

Data Set: Z:\Turkey Point FPL Units 6 and 7\Hydrogeology\Slug Test Files\OW-721L_FHT_KGS.aqt

Title: OW-721 L FALLING HEAD TEST 5-15-08

Date: 06/08/16

Time: 11:46:53

PROJECT INFORMATION

Company: Turkey Point

Client: BECHTEL

Project: 6468-07-1950

Location: Turkey Point

Test Date: 5-16-08

Test Well: OW-721 L

AQUIFER DATA

Saturated Thickness: 90. ft

Anisotropy Ratio (Kz/Kr): 1.

SLUG TEST WELL DATA

Test Well: OW-721 L

X Location: 0. ft

Y Location: 0. ft

Initial Displacement: 2.451 ft

Static Water Column Height: 110. ft

Casing Radius: 0.083 ft

Well Radius: 0.25 ft

Well Skin Radius: 0.25 ft

Screen Length: 17. ft

Total Well Penetration Depth: 109. ft

No. of Observations: 39

Observation Data			
Time (sec)	Displacement (ft)	Time (sec)	Displacement (ft)
0.	2.451	115.7	0.175
3.18	1.824	125.3	0.167
6.54	1.613	136.1	0.142
10.14	1.423	147.5	0.135
13.74	1.271	159.5	0.12
17.94	1.126	172.1	0.119
22.14	1.001	185.3	0.112
26.34	0.899	199.7	0.102
31.14	0.799	214.7	0.099
36.54	0.702	230.3	0.099
41.34	0.634	247.1	0.096
47.34	0.55	265.1	0.091
53.34	0.477	283.7	0.09
59.34	0.424	304.1	0.095
65.94	0.372	325.1	0.088
73.14	0.325	347.3	0.089

Time (sec)	Displacement (ft)	Time (sec)	Displacement (ft)
80.94	0.289	371.3	0.09
88.74	0.253	396.5	0.092
97.14	0.229	422.9	0.091
106.1	0.197		

SOLUTION

Slug Test
 Aquifer Model: Confined
 Solution Method: KGS Model

VISUAL ESTIMATION RESULTS

Estimated Parameters

Parameter	Estimate	
Kr	1.13	ft/day
Ss	0.0002728	ft ⁻¹
Kz/Kr	1.	

K = 0.0003988 cm/sec
 T = K*b = 101.7 ft²/day (1.094 sq. cm/sec)

AUTOMATIC ESTIMATION RESULTS

Estimated Parameters

Parameter	Estimate	Std. Error	Approx. C.I.	t-Ratio	
Kr	1.13	0.04117	+/- 0.08342	27.46	ft/day
Ss	0.0002728	3.868E-5	+/- 7.836E-5	7.055	ft ⁻¹
Kz/Kr	1.	not estimated			

C.I. is approximate 95% confidence interval for parameter
 t-ratio = estimate/std. error
 No estimation window

K = 0.0003988 cm/sec
 T = K*b = 101.7 ft²/day (1.094 sq. cm/sec)

Parameter Correlations

	Kr	Ss
Kr	1.00	-0.93
Ss	-0.93	1.00

Residual Statistics

for weighted residuals

Sum of Squares... 0.02945 ft²
 Variance 0.0007959 ft²
 Std. Deviation 0.02821 ft
 Mean 0.004665 ft

No. of Residuals .. 39
No. of Estimates .. 2