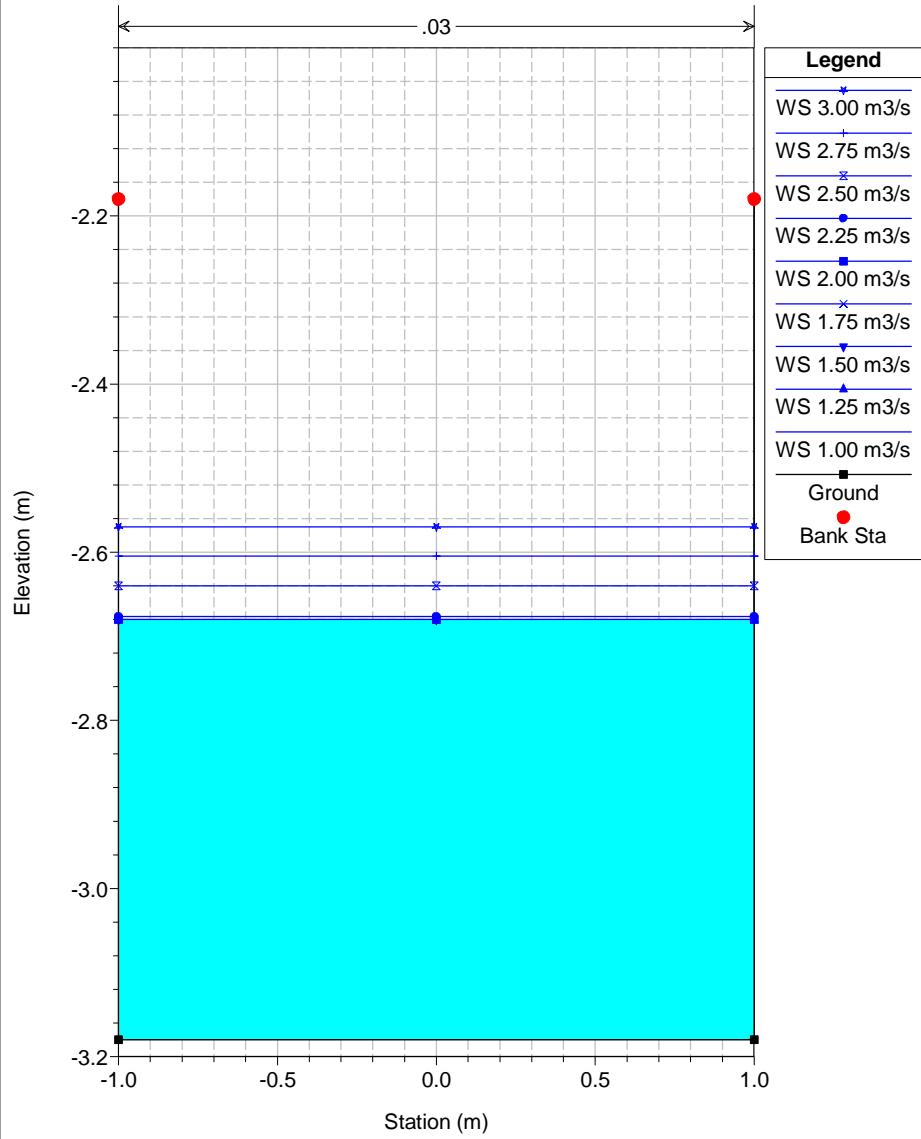
RS = 3



RS = 2



RS = 1



HEC-RAS Plan: 50% 80+120 River: Scatolare150x100 Reach: SCALENGHE

Reach	River Sta	Profile	Q Total (m3/s)	Min Ch El (m)	W.S. Elev (m)	Crit W.S. (m)	E.G. Elev (m)	E.G. Slope (m/m)	Vel Chnl (m/s)	Flow Area (m2)	Top Width (m)	Froude # Chl
SCALENGHE	7	1.00 m3/s	1.00	-1.40	-1.05	-1.05	-0.87	0.006568	1.88	0.53	1.50	1.01
SCALENGHE	7	1.25 m3/s	1.25	-1.40	-0.99	-0.99	-0.78	0.006667	2.02	0.62	1.50	1.01
SCALENGHE	7	1.50 m3/s	1.50	-1.40	-0.93	-0.93	-0.70	0.006769	2.15	0.70	1.50	1.00
SCALENGHE	7	1.75 m3/s	1.75	-1.40	-0.88	-0.88	-0.62	0.006905	2.26	0.77	1.50	1.00
SCALENGHE	7	2.00 m3/s	2.00	-1.40	-0.84	-0.84	-0.55	0.007044	2.36	0.85	1.50	1.00
SCALENGHE	7	2.25 m3/s	2.25	-1.40	-0.79	-0.79	-0.48	0.007185	2.46	0.92	1.50	1.00
SCALENGHE	7	2.50 m3/s	2.50	-1.40	-0.75	-0.75	-0.42	0.007351	2.55	0.98	1.50	1.01
SCALENGHE	7	2.75 m3/s	2.75	-1.40	-0.70	-0.70	-0.35	0.007496	2.63	1.05	1.50	1.01
SCALENGHE	7	3.00 m3/s	3.00	-1.40	-0.66	-0.66	-0.29	0.007615	2.70	1.11	1.50	1.00
SCALENGHE	6	1.00 m3/s	1.00	-1.98	-1.59	-1.62	-1.44	0.004940	1.70	0.59	1.50	0.87
SCALENGHE	6	1.25 m3/s	1.25	-1.98	-1.50		-1.35	0.004372	1.74	0.72	1.50	0.80
SCALENGHE	6	1.50 m3/s	1.50	-1.98	-1.42		-1.26	0.004048	1.78	0.84	1.50	0.76
SCALENGHE	6	1.75 m3/s	1.75	-1.98	-1.34		-1.17	0.003774	1.81	0.96	1.50	0.72
SCALENGHE	6	2.00 m3/s	2.00	-1.98	-1.25		-1.08	0.003481	1.82	1.10	1.50	0.68
SCALENGHE	6	2.25 m3/s	2.25	-1.98	-1.15		-0.99	0.003193	1.82	1.24	1.50	0.64
SCALENGHE	6	2.50 m3/s	2.50	-1.98	-1.05		-0.89	0.002917	1.80	1.39	1.50	0.60
SCALENGHE	6	2.75 m3/s	2.75	-1.98	-0.96		-0.79	0.002732	1.79	1.54	1.50	0.57
SCALENGHE	6	3.00 m3/s	3.00	-1.98	-0.86		-0.70	0.002603	1.79	1.68	1.50	0.54
SCALENGHE	5	1.00 m3/s	1.00	-2.63	-2.05		-1.98	0.001641	1.15	0.87	1.50	0.48
SCALENGHE	5	1.25 m3/s	1.25	-2.63	-1.96		-1.88	0.001731	1.25	1.00	1.50	0.49
SCALENGHE	5	1.50 m3/s	1.50	-2.63	-1.86		-1.78	0.001719	1.30	1.15	1.50	0.47
SCALENGHE	5	1.75 m3/s	1.75	-2.63	-1.74		-1.65	0.001578	1.31	1.34	1.50	0.44
SCALENGHE	5	2.00 m3/s	2.00	-2.63	-1.62		-1.53	0.001509	1.32	1.51	1.50	0.42
SCALENGHE	5	2.25 m3/s	2.25	-2.63	-1.50		-1.41	0.001436	1.33	1.69	1.50	0.40
SCALENGHE	5	2.50 m3/s	2.50	-2.63	-1.38		-1.29	0.001355	1.33	1.88	1.50	0.38
SCALENGHE	5	2.75 m3/s	2.75	-2.63	-1.27		-1.18	0.001337	1.35	2.04	1.50	0.37
SCALENGHE	5	3.00 m3/s	3.00	-2.63	-1.17		-1.08	0.001342	1.37	2.19	1.50	0.36
SCALENGHE	4.9	1.00 m3/s	1.00	-2.63	-2.02	-2.38	-2.00	0.000393	0.66	1.53	2.50	0.27
SCALENGHE	4.9	1.25 m3/s	1.25	-2.63	-1.92	-2.34	-1.90	0.000405	0.71	1.76	2.50	0.27
SCALENGHE	4.9	1.50 m3/s	1.50	-2.63	-1.82	-2.30	-1.79	0.000397	0.74	2.02	2.50	0.26
SCALENGHE	4.9	1.75 m3/s	1.75	-2.63	-1.70	-2.26	-1.67	0.000363	0.75	2.33	2.50	0.25
SCALENGHE	4.9	2.00 m3/s	2.00	-2.63	-1.58	-2.23	-1.55	0.000344	0.76	2.62	2.50	0.24

HEC-RAS Plan: 50% 80+120 River: Scatolare150x100 Reach: SCALENGHE (Continued)

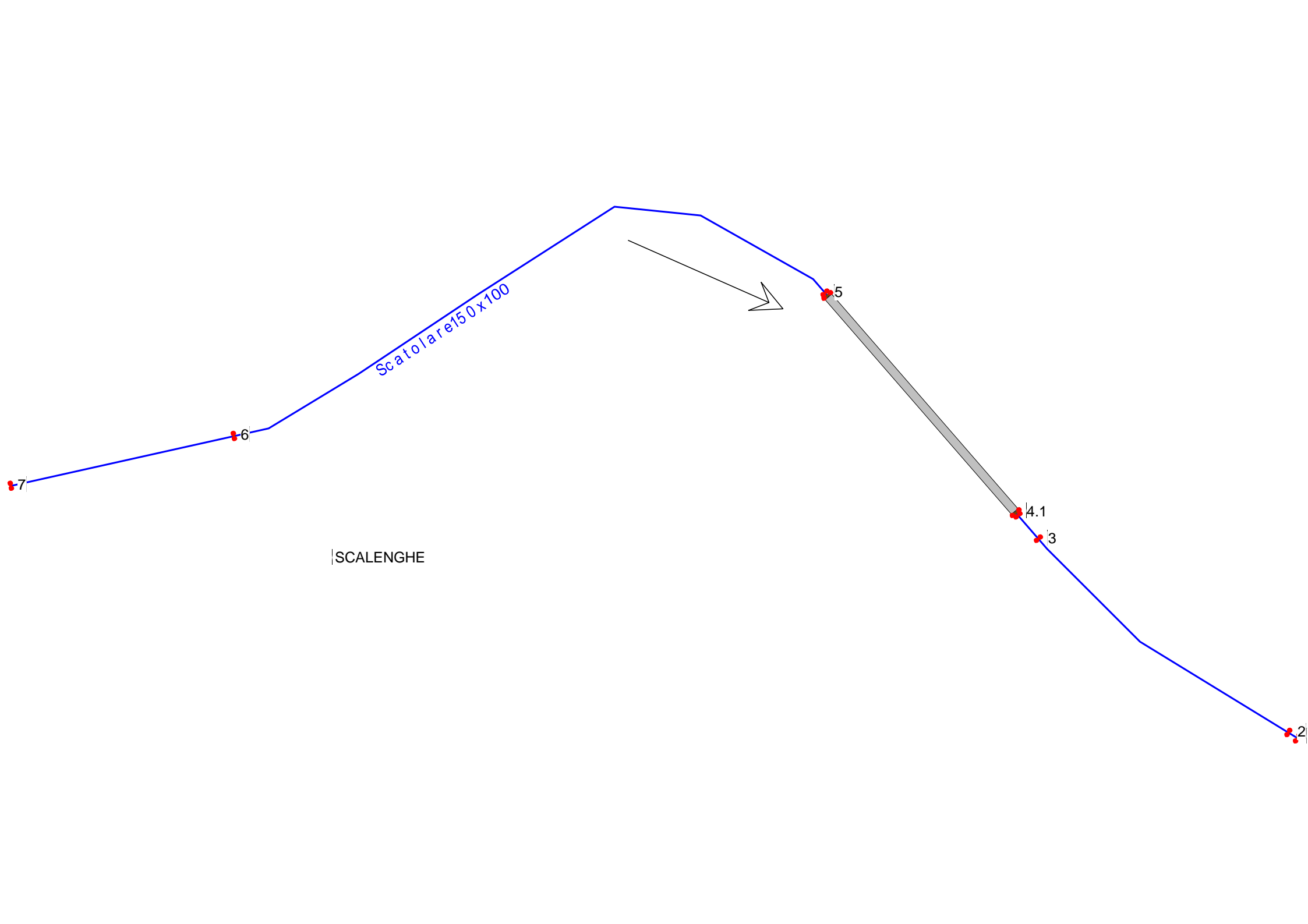
Reach	River Sta	Profile	Q Total (m3/s)	Min Ch El (m)	W.S. Elev (m)	Crit W.S. (m)	E.G. Elev (m)	E.G. Slope (m/m)	Vel Chnl (m/s)	Flow Area (m2)	Top Width (m)	Froude # Chl
SCALENGHE	4.9	2.25 m3/s	2.25	-2.63	-1.46	-2.20	-1.43	0.000325	0.77	2.92	2.50	0.23
SCALENGHE	4.9	2.50 m3/s	2.50	-2.63	-1.34	-2.16	-1.31	0.000305	0.77	3.23	2.50	0.22
SCALENGHE	4.9	2.75 m3/s	2.75	-2.63	-1.23	-2.13	-1.20	0.000298	0.78	3.50	2.50	0.21
SCALENGHE	4.9	3.00 m3/s	3.00	-2.63	-1.13	-2.10	-1.10	0.000297	0.80	3.75	2.50	0.21
SCALENGHE	4.5		Culvert									
SCALENGHE	4.1	1.00 m3/s	1.00	-2.87	-2.32		-2.29	0.000524	0.72	1.38	2.50	0.31
SCALENGHE	4.1	1.25 m3/s	1.25	-2.87	-2.20		-2.18	0.000479	0.75	1.66	2.50	0.29
SCALENGHE	4.1	1.50 m3/s	1.50	-2.87	-2.11		-2.08	0.000472	0.79	1.90	2.50	0.29
SCALENGHE	4.1	1.75 m3/s	1.75	-2.87	-2.03		-1.99	0.000479	0.83	2.11	2.50	0.29
SCALENGHE	4.1	2.00 m3/s	2.00	-2.87	-1.95		-1.91	0.000485	0.87	2.31	2.50	0.29
SCALENGHE	4.1	2.25 m3/s	2.25	-2.87	-1.87		-1.83	0.000492	0.90	2.50	2.50	0.29
SCALENGHE	4.1	2.50 m3/s	2.50	-2.87	-1.79		-1.75	0.000499	0.93	2.69	2.50	0.29
SCALENGHE	4.1	2.75 m3/s	2.75	-2.87	-1.72		-1.67	0.000506	0.96	2.87	2.50	0.28
SCALENGHE	4.1	3.00 m3/s	3.00	-2.87	-1.65		-1.60	0.000513	0.98	3.05	2.50	0.28
SCALENGHE	4	1.00 m3/s	1.00	-2.87	-2.40		-2.30	0.002989	1.43	0.70	1.50	0.67
SCALENGHE	4	1.25 m3/s	1.25	-2.87	-2.29		-2.18	0.002547	1.44	0.87	1.50	0.60
SCALENGHE	4	1.50 m3/s	1.50	-2.87	-2.20		-2.09	0.002497	1.50	1.00	1.50	0.58
SCALENGHE	4	1.75 m3/s	1.75	-2.87	-2.13		-2.00	0.002553	1.57	1.12	1.50	0.58
SCALENGHE	4	2.00 m3/s	2.00	-2.87	-2.05		-1.92	0.002609	1.63	1.22	1.50	0.58
SCALENGHE	4	2.25 m3/s	2.25	-2.87	-1.98		-1.84	0.002663	1.69	1.33	1.50	0.57
SCALENGHE	4	2.50 m3/s	2.50	-2.87	-1.92		-1.76	0.002716	1.75	1.43	1.50	0.57
SCALENGHE	4	2.75 m3/s	2.75	-2.87	-1.85		-1.69	0.002769	1.80	1.53	1.50	0.57
SCALENGHE	4	3.00 m3/s	3.00	-2.87	-1.79		-1.61	0.002823	1.85	1.62	1.50	0.57
SCALENGHE	3	1.00 m3/s	1.00	-2.90	-2.43		-2.33	0.002914	1.41	0.71	1.50	0.66
SCALENGHE	3	1.25 m3/s	1.25	-2.90	-2.31		-2.21	0.002430	1.41	0.89	1.50	0.59
SCALENGHE	3	1.50 m3/s	1.50	-2.90	-2.22		-2.11	0.002396	1.47	1.02	1.50	0.57
SCALENGHE	3	1.75 m3/s	1.75	-2.90	-2.15		-2.02	0.002467	1.55	1.13	1.50	0.57
SCALENGHE	3	2.00 m3/s	2.00	-2.90	-2.08		-1.94	0.002535	1.62	1.24	1.50	0.57
SCALENGHE	3	2.25 m3/s	2.25	-2.90	-2.01		-1.86	0.002599	1.68	1.34	1.50	0.57
SCALENGHE	3	2.50 m3/s	2.50	-2.90	-1.94		-1.79	0.002661	1.74	1.44	1.50	0.57
SCALENGHE	3	2.75 m3/s	2.75	-2.90	-1.87		-1.71	0.002722	1.79	1.54	1.50	0.56

HEC-RAS Plan: 50% 80+120 River: Scatolare150x100 Reach: SCALENGHE (Continued)

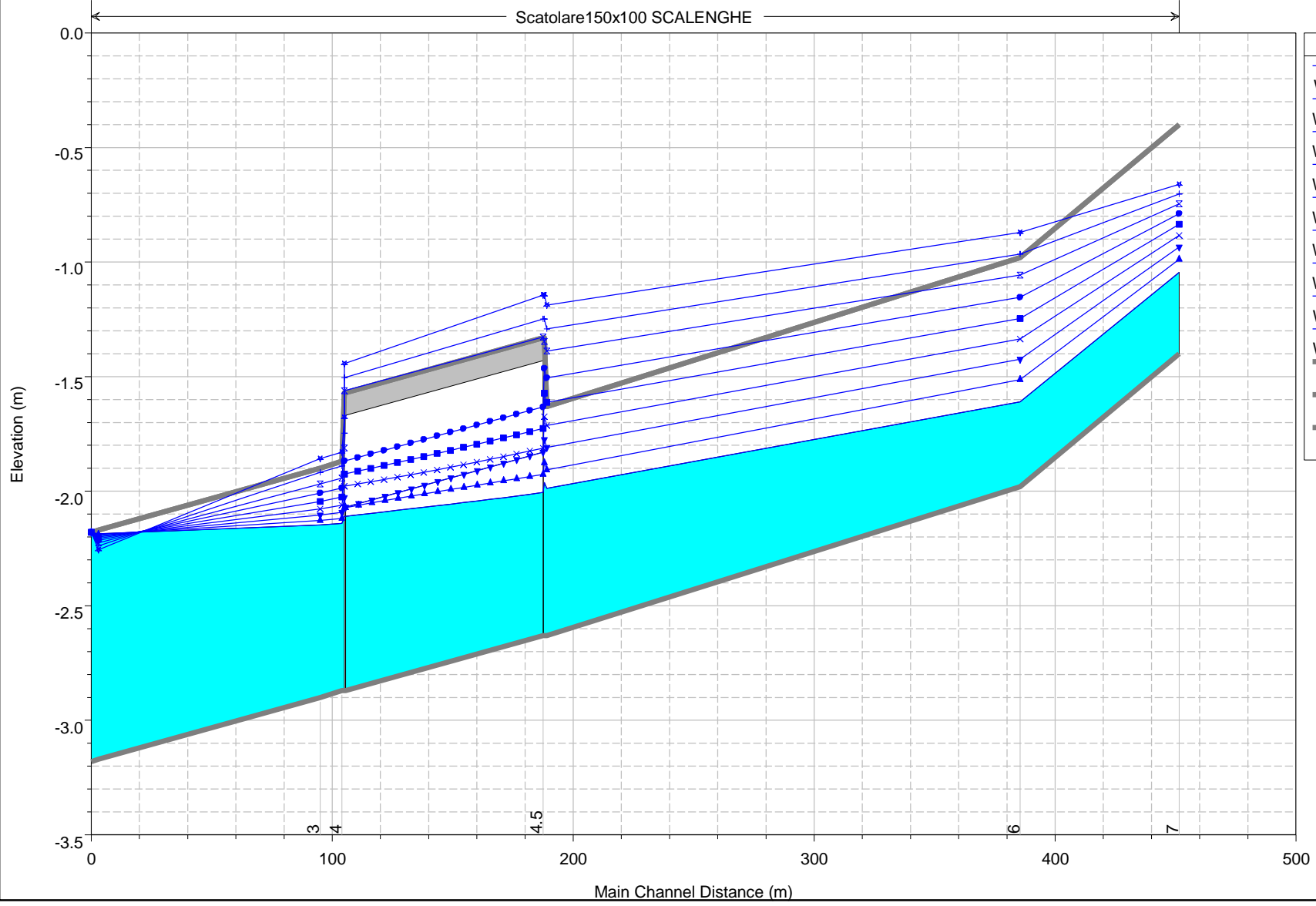
Reach	River Sta	Profile	Q Total (m3/s)	Min Ch El (m)	W.S. Elev (m)	Crit W.S. (m)	E.G. Elev (m)	E.G. Slope (m/m)	Vel Chnl (m/s)	Flow Area (m2)	Top Width (m)	Froude # Chl
SCALENGHE	3	3.00 m3/s	3.00	-2.90	-1.81		-1.64	0.002782	1.84	1.63	1.50	0.56
SCALENGHE	2	1.00 m3/s	1.00	-3.17	-2.71		-2.60	0.003088	1.44	0.69	1.50	0.68
SCALENGHE	2	1.25 m3/s	1.25	-3.17	-2.74	-2.76	-2.55	0.005907	1.94	0.64	1.50	0.94
SCALENGHE	2	1.50 m3/s	1.50	-3.17	-2.70	-2.70	-2.47	0.006794	2.15	0.70	1.50	1.01
SCALENGHE	2	1.75 m3/s	1.75	-3.17	-2.65	-2.65	-2.39	0.006931	2.26	0.77	1.50	1.01
SCALENGHE	2	2.00 m3/s	2.00	-3.17	-2.61	-2.61	-2.32	0.007071	2.36	0.85	1.50	1.01
SCALENGHE	2	2.25 m3/s	2.25	-3.17	-2.56	-2.56	-2.25	0.007212	2.46	0.91	1.50	1.01
SCALENGHE	2	2.50 m3/s	2.50	-3.17	-2.52	-2.52	-2.19	0.007353	2.55	0.98	1.50	1.01
SCALENGHE	2	2.75 m3/s	2.75	-3.17	-2.47	-2.47	-2.12	0.007494	2.63	1.05	1.50	1.01
SCALENGHE	2	3.00 m3/s	3.00	-3.17	-2.43	-2.43	-2.06	0.007634	2.71	1.11	1.50	1.01
SCALENGHE	1	1.00 m3/s	1.00	-3.18	-2.68	-2.89	-2.63	0.003896	1.00	1.00	2.00	0.45
SCALENGHE	1	1.25 m3/s	1.25	-3.18	-2.68	-2.84	-2.60	0.006088	1.25	1.00	2.00	0.56
SCALENGHE	1	1.50 m3/s	1.50	-3.18	-2.68	-2.80	-2.57	0.008767	1.50	1.00	2.00	0.68
SCALENGHE	1	1.75 m3/s	1.75	-3.18	-2.68	-2.75	-2.52	0.011933	1.75	1.00	2.00	0.79
SCALENGHE	1	2.00 m3/s	2.00	-3.18	-2.68	-2.71	-2.48	0.015586	2.00	1.00	2.00	0.90
SCALENGHE	1	2.25 m3/s	2.25	-3.18	-2.68	-2.68	-2.42	0.019320	2.23	1.01	2.00	1.01
SCALENGHE	1	2.50 m3/s	2.50	-3.18	-2.64	-2.64	-2.37	0.019490	2.31	1.08	2.00	1.01
SCALENGHE	1	2.75 m3/s	2.75	-3.18	-2.60	-2.60	-2.31	0.019666	2.39	1.15	2.00	1.01
SCALENGHE	1	3.00 m3/s	3.00	-3.18	-2.57	-2.57	-2.26	0.019851	2.46	1.22	2.00	1.01

## **SIMULAZIONI 2:**

- **Altezza d'acqua nella sezione di valle pari al 100% di riempimento.**
- **Portate variabile tra 1 e 3 m<sup>3</sup>/s**



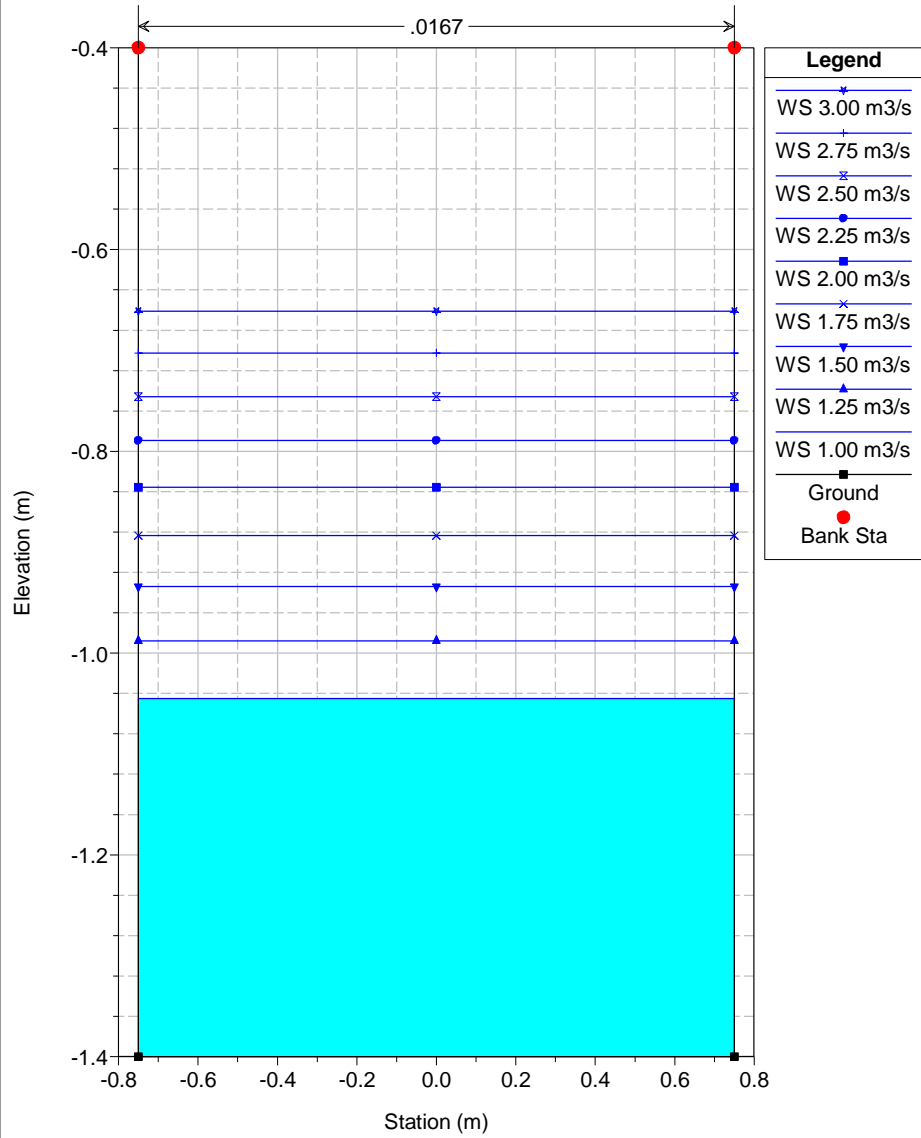
Scatolare150x100 SCALENGHE



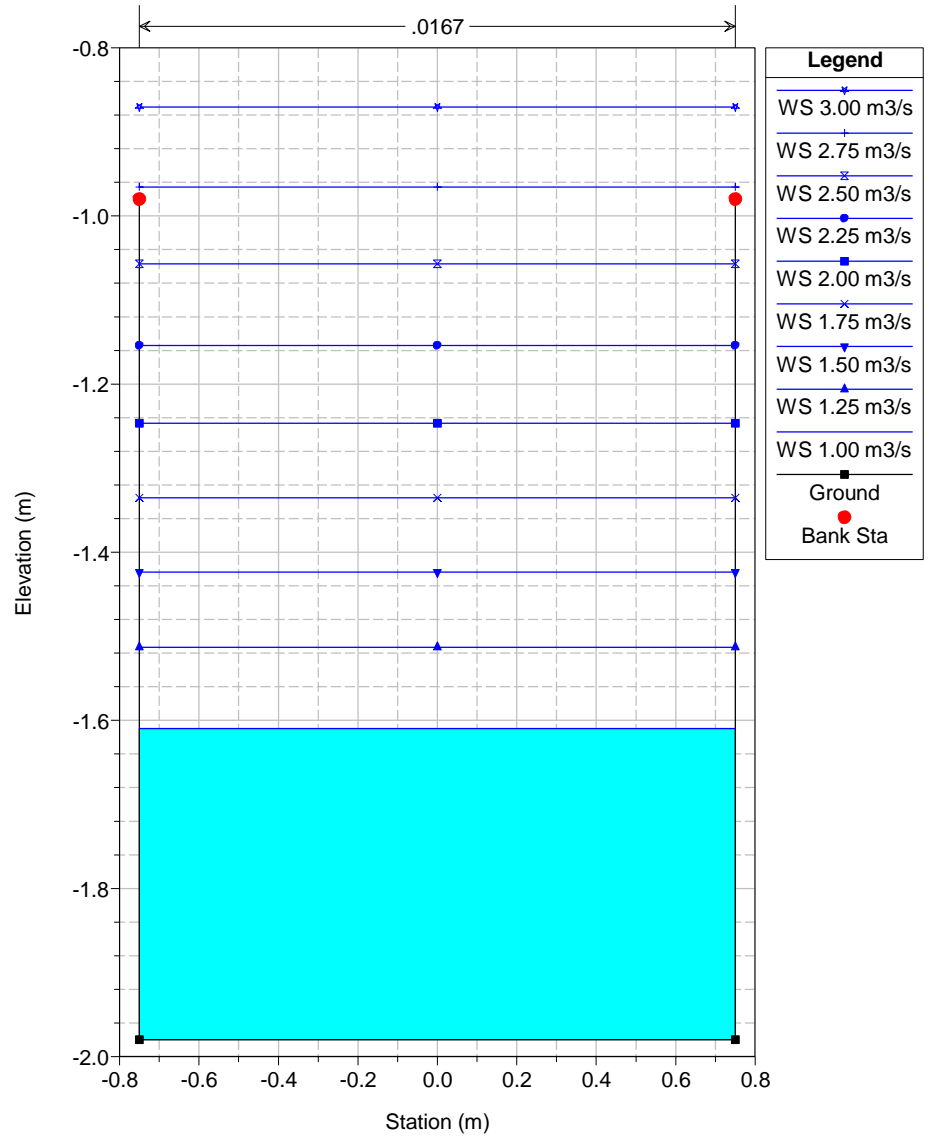
Legend	
WS 1.00 m³/s	▲
WS 1.25 m³/s	▼
WS 1.50 m³/s	×
WS 1.75 m³/s	■
WS 2.00 m³/s	●
WS 2.25 m³/s	◆
WS 2.50 m³/s	+
WS 2.75 m³/s	*
WS 3.00 m³/s	x
Ground	— (grey)
LOB	— (thick grey)
ROB	— (thick grey)



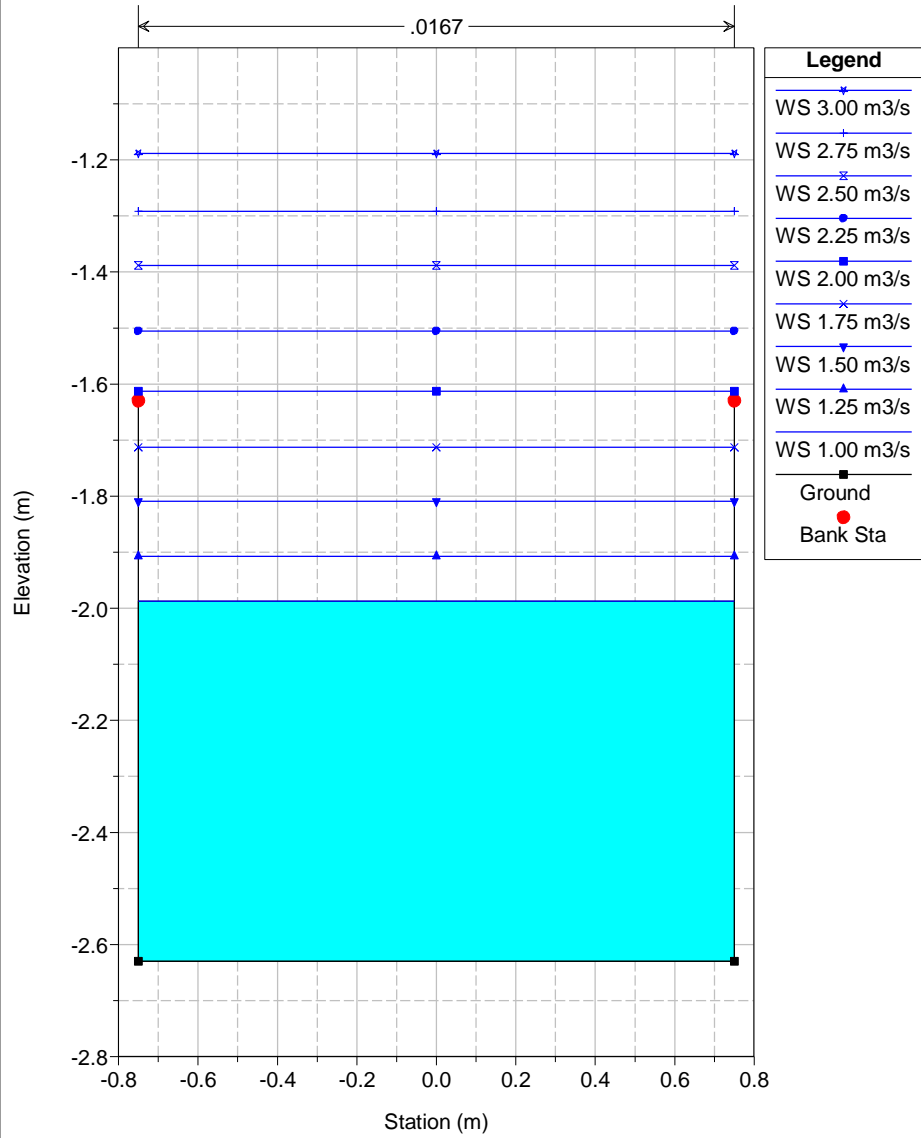
RS = 7



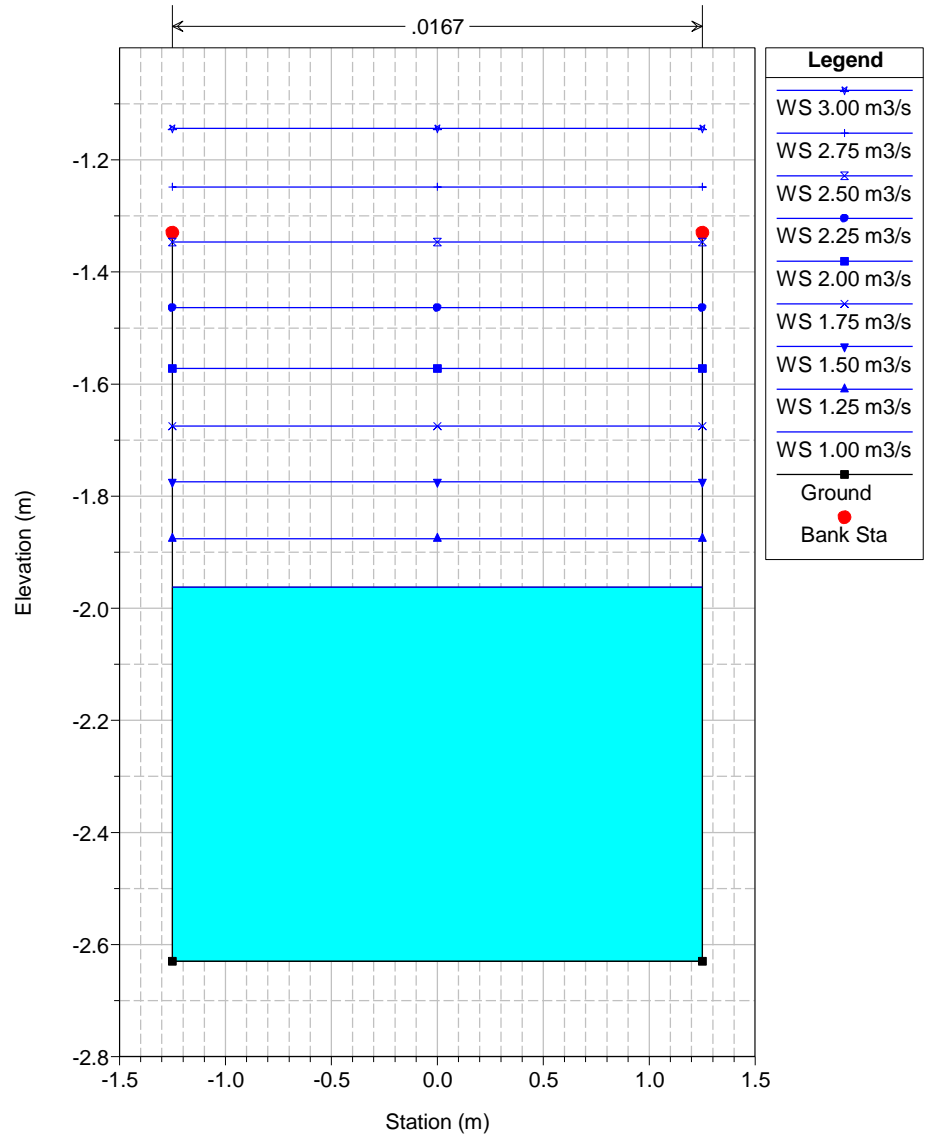
RS = 6



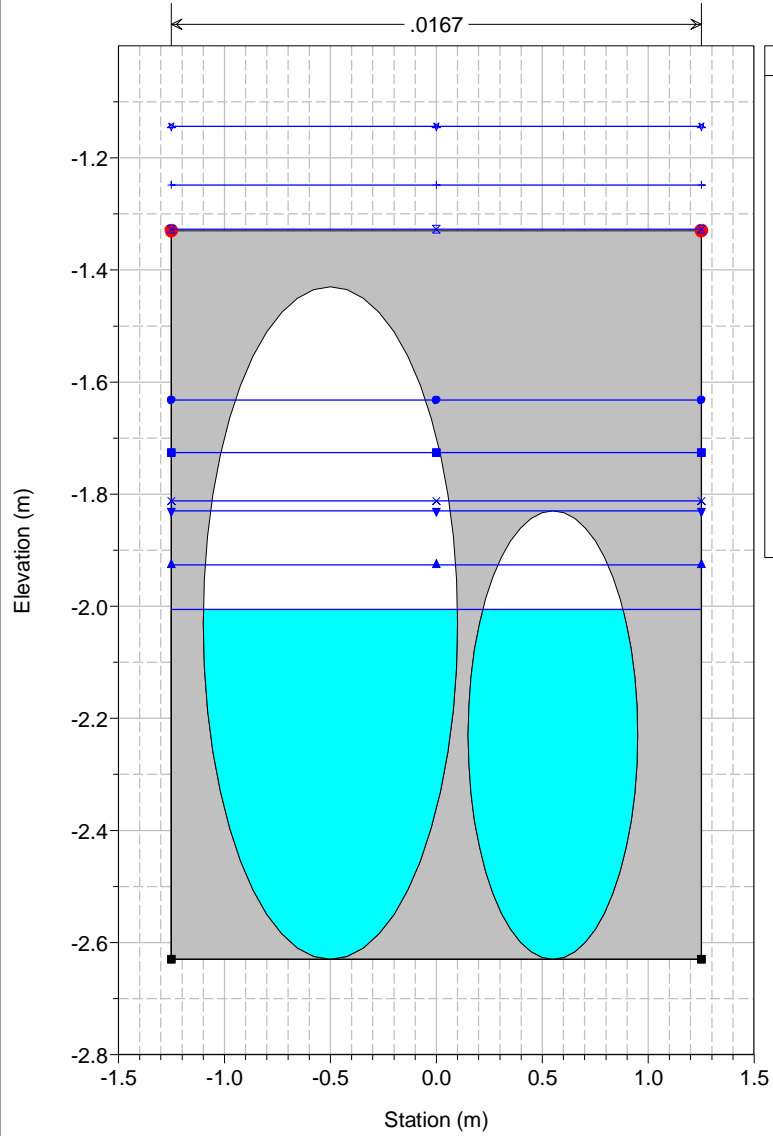
RS = 5



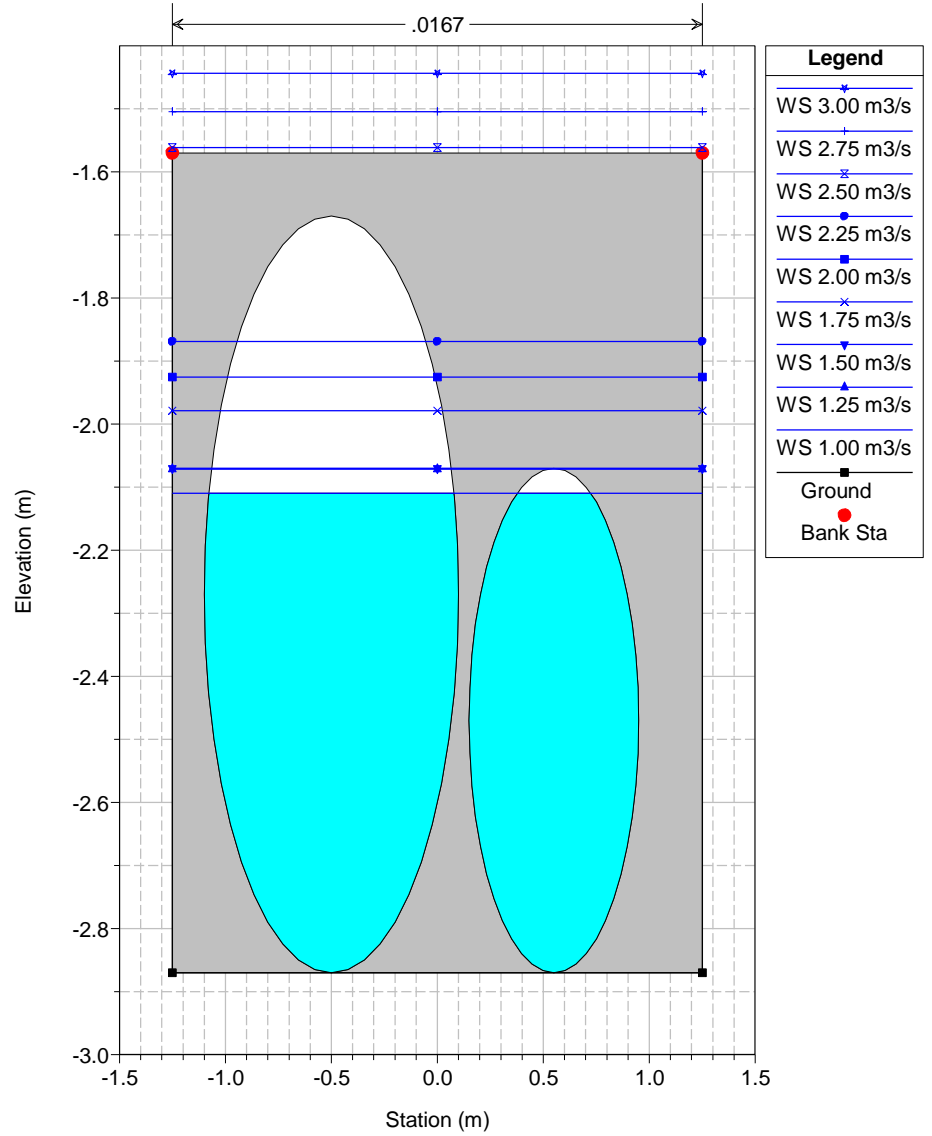
RS = 4.9



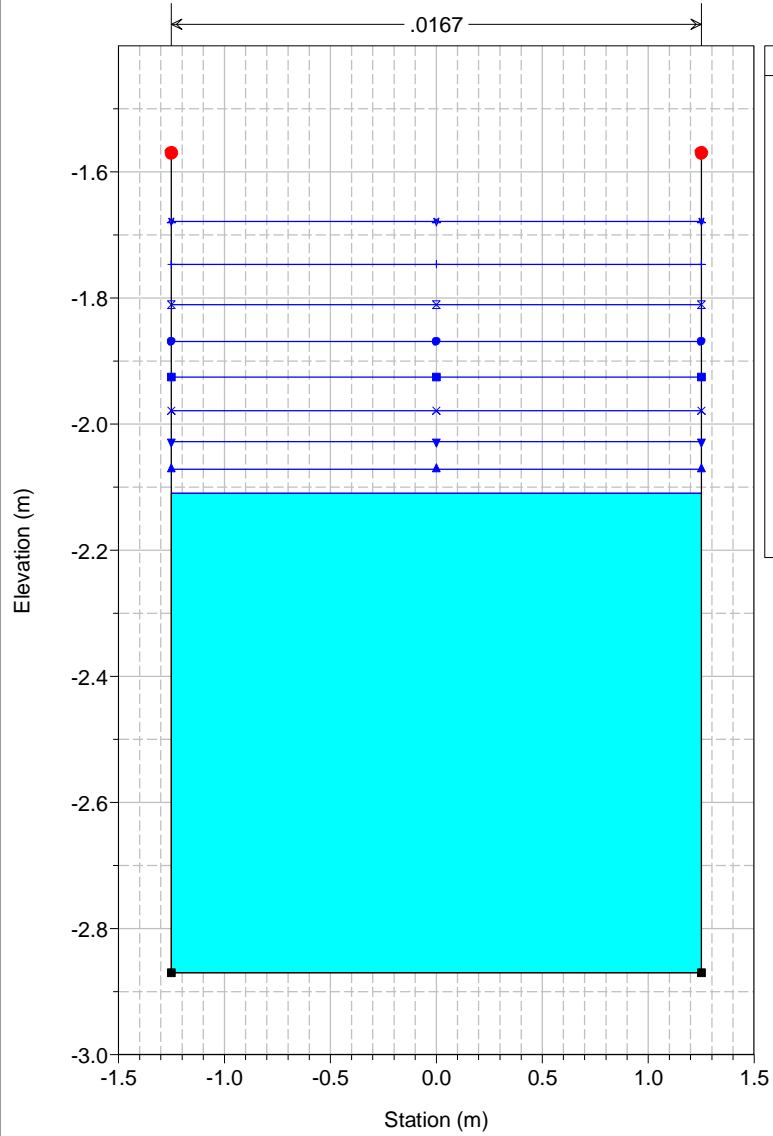
RS = 4.5 Culv



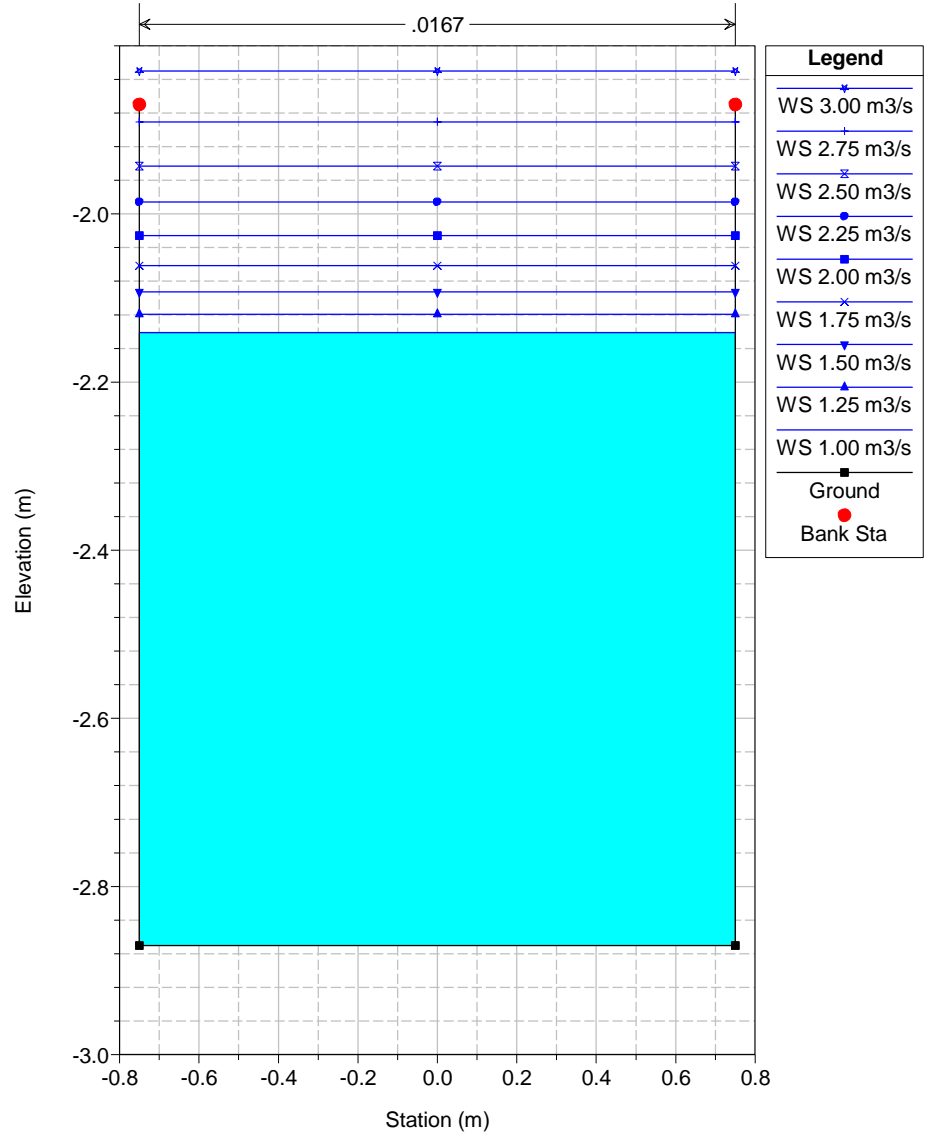
RS = 4.5 Culv



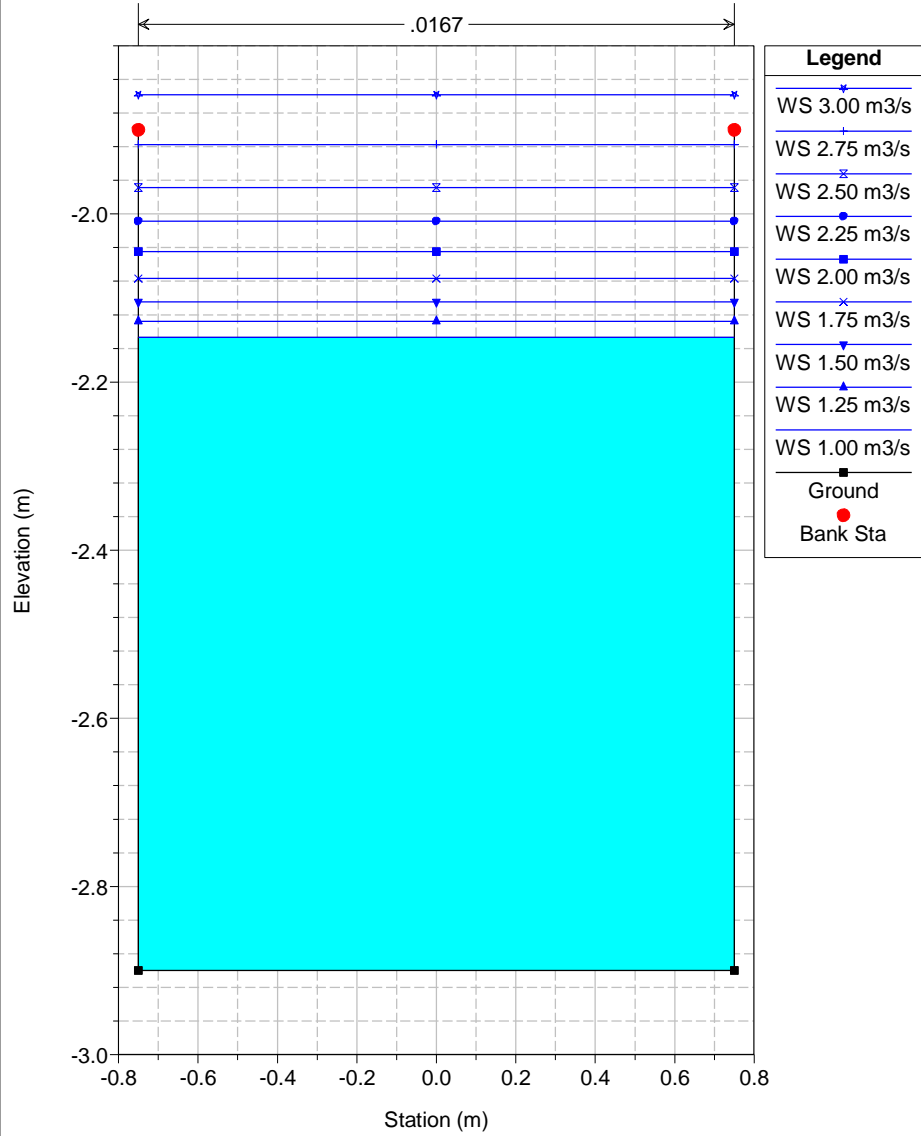
RS = 4.1



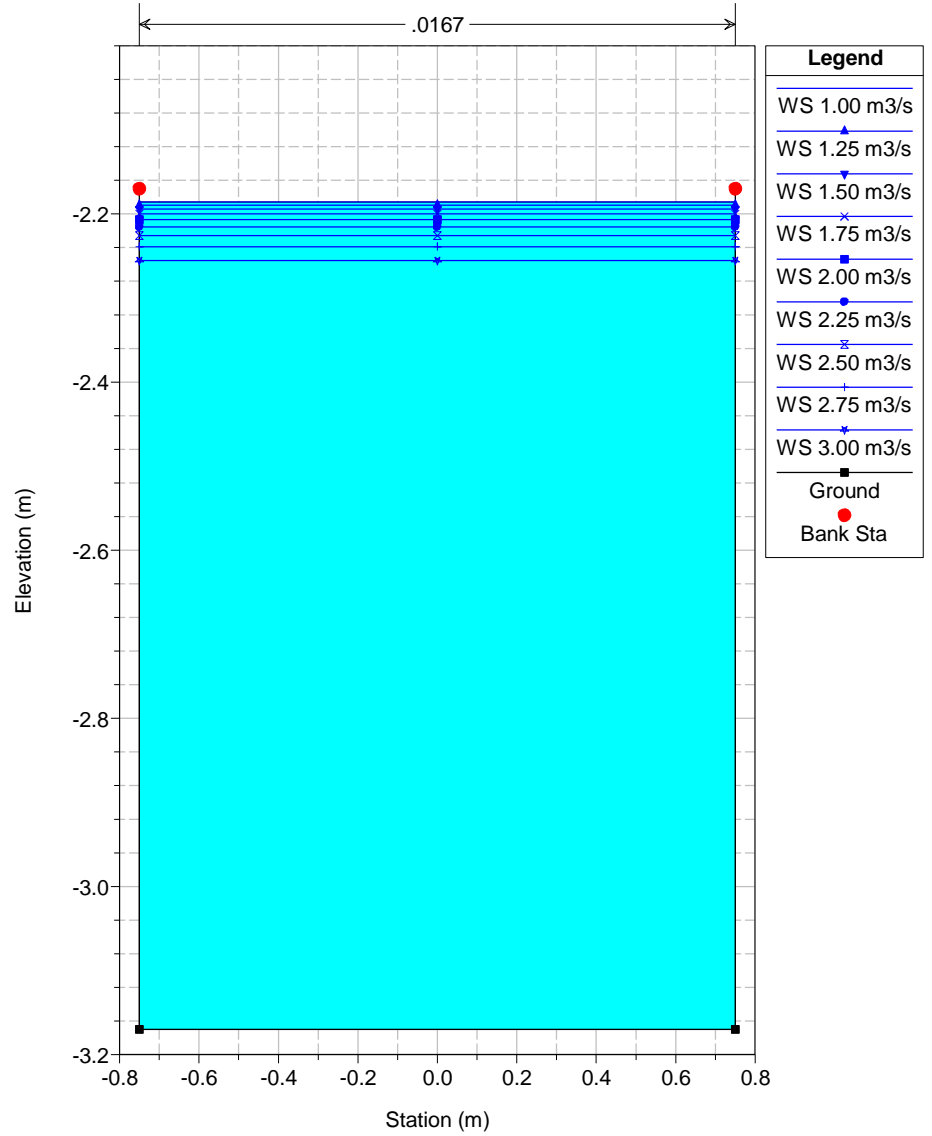
RS = 4



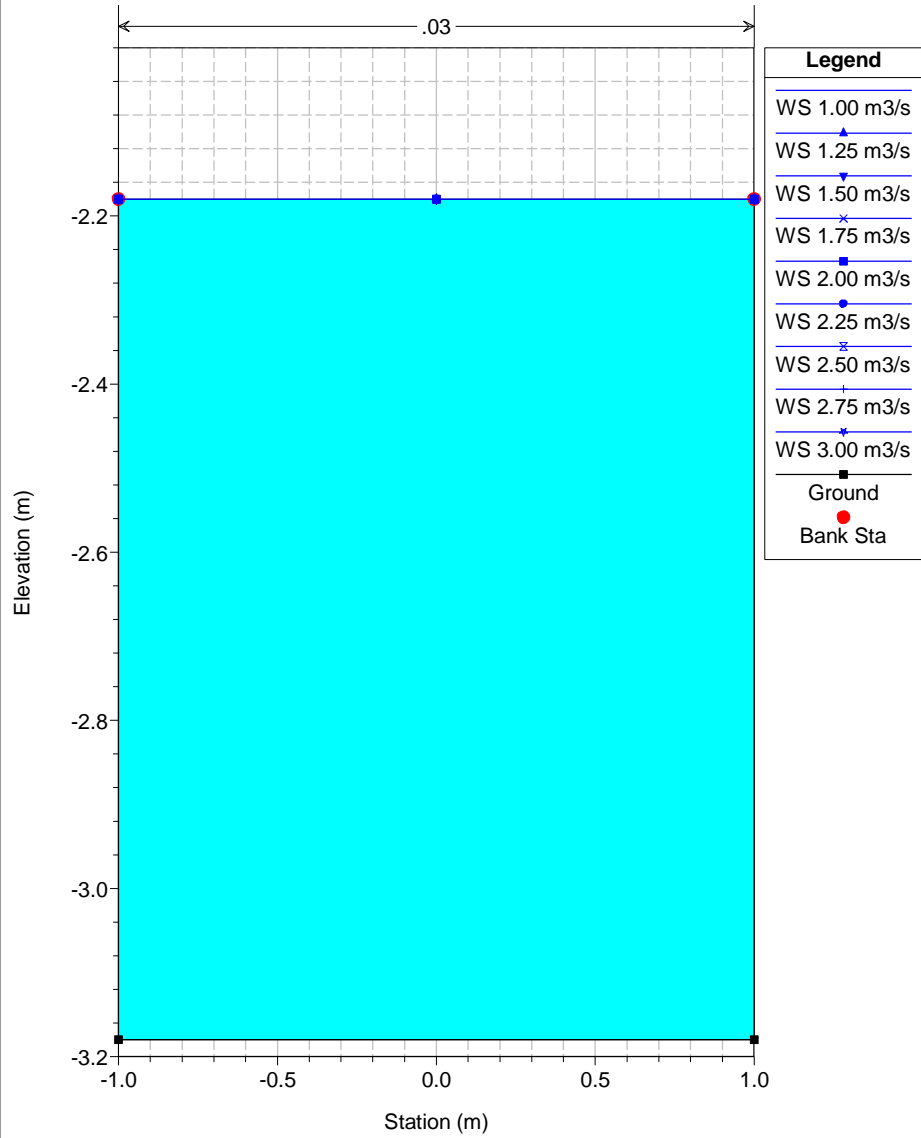
RS = 3



RS = 2



RS = 1



HEC-RAS Plan: 100% 80+120 River: Scatolare150x100 Reach: SCALENGHE

Reach	River Sta	Profile	Q Total (m3/s)	Min Ch El (m)	W.S. Elev (m)	Crit W.S. (m)	E.G. Elev (m)	E.G. Slope (m/m)	Vel Chnl (m/s)	Flow Area (m2)	Top Width (m)	Froude # Chl
SCALENGHE	7	1.00 m3/s	1.00	-1.40	-1.05	-1.05	-0.87	0.006568	1.88	0.53	1.50	1.01
SCALENGHE	7	1.25 m3/s	1.25	-1.40	-0.99	-0.99	-0.78	0.006667	2.02	0.62	1.50	1.01
SCALENGHE	7	1.50 m3/s	1.50	-1.40	-0.93	-0.93	-0.70	0.006770	2.15	0.70	1.50	1.00
SCALENGHE	7	1.75 m3/s	1.75	-1.40	-0.88	-0.88	-0.62	0.006906	2.26	0.77	1.50	1.00
SCALENGHE	7	2.00 m3/s	2.00	-1.40	-0.84	-0.84	-0.55	0.007045	2.36	0.85	1.50	1.00
SCALENGHE	7	2.25 m3/s	2.25	-1.40	-0.79	-0.79	-0.48	0.007185	2.46	0.92	1.50	1.00
SCALENGHE	7	2.50 m3/s	2.50	-1.40	-0.75	-0.75	-0.42	0.007351	2.55	0.98	1.50	1.01
SCALENGHE	7	2.75 m3/s	2.75	-1.40	-0.70	-0.70	-0.35	0.007491	2.63	1.05	1.50	1.01
SCALENGHE	7	3.00 m3/s	3.00	-1.40	-0.66	-0.66	-0.29	0.007630	2.71	1.11	1.50	1.01
SCALENGHE	6	1.00 m3/s	1.00	-1.98	-1.61	-1.62	-1.44	0.005811	1.80	0.56	1.50	0.94
SCALENGHE	6	1.25 m3/s	1.25	-1.98	-1.51		-1.35	0.004671	1.78	0.70	1.50	0.83
SCALENGHE	6	1.50 m3/s	1.50	-1.98	-1.42		-1.26	0.004128	1.80	0.83	1.50	0.77
SCALENGHE	6	1.75 m3/s	1.75	-1.98	-1.34		-1.17	0.003750	1.81	0.97	1.50	0.72
SCALENGHE	6	2.00 m3/s	2.00	-1.98	-1.25		-1.08	0.003457	1.82	1.10	1.50	0.68
SCALENGHE	6	2.25 m3/s	2.25	-1.98	-1.15		-0.99	0.003194	1.82	1.24	1.50	0.64
SCALENGHE	6	2.50 m3/s	2.50	-1.98	-1.06		-0.89	0.002949	1.81	1.38	1.50	0.60
SCALENGHE	6	2.75 m3/s	2.75	-1.98	-0.97		-0.80	0.002795	1.81	1.52	1.50	0.57
SCALENGHE	6	3.00 m3/s	3.00	-1.98	-0.87		-0.70	0.002646	1.80	1.66	1.50	0.55
SCALENGHE	5	1.00 m3/s	1.00	-2.63	-1.99		-1.93	0.001235	1.04	0.96	1.50	0.41
SCALENGHE	5	1.25 m3/s	1.25	-2.63	-1.91		-1.84	0.001404	1.15	1.08	1.50	0.43
SCALENGHE	5	1.50 m3/s	1.50	-2.63	-1.81		-1.73	0.001441	1.22	1.23	1.50	0.43
SCALENGHE	5	1.75 m3/s	1.75	-2.63	-1.71		-1.63	0.001468	1.27	1.38	1.50	0.42
SCALENGHE	5	2.00 m3/s	2.00	-2.63	-1.61		-1.53	0.001467	1.31	1.53	1.50	0.41
SCALENGHE	5	2.25 m3/s	2.25	-2.63	-1.51		-1.41	0.001437	1.33	1.69	1.50	0.40
SCALENGHE	5	2.50 m3/s	2.50	-2.63	-1.39		-1.30	0.001384	1.34	1.86	1.50	0.38
SCALENGHE	5	2.75 m3/s	2.75	-2.63	-1.29		-1.20	0.001390	1.37	2.01	1.50	0.38
SCALENGHE	5	3.00 m3/s	3.00	-2.63	-1.19		-1.09	0.001376	1.39	2.16	1.50	0.37
SCALENGHE	4.9	1.00 m3/s	1.00	-2.63	-1.96	-2.38	-1.94	0.000304	0.60	1.67	2.50	0.23
SCALENGHE	4.9	1.25 m3/s	1.25	-2.63	-1.88	-2.34	-1.85	0.000335	0.66	1.88	2.50	0.24
SCALENGHE	4.9	1.50 m3/s	1.50	-2.63	-1.77	-2.30	-1.75	0.000338	0.70	2.14	2.50	0.24
SCALENGHE	4.9	1.75 m3/s	1.75	-2.63	-1.68	-2.26	-1.65	0.000340	0.73	2.39	2.50	0.24
SCALENGHE	4.9	2.00 m3/s	2.00	-2.63	-1.57	-2.23	-1.54	0.000335	0.76	2.64	2.50	0.23

HEC-RAS Plan: 100% 80+120 River: Scatolare150x100 Reach: SCALENGHE (Continued)

Reach	River Sta	Profile	Q Total (m3/s)	Min Ch El (m)	W.S. Elev (m)	Crit W.S. (m)	E.G. Elev (m)	E.G. Slope (m/m)	Vel Chnl (m/s)	Flow Area (m2)	Top Width (m)	Froude # Chl
SCALENGHE	4.9	2.25 m3/s	2.25	-2.63	-1.46	-2.20	-1.43	0.000326	0.77	2.92	2.50	0.23
SCALENGHE	4.9	2.50 m3/s	2.50	-2.63	-1.35	-2.16	-1.32	0.000311	0.78	3.21	2.50	0.22
SCALENGHE	4.9	2.75 m3/s	2.75	-2.63	-1.25	-2.13	-1.22	0.000310	0.80	3.45	2.50	0.22
SCALENGHE	4.9	3.00 m3/s	3.00	-2.63	-1.14	-2.10	-1.11	0.000305	0.81	3.72	2.50	0.21
SCALENGHE	4.5		Culvert									
SCALENGHE	4.1	1.00 m3/s	1.00	-2.87	-2.11		-2.10	0.000209	0.53	1.90	2.50	0.19
SCALENGHE	4.1	1.25 m3/s	1.25	-2.87	-2.07		-2.05	0.000285	0.63	2.00	2.50	0.22
SCALENGHE	4.1	1.50 m3/s	1.50	-2.87	-2.03		-2.00	0.000354	0.71	2.11	2.50	0.25
SCALENGHE	4.1	1.75 m3/s	1.75	-2.87	-1.98		-1.95	0.000411	0.79	2.23	2.50	0.27
SCALENGHE	4.1	2.00 m3/s	2.00	-2.87	-1.93		-1.89	0.000457	0.85	2.36	2.50	0.28
SCALENGHE	4.1	2.25 m3/s	2.25	-2.87	-1.87		-1.83	0.000493	0.90	2.50	2.50	0.29
SCALENGHE	4.1	2.50 m3/s	2.50	-2.87	-1.81		-1.77	0.000522	0.94	2.65	2.50	0.29
SCALENGHE	4.1	2.75 m3/s	2.75	-2.87	-1.75		-1.70	0.000539	0.98	2.81	2.50	0.29
SCALENGHE	4.1	3.00 m3/s	3.00	-2.87	-1.68		-1.63	0.000547	1.01	2.98	2.50	0.29
SCALENGHE	4	1.00 m3/s	1.00	-2.87	-2.14		-2.10	0.000879	0.91	1.09	1.50	0.34
SCALENGHE	4	1.25 m3/s	1.25	-2.87	-2.12		-2.06	0.001270	1.11	1.13	1.50	0.41
SCALENGHE	4	1.50 m3/s	1.50	-2.87	-2.09		-2.01	0.001666	1.29	1.17	1.50	0.47
SCALENGHE	4	1.75 m3/s	1.75	-2.87	-2.06		-1.96	0.002043	1.44	1.21	1.50	0.51
SCALENGHE	4	2.00 m3/s	2.00	-2.87	-2.03		-1.90	0.002383	1.58	1.27	1.50	0.55
SCALENGHE	4	2.25 m3/s	2.25	-2.87	-1.99		-1.84	0.002671	1.70	1.33	1.50	0.58
SCALENGHE	4	2.50 m3/s	2.50	-2.87	-1.94		-1.78	0.002916	1.80	1.39	1.50	0.60
SCALENGHE	4	2.75 m3/s	2.75	-2.87	-1.89		-1.71	0.003058	1.87	1.47	1.50	0.60
SCALENGHE	4	3.00 m3/s	3.00	-2.87	-1.83		-1.64	0.003121	1.92	1.56	1.50	0.60
SCALENGHE	3	1.00 m3/s	1.00	-2.90	-2.15		-2.11	0.000806	0.89	1.13	1.50	0.33
SCALENGHE	3	1.25 m3/s	1.25	-2.90	-2.13		-2.07	0.001179	1.08	1.16	1.50	0.39
SCALENGHE	3	1.50 m3/s	1.50	-2.90	-2.10		-2.02	0.001568	1.26	1.19	1.50	0.45
SCALENGHE	3	1.75 m3/s	1.75	-2.90	-2.08		-1.97	0.001949	1.42	1.23	1.50	0.50
SCALENGHE	3	2.00 m3/s	2.00	-2.90	-2.04		-1.92	0.002303	1.56	1.28	1.50	0.54
SCALENGHE	3	2.25 m3/s	2.25	-2.90	-2.01		-1.86	0.002616	1.68	1.34	1.50	0.57
SCALENGHE	3	2.50 m3/s	2.50	-2.90	-1.97		-1.81	0.002880	1.79	1.40	1.50	0.59
SCALENGHE	3	2.75 m3/s	2.75	-2.90	-1.92		-1.74	0.003038	1.87	1.47	1.50	0.60



HEC-RAS Plan: 100% 80+120 River: Scatolare150x100 Reach: SCALENGHE (Continued)

Reach	River Sta	Profile	Q Total (m3/s)	Min Ch El (m)	W.S. Elev (m)	Crit W.S. (m)	E.G. Elev (m)	E.G. Slope (m/m)	Vel Chnl (m/s)	Flow Area (m2)	Top Width (m)	Froude # Chl
SCALENGHE	3	3.00 m3/s	3.00	-2.90	-1.86		-1.67	0.003108	1.92	1.56	1.50	0.60
SCALENGHE	2	1.00 m3/s	1.00	-3.17	-2.19		-2.16	0.000400	0.68	1.48	1.50	0.22
SCALENGHE	2	1.25 m3/s	1.25	-3.17	-2.19		-2.15	0.000630	0.85	1.47	1.50	0.27
SCALENGHE	2	1.50 m3/s	1.50	-3.17	-2.19		-2.14	0.000919	1.02	1.46	1.50	0.33
SCALENGHE	2	1.75 m3/s	1.75	-3.17	-2.20		-2.13	0.001270	1.20	1.46	1.50	0.39
SCALENGHE	2	2.00 m3/s	2.00	-3.17	-2.21		-2.11	0.001689	1.38	1.44	1.50	0.45
SCALENGHE	2	2.25 m3/s	2.25	-3.17	-2.22		-2.09	0.002188	1.57	1.43	1.50	0.51
SCALENGHE	2	2.50 m3/s	2.50	-3.17	-2.23		-2.07	0.002780	1.77	1.42	1.50	0.58
SCALENGHE	2	2.75 m3/s	2.75	-3.17	-2.24		-2.04	0.003488	1.97	1.40	1.50	0.65
SCALENGHE	2	3.00 m3/s	3.00	-3.17	-2.26		-2.01	0.004349	2.19	1.37	1.50	0.73
SCALENGHE	1	1.00 m3/s	1.00	-3.18	-2.18	-2.89	-2.17	0.000567	0.50	2.00	2.00	0.16
SCALENGHE	1	1.25 m3/s	1.25	-3.18	-2.18	-2.84	-2.16	0.000886	0.62	2.00	2.00	0.20
SCALENGHE	1	1.50 m3/s	1.50	-3.18	-2.18	-2.80	-2.15	0.001275	0.75	2.00	2.00	0.24
SCALENGHE	1	1.75 m3/s	1.75	-3.18	-2.18	-2.75	-2.14	0.001736	0.87	2.00	2.00	0.28
SCALENGHE	1	2.00 m3/s	2.00	-3.18	-2.18	-2.71	-2.13	0.002267	1.00	2.00	2.00	0.32
SCALENGHE	1	2.25 m3/s	2.25	-3.18	-2.18	-2.68	-2.12	0.002870	1.12	2.00	2.00	0.36
SCALENGHE	1	2.50 m3/s	2.50	-3.18	-2.18	-2.64	-2.10	0.003543	1.25	2.00	2.00	0.40
SCALENGHE	1	2.75 m3/s	2.75	-3.18	-2.18	-2.60	-2.08	0.004287	1.37	2.00	2.00	0.44
SCALENGHE	1	3.00 m3/s	3.00	-3.18	-2.18	-2.57	-2.07	0.005101	1.50	2.00	2.00	0.48