

## Appendix D – Results of Constant Rate Testing



**Memramcook Constant Rate Pump Test on ME12-01 (TH10-01) (start 16:30 hrs, August 27, 2012)**

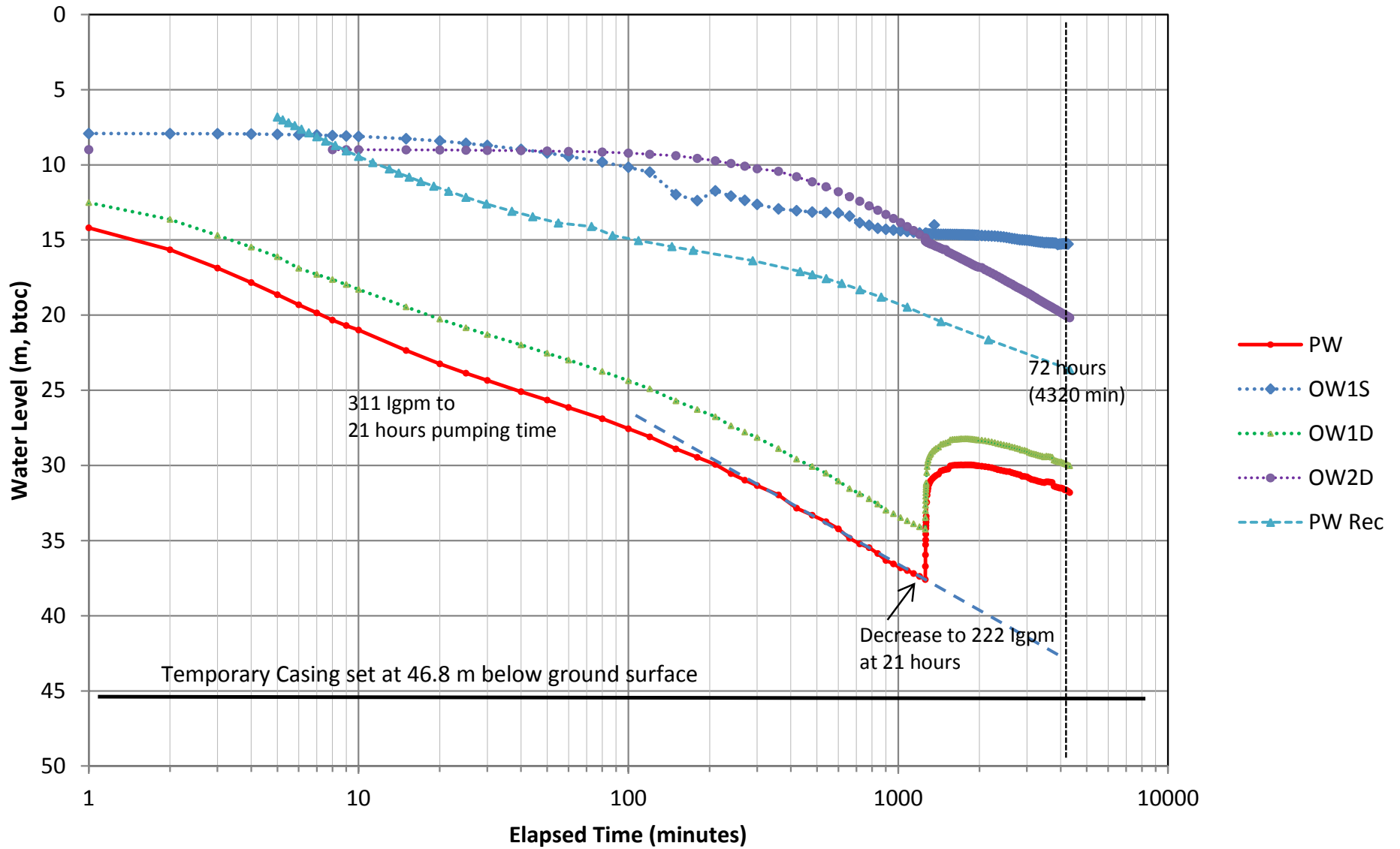
<b>Well I.D.</b>	<b>ME12-01</b>	<b>OW12-1S</b>	<b>OW12-1D</b>	<b>OW12-2D</b>
Original Static (m.btoc)	4.45	5.11	5.15	7.92
After Step Test	8.16	7.92	8.87	8.99
Flow rate	375 Usgpm (311 lgpm) <b>NOTE decrease to 268 Usgpm (222 lgpm) at 21 hours pumping time</b>			
Dist from PW12-01 (m)	0	30	30	90

Date	Time	minutes	Water Level (m, below top of casing)					PW delta(s)	Comments
			ME12-01	OW12-1S	OW12-1D	OW12-2D			
27-Aug-12	4:30 PM	0	4.45	5.11	5.15	8.99			
	4:31 PM	1	14.19	7.92	12.51		9.74		
	4:32 PM	2	15.65	7.93	13.63		1.46		
	4:33 PM	3	16.87	7.93	14.69		1.22		
	4:34 PM	4	17.83	7.95	15.47		0.96		
	4:35 PM	5	18.64	7.97	16.11		0.81		
	4:36 PM	6	19.31	8.00	16.88		0.67		
	4:37 PM	7	19.85	8.02	17.29	8.99	0.54		
	4:38 PM	8	20.33	8.05	17.63	9.00	0.48		
	4:39 PM	9	20.69	8.08	17.96	9.00	0.36		
	4:40 PM	10	20.99	8.11	18.29	9.00	0.30		
	4:45 PM	15	22.35	8.26	19.45	9.01	1.36		
	4:50 PM	20	23.24	8.41	20.26	9.03	0.89		
	4:55 PM	25	23.86	8.57	20.84	9.04	0.62		
	5:00 PM	30	24.34	8.71	21.29	9.05	0.48		
	5:10 PM	40	25.09	8.97	21.98	9.08	0.75		
	5:20 PM	50	25.65	9.21	22.53	9.11	0.56		
	5:30 PM	60	26.14	9.43	22.99	9.15	0.49		
	5:50 PM	80	26.89	9.81	23.74	9.22	0.75		
	6:10 PM	100	27.56	10.16	24.36	9.30	0.67		
	6:30 PM	120	28.10	10.48	24.90	9.39	0.54		
7:00 PM	150	28.90	11.98	25.71	9.57	0.80			
7:30 PM	180	29.46	12.38	26.28	9.73	0.56			
8:00 PM	210	29.93	11.73	26.76	9.91	0.47			
8:30 PM	240	30.54	12.08	27.36	10.09	0.61	Adjust flow		
9:00 PM	270	30.98	12.36	27.78	10.26	0.44			
9:30 PM	300	31.34	12.63	28.14	10.43	0.36			
10:30 PM	360	31.96	12.93	28.88	10.79	0.62	Adjust flow		
11:30 PM	420	32.84	13.05	29.58	11.13	0.88			
28-Aug-12	12:30 AM	480	33.31	13.14	30.07	11.46	0.47		
	1:30 AM	540	33.74	13.17	30.51	11.79	0.43		
	2:30 AM	600	34.22	13.20	31.04	12.12	0.48	Adjust flow	
	3:30 AM	660	34.84	13.41	31.54	12.42	0.62		
	4:30 AM	720	35.22	13.85	31.89	12.73	0.38		
	5:30 AM	780	35.47	14.02	32.22	13.02	0.25		
	6:30 AM	840	35.86	14.22	32.57	13.30	0.39	Adjust flow	
	7:30 AM	900	36.32	14.29	32.98	13.57	0.46		
	8:30 AM	960	36.55	14.34	33.21	13.84	0.23		
	9:30 AM	1020	36.81	14.39	33.47	14.11	0.26		
	10:30 AM	1080	36.99	14.43	33.68	14.37	0.18		
	11:30 AM	1140	37.19	14.48	33.88	14.63	0.20		
	12:30 PM	1200	37.38	14.53	34.08	14.86	0.19		
	1:30 PM	1260	37.59	14.57	34.24	15.07	0.21	At 21 hrs decreased rate	
	1:31 PM	1261	36.71	14.58	33.47		-0.88	from 375 Usgpm to 268 Usgpm	
	1:32 PM	1262	35.95	14.58	33.00		-0.76		
	1:33 PM	1263	35.27	14.58	32.65		-0.68		
1:34 PM	1264	34.95	14.58	32.34		-0.32			
1:35 PM	1265	34.57	14.58	32.05		-0.38			
1:36 PM	1266	34.19	14.58	31.82		-0.38			
1:37 PM	1267	34.00	14.58	31.61		-0.19			
1:38 PM	1268	33.78	14.58	31.45		-0.22			
1:39 PM	1269	33.58	14.58	31.28		-0.20			
1:40 PM	1270	33.38	14.58	31.16	15.13	-0.20			
1:45 PM	1275	32.45	14.58	30.47	15.14	-0.93			

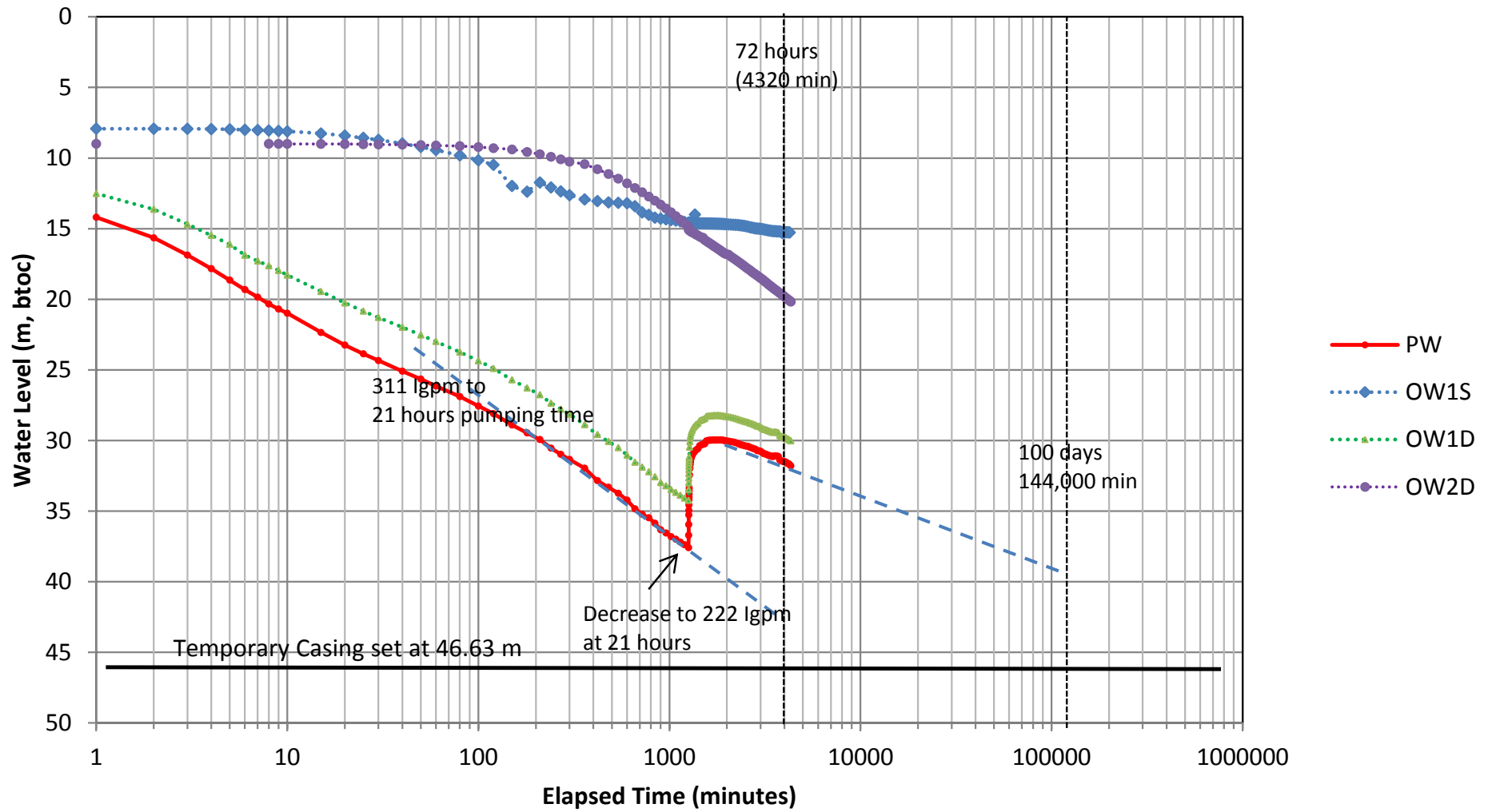
29-Aug-12	1:50 PM	1280	31.97	14.59	30.08	15.16	-0.48	
	1:55 PM	1285	31.70	14.59	29.82	15.18	-0.27	
	2:00 PM	1290	31.51	14.59	29.65	15.20	-0.19	
	2:10 PM	1300	31.26	14.60	29.45	15.23	-0.25	
	2:20 PM	1310	31.11	14.60	29.30	15.27	-0.15	
	2:30 PM	1320	31.01	14.61	29.21	15.30	-0.10	
	2:50 PM	1340	30.87	14.61	29.06	15.36	-0.14	
	3:10 PM	1360	30.76	14.00	28.96	15.42	-0.11	
	3:30 PM	1380	30.67	14.61	28.87	15.48	-0.09	2 hrs after decreasing rate
	4:00 PM	1410	30.58	14.62	28.78	15.56	-0.09	
	4:30 PM	1440	30.37	14.62	28.60	15.63	-0.21	
	5:00 PM	1470	30.31	14.62	28.55	15.64	-0.06	
	5:30 PM	1500	30.27	14.62	28.50	15.80	-0.04	
	6:00 PM	1530	30.24	14.63	28.45	15.87	-0.03	
	6:30 PM	1560	30.03	14.63	28.30	15.95	-0.21	
	7:00 PM	1590	30.00	14.63	28.27	16.02	-0.03	
	7:30 PM	1620	29.98	14.63	28.26	16.09	-0.02	
	8:00 PM	1650	29.98	14.63	28.25	16.16	0.00	
	8:30 PM	1680	29.97	14.64	28.24	16.24	-0.01	
	9:00 PM	1710	29.96	14.64	28.22	16.30	-0.01	
	9:30 PM	1740	29.97	14.64	28.23	16.37	0.01	
	10:00 PM	1770	29.96	14.65	28.22	16.44	-0.01	
	10:30 PM	1800	29.96	14.65	28.22	16.50	0.00	
	11:00 PM	1830	29.96	14.65	28.23	16.57	0.00	
	11:30 PM	1860	29.96	14.66	28.24	16.64	0.00	
	12:00 AM	1890	29.97	14.66	28.25	16.70	0.01	
	12:30 AM	1920	29.99	14.67	28.27	16.76	0.02	
	1:00 AM	1950	30.01	14.68	28.29	16.80	0.02	
	1:30 AM	1980	30.02	14.68	28.30	16.84	0.01	
	2:30 AM	2040	30.05	14.70	28.32	16.98	0.03	
	3:30 AM	2100	30.08	14.71	28.35	17.09	0.03	
	4:30 AM	2160	30.11	14.72	28.39	17.20	0.03	
	5:30 AM	2220	30.15	14.73	28.43	17.31	0.04	
	6:30 AM	2280	30.21	14.74	28.48	17.42	0.06	
	7:30 AM	2340	30.28	14.76	28.54	17.53	0.07	
	8:30 AM	2400	30.32	14.78	28.58	17.64	0.04	
	9:30 AM	2460	30.36	14.80	28.63	17.75	0.04	
	10:30 AM	2520	30.40	14.83	28.67	17.85	0.04	
	11:30 AM	2580	30.41	14.86	28.70	17.94	0.01	
	12:30 PM	2640	30.48	14.90	28.77	18.05	0.07	
1:30 PM	2700	30.53	14.92	28.80	18.15	0.05		
2:30 PM	2760	30.58	14.95	28.86	18.23	0.05		
3:30 PM	2820	30.62	14.98	28.90	18.32	0.04		
4:30 PM	2880	30.72	14.99	28.98	18.41	0.10		
5:30 PM	2940	30.73	15.00	28.99	18.50	0.01		
6:30 PM	3000	30.76	15.01	29.04	18.58	0.03		
7:30 PM	3060	30.85	15.03	29.13	18.67	0.09		
8:30 PM	3120	30.93	15.05	29.19	18.77	0.08		
9:30 PM	3180	30.96	15.08	29.23	18.85	0.03		
10:30 PM	3240	31.00	15.10	29.26	18.95	0.04		
11:30 PM	3300	31.05	15.12	29.31	19.03	0.05		
12:30 AM	3360	31.08	15.14	29.35	19.11	0.03		
1:30 AM	3420	31.12	15.15	29.38	19.19	0.04		
2:30 AM	3480	31.14	15.18	29.43	19.27	0.02		
3:30 AM	3540	31.09	15.17	29.38	19.34	-0.05		
4:30 AM	3600	31.09	15.18	29.40	19.41	0.00		
5:30 AM	3660	31.11	15.19	29.42	19.48	0.02		
6:30 AM	3720	31.13	15.19	29.45	19.56	0.02	Adjust flow	
7:30 AM	3780	31.38	15.20	29.64	19.62	0.25		
8:30 AM	3840	31.43	15.21	29.69	19.70	0.05		
9:30 AM	3900	31.46	15.30	29.73	19.77	0.03	samples collected from OWs	
10:30 AM	3960	31.50	15.27	29.77	19.84	0.04		
11:30 AM	4020	31.50	15.26	29.77	19.91	0.00		
12:30 PM	4080	31.54	15.25	29.82	19.98	0.04		
1:30 PM	4140	31.62	15.25	29.88	20.04	0.08		
2:30 PM	4200	31.64	15.26	29.91	20.10	0.02	adjusted flow	
3:30 PM	4260	31.71	15.27	29.97	20.17	0.07		
4:30 PM	4320	31.80		30.02	20.23	0.09		



# Memramcook Pump Test - August 2012



### Memramcook Pump Test - Estimate of Long Term Yield



### Memramcook Pump Test - August 2012

