

P-05-74

Supplement 1

August 2007

Oskarshamn site investigation

Difference flow logging of borehole KLX06

Subarea Laxemar

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Description

In the present supplement to SKB P-05-74 all groundwater head calculations have been redone on revised borehole elevation data (Z-coordinates).

The borehole coordinates that formed the basis for this revision of groundwater head data were retrieved from SKB Sicada 2007-03-07 EG154 (provided by SKB in file Krökdata_korrigerade_070307_KLX03-KLX29 utom KLX15, HLX13,15,26-28,32,36-38,43.xls) /Stenberg and Håkansson 2007/.

A slight displacement in the fracture frequency graph has also been fixed.

Specifically the following appendices are revised and included in this supplement:

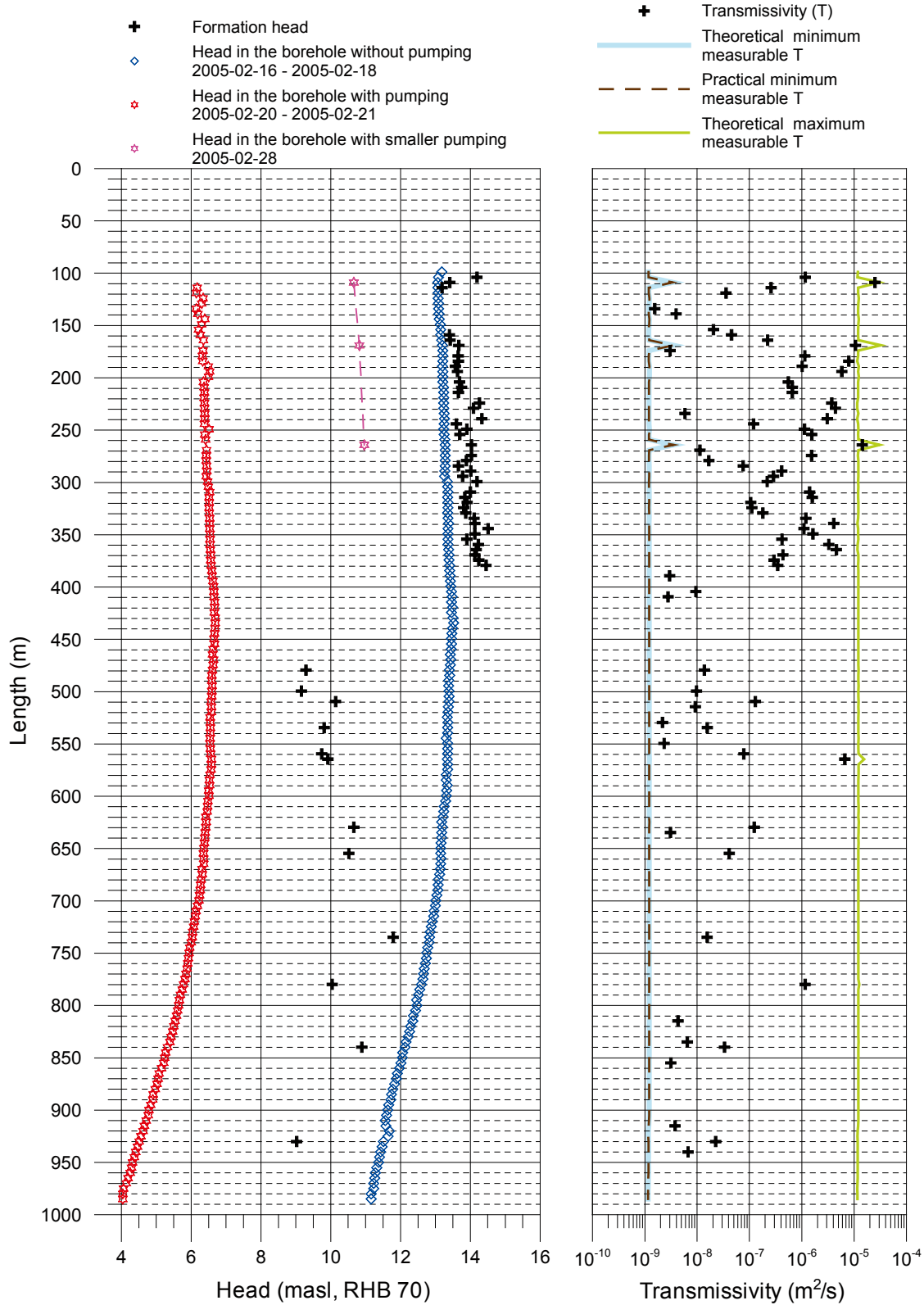
Revised appendices	Appendix number
Transmissivity and head of 5 m sections	Appendix 4.2
Transmissivity and head of detected fractures	Appendix 5
Sequential flow logging	Appendices 7.1–7.6
Inferred flow anomalies from overlapping flow logging	Appendices 8.1–8.5
Plotted conductive fracture frequency	Appendix 11
Comparison between section transmissivity and fracture transmissivity	Appendix 12
Head in the borehole during flowlogging	Appendix 13.1
Air pressure, water level in borehole and pumping rate during flow logging	Appendix 13.2
Groundwater recovery after pumping	Appendix 13.3

Reference

Stenberg L, Håkansson N, 2007. Revision of borehole deviation measurements in Oskarshamn, Svensk Kärnbränslehantering AB (in preparation).

Appendix 4.2

Laxemar, borehole KLX06 Transmissivity and head of 5 m sections



Laxemar, borehole KLX06
 Transmissivity and head of detected fractures

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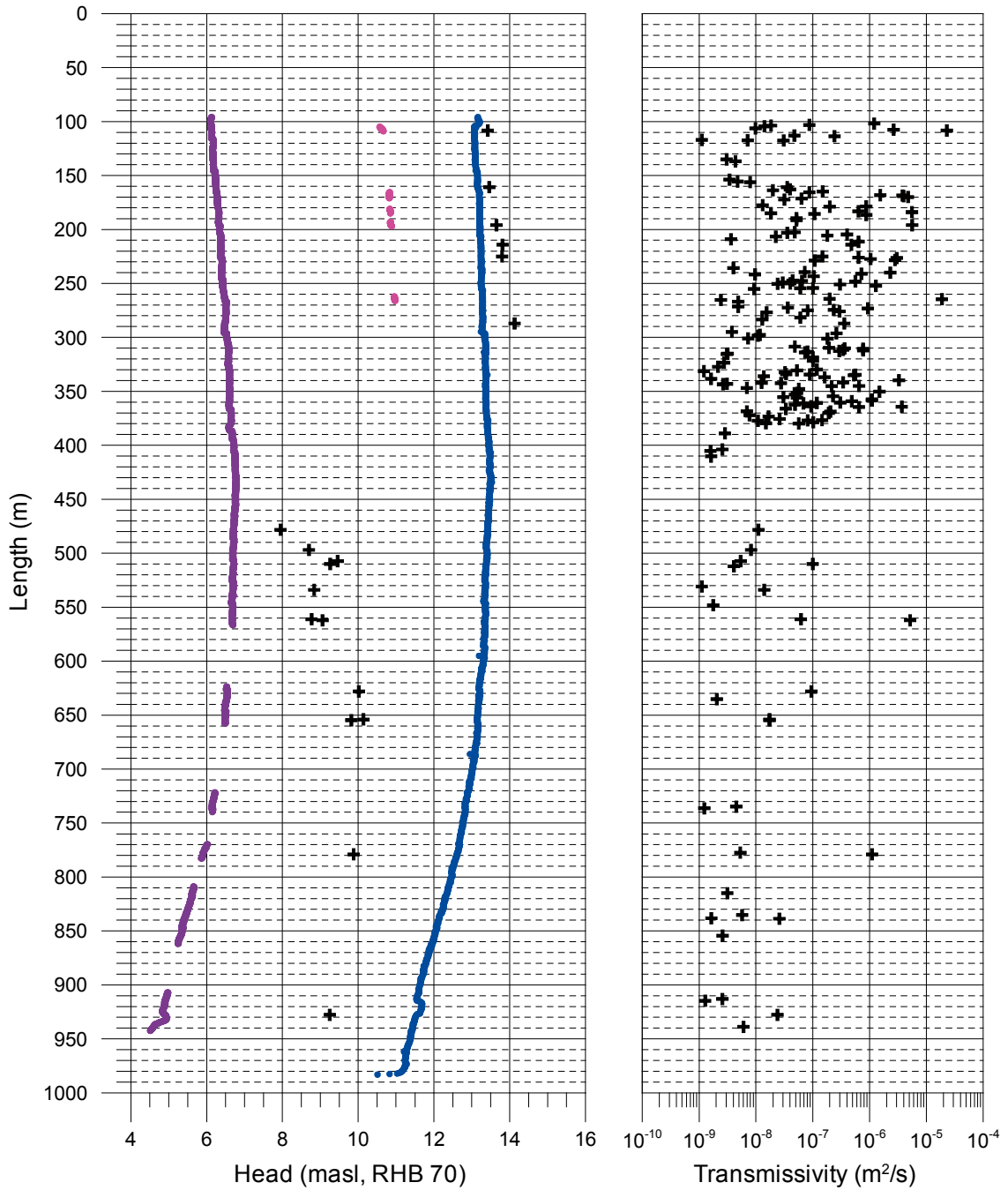
 Fracture head

• Head in the borehole without pumping (L=5 m, dL=0.5 m)
2005-02-16 - 2005-02-18

• Head in the borehole with pumping (L=1 m, dL=0.1 m)
2005-02-22 - 2005-02-25

• Head in the borehole with smaller pumping (L=1 m, dL=0.1 m)
2005-02-28
- +

 Transmissivity of fracture



Appendix 7.1

Difference flow logging – Sequential flow logging

Borehole ID	Secup L (m)	Seclow L (m)	L _w (m)	Q ₀ (m ³ /s)	dh ₀ (m)	Q ₁ (m ³ /s)	dh ₁ (m)	T _D (m ² /s)	h ₁ (m)	Q-lower limit P (mL/h)	TD-meas _{LT} (m ² /s)	TD-meas _{LP} (m ² /s)	TD-meas _U (m ² /s)	Comments
KLX06	96.33	101.33	5	–	13.18	–	6.19	–	–	30	1.2E–09	1.2E–09	1.2E–05	
KLX06	101.35	106.35	5	1.30E–06	13.09	9.53E–06	6.12	1.2E–06	14.2	30	1.2E–09	1.2E–09	1.2E–05	
KLX06	106.38	111.38	5	8.58E–06	13.07	6.94E–05	10.66	2.5E–05	13.4	30	3.4E–09	3.4E–09	3.1E–05	**
KLX06	111.40	116.40	5	3.14E–08	13.07	1.84E–06	6.17	2.6E–07	13.2	30	1.2E–09	1.2E–09	1.2E–05	
KLX06	116.41	121.41	5	–	13.08	2.50E–07	6.15	3.6E–08	–	30	1.2E–09	1.2E–09	1.2E–05	
KLX06	121.41	126.41	5	–	13.08	–	6.34	–	–	30	1.2E–09	1.2E–09	1.2E–05	
KLX06	126.42	131.42	5	–	13.09	–	6.30	–	–	30	1.2E–09	1.2E–09	1.2E–05	
KLX06	131.43	136.43	5	–	13.09	1.08E–08	6.15	1.5E–09	–	30	1.2E–09	1.2E–09	1.2E–05	
KLX06	136.43	141.43	5	–	13.10	2.78E–08	6.19	4.0E–09	–	30	1.2E–09	1.2E–09	1.2E–05	
KLX06	141.44	146.44	5	–	13.11	–	6.39	–	–	30	1.2E–09	1.2E–09	1.2E–05	
KLX06	146.44	151.44	5	–	13.14	–	6.30	–	–	30	1.2E–09	1.2E–09	1.2E–05	
KLX06	151.45	156.45	5	–	13.15	1.44E–07	6.21	2.1E–08	–	30	1.2E–09	1.2E–09	1.2E–05	
KLX06	156.46	161.46	5	1.17E–08	13.15	3.28E–07	6.26	4.5E–08	13.4	30	1.2E–09	1.2E–09	1.2E–05	
KLX06	161.46	166.46	5	5.44E–08	13.18	1.59E–06	6.35	2.2E–07	13.4	30	1.2E–09	1.2E–09	1.2E–05	
KLX06	166.47	171.47	5	5.00E–06	13.20	3.06E–05	10.82	1.1E–05	13.7	30	3.5E–09	3.5E–09	3.3E–05	**
KLX06	171.47	176.47	5	–	13.21	2.11E–08	6.34	3.0E–09	–	30	1.2E–09	1.2E–09	1.2E–05	
KLX06	176.48	181.48	5	5.11E–07	13.21	8.47E–06	6.32	1.1E–06	13.7	30	1.2E–09	1.2E–09	1.2E–05	
KLX06	181.49	186.49	5	3.64E–06	13.21	5.89E–05	6.33	7.9E–06	13.7	30	1.2E–09	1.2E–09	1.1E–05	
KLX06	186.49	191.49	5	3.81E–07	13.20	7.28E–06	6.49	1.0E–06	13.6	30	1.2E–09	1.2E–09	1.2E–05	
KLX06	191.50	196.50	5	2.51E–06	13.21	4.19E–05	6.53	5.8E–06	13.6	30	1.2E–09	1.2E–09	1.2E–05	
KLX06	196.51	201.51	5	–	13.21	–	6.50	–	–	30	1.2E–09	1.2E–09	1.2E–05	
KLX06	201.51	206.51	5	2.65E–07	13.21	4.08E–06	6.35	5.5E–07	13.7	30	1.2E–09	1.2E–09	1.2E–05	
KLX06	206.52	211.52	5	3.50E–07	13.23	4.94E–06	6.37	6.6E–07	13.8	30	1.2E–09	1.2E–09	1.2E–05	
KLX06	211.53	216.53	5	2.78E–07	13.24	4.86E–06	6.38	6.6E–07	13.7	30	1.2E–09	1.2E–09	1.2E–05	
KLX06	216.54	221.54	5	–	13.24	–	6.37	–	–	30	1.2E–09	1.2E–09	1.2E–05	
KLX06	221.55	226.55	5	3.86E–06	13.24	2.97E–05	6.38	3.7E–06	14.3	30	1.2E–09	1.2E–09	1.1E–05	
KLX06	226.56	231.56	5	3.75E–06	13.24	3.42E–05	6.38	4.4E–06	14.1	30	1.2E–09	1.2E–09	1.1E–05	
KLX06	231.57	236.57	5	–	13.25	4.06E–08	6.39	5.8E–09	–	30	1.2E–09	1.2E–09	1.2E–05	
KLX06	236.59	241.59	5	3.33E–06	13.26	2.47E–05	6.39	3.1E–06	14.3	30	1.2E–09	1.2E–09	1.2E–05	
KLX06	241.60	246.60	5	4.25E–08	13.25	8.75E–07	6.38	1.2E–07	13.6	30	1.2E–09	1.2E–09	1.2E–05	
KLX06	246.62	251.62	5	7.50E–07	13.24	8.42E–06	6.51	1.1E–06	13.9	30	1.2E–09	1.2E–09	1.2E–05	

Appendix 7.2

Borehole ID	Secup L (m)	Seclow L (m)	L _w (m)	Q ₀ (m ³ /s)	dh ₀ (m)	Q ₁ (m ³ /s)	dh ₁ (m)	T _D (m ² /s)	h _i (m)	Q-lower limit P (mL/h)	TD-meas _{L_T} (m ² /s)	TD-meas _{L_P} (m ² /s)	TD-meas _{L_U} (m ² /s)	Comments
KLX06	251.63	256.63	5	7.06E-07	13.25	1.15E-05	6.39	1.6E-06	13.7	30	1.2E-09	1.2E-09	1.2E-05	
KLX06	256.63	261.63	5	-	13.27	-	6.41	-	-	30	1.2E-09	1.2E-09	1.2E-05	
KLX06	261.64	266.64	5	1.08E-05	13.28	4.44E-05	10.96	1.4E-05	14.0	30	3.6E-09	3.6E-09	3.1E-05	**
KLX06	266.64	271.64	5	-	13.28	7.83E-08	6.44	1.1E-08	-	30	1.2E-09	1.2E-09	1.2E-05	
KLX06	271.65	276.65	5	1.17E-06	13.28	1.18E-05	6.43	1.5E-06	14.0	30	1.2E-09	1.2E-09	1.2E-05	
KLX06	276.66	281.66	5	1.03E-08	13.28	1.26E-07	6.43	1.7E-08	13.9	30	1.2E-09	1.2E-09	1.2E-05	
KLX06	281.67	286.67	5	2.92E-08	13.28	5.56E-07	6.44	7.6E-08	13.7	30	1.2E-09	1.2E-09	1.2E-05	
KLX06	286.68	291.68	5	3.08E-07	13.27	3.17E-06	6.45	4.1E-07	14.0	30	1.2E-09	1.2E-09	1.2E-05	
KLX06	291.69	296.69	5	1.52E-07	13.26	2.14E-06	6.43	2.9E-07	13.8	30	1.2E-09	1.2E-09	1.2E-05	
KLX06	296.69	301.69	5	1.88E-07	13.34	1.71E-06	6.47	2.2E-07	14.2	30	1.2E-09	1.2E-09	1.2E-05	
KLX06	301.70	306.70	5	-	13.35	-	6.49	-	-	30	1.2E-09	1.2E-09	1.2E-05	
KLX06	306.68	311.68	5	9.08E-07	13.36	1.07E-05	6.53	1.4E-06	14.0	30	1.2E-09	1.2E-09	1.2E-05	
KLX06	311.67	316.67	5	7.89E-07	13.35	1.17E-05	6.51	1.6E-06	13.8	30	1.2E-09	1.2E-09	1.2E-05	
KLX06	316.68	321.68	5	5.83E-08	13.36	7.89E-07	6.52	1.1E-07	13.9	30	1.2E-09	1.2E-09	1.2E-05	
KLX06	321.68	326.68	5	5.00E-08	13.36	8.19E-07	6.51	1.1E-07	13.8	30	1.2E-09	1.2E-09	1.2E-05	
KLX06	326.69	331.69	5	9.50E-08	13.35	1.34E-06	6.52	1.8E-07	13.9	30	1.2E-09	1.2E-09	1.2E-05	
KLX06	331.70	336.70	5	9.08E-07	13.36	9.17E-06	6.53	1.2E-06	14.1	30	1.2E-09	1.2E-09	1.2E-05	
KLX06	336.70	341.70	5	3.11E-06	13.38	3.14E-05	6.53	4.1E-06	14.1	30	1.2E-09	1.2E-09	1.2E-05	
KLX06	341.71	346.71	5	1.29E-06	13.36	8.92E-06	6.53	1.1E-06	14.5	30	1.2E-09	1.2E-09	1.2E-05	
KLX06	346.74	351.74	5	1.28E-06	13.36	1.25E-05	6.54	1.6E-06	14.1	30	1.2E-09	1.2E-09	1.2E-05	
KLX06	351.76	356.76	5	2.28E-07	13.36	3.11E-06	6.54	4.2E-07	13.9	30	1.2E-09	1.2E-09	1.2E-05	
KLX06	356.77	361.77	5	2.89E-06	13.36	2.54E-05	6.54	3.3E-06	14.2	30	1.2E-09	1.2E-09	1.2E-05	
KLX06	361.78	366.78	5	3.67E-06	13.38	3.53E-05	6.55	4.6E-06	14.2	30	1.2E-09	1.2E-09	1.2E-05	
KLX06	366.79	371.79	5	3.25E-07	13.39	3.33E-06	6.56	4.4E-07	14.1	30	1.2E-09	1.2E-09	1.2E-05	
KLX06	371.80	376.80	5	2.52E-07	13.39	2.28E-06	6.56	2.9E-07	14.2	30	1.2E-09	1.2E-09	1.2E-05	
KLX06	376.80	381.80	5	3.67E-07	13.41	2.78E-06	6.57	3.5E-07	14.5	30	1.2E-09	1.2E-09	1.2E-05	
KLX06	381.80	386.80	5	-	13.41	-	6.59	-	-	30	1.2E-09	1.2E-09	1.2E-05	
KLX06	386.80	391.80	5	-	13.42	2.06E-08	6.60	3.0E-09	-	30	1.2E-09	1.2E-09	1.2E-05	
KLX06	391.80	396.80	5	-	13.43	-	6.62	-	-	30	1.2E-09	1.2E-09	1.2E-05	
KLX06	396.82	401.82	5	-	13.44	-	6.64	-	-	30	1.2E-09	1.2E-09	1.2E-05	
KLX06	401.82	406.82	5	-	13.46	6.50E-08	6.65	9.4E-09	-	30	1.2E-09	1.2E-09	1.2E-05	
KLX06	406.83	411.83	5	-	13.48	1.92E-08	6.65	2.8E-09	-	30	1.2E-09	1.2E-09	1.2E-05	
KLX06	411.85	416.85	5	-	13.46	-	6.67	-	-	30	1.2E-09	1.2E-09	1.2E-05	

Appendix 7.3

Borehole ID	Secup L (m)	Seclow L (m)	L _w (m)	Q ₀ (m ³ /s)	dh ₀ (m)	Q ₁ (m ³ /s)	dh ₁ (m)	T _D (m ² /s)	h ₁ (m)	Q-lower limit P (mL/h)	TD-meas _{LT} (m ² /s)	TD-meas _{LP} (m ² /s)	TD-meas _U (m ² /s)	Comments
KLX06	416.85	421.85	5	–	13.49	–	6.67	–	–	30	1.2E–09	1.2E–09	1.2E–05	
KLX06	421.86	426.86	5	–	13.46	–	6.66	–	–	30	1.2E–09	1.2E–09	1.2E–05	
KLX06	426.86	431.86	5	–	13.50	–	6.69	–	–	30	1.2E–09	1.2E–09	1.2E–05	
KLX06	431.86	436.86	5	–	13.52	–	6.69	–	–	30	1.2E–09	1.2E–09	1.2E–05	
KLX06	436.87	441.87	5	–	13.49	–	6.68	–	–	30	1.2E–09	1.2E–09	1.2E–05	
KLX06	441.87	446.87	5	–	13.47	–	6.67	–	–	30	1.2E–09	1.2E–09	1.2E–05	
KLX06	446.88	451.88	5	–	13.46	–	6.65	–	–	30	1.2E–09	1.2E–09	1.2E–05	
KLX06	451.88	456.88	5	–	13.46	–	6.67	–	–	30	1.2E–09	1.2E–09	1.2E–05	
KLX06	456.89	461.89	5	–	13.45	–	6.63	–	–	30	1.2E–09	1.2E–09	1.2E–05	
KLX06	461.89	466.89	5	–	13.43	–	6.61	–	–	30	1.2E–09	1.2E–09	1.2E–05	
KLX06	466.89	471.89	5	–	13.44	–	6.64	–	–	30	1.2E–09	1.2E–09	1.2E–05	
KLX06	471.89	476.89	5	–	13.43	–	6.63	–	–	30	1.2E–09	1.2E–09	1.2E–05	
KLX06	476.89	481.89	5	–5.72E–08	13.40	3.72E–08	6.61	1.4E–08	9.3	30	1.2E–09	1.2E–09	1.2E–05	
KLX06	481.90	486.90	5	–	13.41	–	6.59	–	–	30	1.2E–09	1.2E–09	1.2E–05	
KLX06	486.90	491.90	5	–	13.38	–	6.59	–	–	30	1.2E–09	1.2E–09	1.2E–05	
KLX06	491.90	496.90	5	–	13.38	–	6.60	–	–	30	1.2E–09	1.2E–09	1.2E–05	
KLX06	496.91	501.91	5	–4.17E–08	13.39	2.53E–08	6.59	9.7E–09	9.2	30	1.2E–09	1.2E–09	1.2E–05	
KLX06	501.91	506.91	5	–	13.39	–	6.59	–	–	30	1.2E–09	1.2E–09	1.2E–05	
KLX06	506.92	511.92	5	–4.25E–07	13.39	4.67E–07	6.57	1.3E–07	10.1	30	1.2E–09	1.2E–09	1.2E–05	
KLX06	511.92	516.92	5	–	13.37	6.36E–08	6.58	9.3E–09	–	30	1.2E–09	1.2E–09	1.2E–05	
KLX06	516.93	521.93	5	–	13.36	–	6.58	–	–	30	1.2E–09	1.2E–09	1.2E–05	
KLX06	521.94	526.94	5	–	13.34	–	6.54	–	–	30	1.2E–09	1.2E–09	1.2E–05	
KLX06	526.94	531.94	5	–	13.36	1.50E–08	6.55	2.2E–09	–	30	1.2E–09	1.2E–09	1.2E–05	
KLX06	531.95	536.95	5	–5.61E–08	13.35	5.17E–08	6.55	1.6E–08	9.8	30	1.2E–09	1.2E–09	1.2E–05	
KLX06	536.95	541.95	5	–	13.35	–	6.55	–	–	30	1.2E–09	1.2E–09	1.2E–05	
KLX06	541.96	546.96	5	–	13.31	–	6.54	–	–	30	1.2E–09	1.2E–09	1.2E–05	
KLX06	546.97	551.97	5	–	13.35	1.61E–08	6.54	2.3E–09	–	30	1.2E–09	1.2E–09	1.2E–05	
KLX06	551.96	556.96	5	–	13.35	–	6.55	–	–	30	1.2E–09	1.2E–09	1.2E–05	
KLX06	556.97	561.97	5	–2.86E–07	13.35	2.52E–07	6.56	7.8E–08	9.7	30	1.2E–09	1.2E–09	1.2E–05	
KLX06	561.97	566.97	5	–2.29E–05	13.34	2.24E–05	6.58	6.6E–06	9.9	30	1.2E–09	1.2E–09	1.6E–05	
KLX06	566.98	571.98	5	–	13.35	–	6.58	–	–	30	1.2E–09	1.2E–09	1.2E–05	
KLX06	571.99	576.99	5	–	13.35	–	6.57	–	–	30	1.2E–09	1.2E–09	1.2E–05	
KLX06	577.00	582.00	5	–	13.31	–	6.54	–	–	30	1.2E–09	1.2E–09	1.2E–05	

Appendix 7.4

Borehole ID	Secup L (m)	Seclow L (m)	L _w (m)	Q ₀ (m ³ /s)	dh ₀ (m)	Q ₁ (m ³ /s)	dh ₁ (m)	T _D (m ² /s)	h _i (m)	Q-lower limit P (mL/h)	TD-measl _{LT} (m ² /s)	TD-measl _{LP} (m ² /s)	TD-measl _U (m ² /s)	Comments
KLX06	582.01	587.01	5	–	13.31	–	6.52	–	–	30	1.2E–09	1.2E–09	1.2E–05	
KLX06	587.02	592.02	5	–	13.34	–	6.53	–	–	30	1.2E–09	1.2E–09	1.2E–05	
KLX06	592.03	597.03	5	–	13.32	–	6.50	–	–	30	1.2E–09	1.2E–09	1.2E–05	
KLX06	597.04	602.04	5	–	13.31	–	6.51	–	–	30	1.2E–09	1.2E–09	1.2E–05	
KLX06	602.05	607.05	5	–	13.29	–	6.48	–	–	30	1.2E–09	1.2E–09	1.2E–05	
KLX06	607.06	612.06	5	–	13.25	–	6.47	–	–	30	1.2E–09	1.2E–09	1.2E–05	
KLX06	612.07	617.07	5	–	13.24	–	6.46	–	–	30	1.2E–09	1.2E–09	1.2E–05	
KLX06	617.08	622.08	5	–	13.22	–	6.42	–	–	30	1.2E–09	1.2E–09	1.2E–05	
KLX06	622.09	627.09	5	–	13.18	–	6.43	–	–	30	1.2E–09	1.2E–09	1.2E–05	
KLX06	627.10	632.10	5	–3.17E–07	13.20	5.28E–07	6.42	1.2E–07	10.7	30	1.2E–09	1.2E–09	1.2E–05	
KLX06	632.12	637.12	5	–	13.18	2.11E–08	6.40	3.1E–09	–	30	1.2E–09	1.2E–09	1.2E–05	
KLX06	637.11	642.11	5	–	13.18	–	6.39	–	–	30	1.2E–09	1.2E–09	1.2E–05	
KLX06	642.11	647.11	5	–	13.16	–	6.38	–	–	30	1.2E–09	1.2E–09	1.2E–05	
KLX06	647.11	652.11	5	–	13.15	–	6.36	–	–	30	1.2E–09	1.2E–09	1.2E–05	
KLX06	652.10	657.10	5	–1.09E–07	13.15	1.73E–07	6.35	4.1E–08	10.5	30	1.2E–09	1.2E–09	1.2E–05	
KLX06	657.10	662.10	5	–	13.16	–	6.36	–	–	30	1.2E–09	1.2E–09	1.2E–05	
KLX06	662.10	667.10	5	–	13.15	–	6.36	–	–	30	1.2E–09	1.2E–09	1.2E–05	
KLX06	667.09	672.09	5	–	13.14	–	6.31	–	–	30	1.2E–09	1.2E–09	1.2E–05	
KLX06	672.09	677.09	5	–	13.12	–	6.32	–	–	30	1.2E–09	1.2E–09	1.2E–05	
KLX06	677.09	682.09	5	–	13.09	–	6.29	–	–	30	1.2E–09	1.2E–09	1.2E–05	
KLX06	682.10	687.10	5	–	13.08	–	6.27	–	–	30	1.2E–09	1.2E–09	1.2E–05	
KLX06	687.12	692.12	5	–	13.07	–	6.26	–	–	30	1.2E–09	1.2E–09	1.2E–05	
KLX06	692.12	697.12	5	–	13.04	–	6.24	–	–	30	1.2E–09	1.2E–09	1.2E–05	
KLX06	697.13	702.13	5	–	13.01	–	6.22	–	–	30	1.2E–09	1.2E–09	1.2E–05	
KLX06	702.14	707.14	5	–	13.00	–	6.18	–	–	30	1.2E–09	1.2E–09	1.2E–05	
KLX06	707.15	712.15	5	–	12.96	–	6.14	–	–	30	1.2E–09	1.2E–09	1.2E–05	
KLX06	712.16	717.16	5	–	12.95	–	6.12	–	–	30	1.2E–09	1.2E–09	1.2E–05	
KLX06	717.17	722.17	5	–	12.91	–	6.09	–	–	30	1.2E–09	1.2E–09	1.2E–05	
KLX06	722.18	727.18	5	–	12.88	–	6.07	–	–	30	1.2E–09	1.2E–09	1.2E–05	
KLX06	727.19	732.19	5	–	12.85	–	6.04	–	–	30	1.2E–09	1.2E–09	1.2E–05	
KLX06	732.19	737.19	5	–1.64E–08	12.83	9.06E–08	6.03	1.6E–08	11.8	30	1.2E–09	1.2E–09	1.2E–05	
KLX06	737.20	742.20	5	–	12.82	–	6.00	–	–	30	1.2E–09	1.2E–09	1.2E–05	
KLX06	742.21	747.21	5	–	12.78	–	5.96	–	–	30	1.2E–09	1.2E–09	1.2E–05	

Appendix 7.5

Borehole ID	Secup L (m)	Seclow L (m)	L _w (m)	Q ₀ (m ³ /s)	dh ₀ (m)	Q ₁ (m ³ /s)	dh ₁ (m)	T _D (m ² /s)	h ₁ (m)	Q-lower limit P (mL/h)	TD-meas _{LT} (m ² /s)	TD-meas _{LP} (m ² /s)	TD-meas _{LU} (m ² /s)	Comments
KLX06	747.22	752.22	5	–	12.75	–	5.94	–	–	30	1.2E–09	1.2E–09	1.2E–05	
KLX06	752.23	757.23	5	–	12.74	–	5.92	–	–	30	1.2E–09	1.2E–09	1.2E–05	
KLX06	757.24	762.24	5	–	12.71	–	5.90	–	–	30	1.2E–09	1.2E–09	1.2E–05	
KLX06	762.24	767.24	5	–	12.68	–	5.88	–	–	30	1.2E–09	1.2E–09	1.2E–05	
KLX06	767.25	772.25	5	–	12.66	–	5.85	–	–	30	1.2E–09	1.2E–09	1.2E–05	
KLX06	772.26	777.26	5	–	12.64	–	5.82	–	–	30	1.2E–09	1.2E–09	1.2E–05	
KLX06	777.27	782.27	5	–3.00E–06	12.60	5.00E–06	5.78	1.2E–06	10.0	30	1.2E–09	1.2E–09	1.3E–05	
KLX06	782.27	787.27	5	–	12.55	–	5.74	–	–	30	1.2E–09	1.2E–09	1.2E–05	
KLX06	787.28	792.28	5	–	12.51	–	5.69	–	–	30	1.2E–09	1.2E–09	1.2E–05	
KLX06	792.29	797.29	5	–	12.46	–	5.66	–	–	30	1.2E–09	1.2E–09	1.2E–05	
KLX06	797.30	802.30	5	–	12.47	–	5.64	–	–	30	1.2E–09	1.2E–09	1.2E–05	
KLX06	802.30	807.30	5	–	12.43	–	5.61	–	–	30	1.2E–09	1.2E–09	1.2E–05	
KLX06	807.31	812.31	5	–	12.37	–	5.58	–	–	30	1.2E–09	1.2E–09	1.2E–05	
KLX06	812.32	817.32	5	–	12.35	2.97E–08	5.54	4.3E–09	–	30	1.2E–09	1.2E–09	1.2E–05	
KLX06	817.32	822.32	5	–	12.29	–	5.50	–	–	30	1.2E–09	1.2E–09	1.2E–05	
KLX06	822.33	827.33	5	–	12.26	–	5.47	–	–	30	1.2E–09	1.2E–09	1.2E–05	
KLX06	827.33	832.33	5	–	12.22	–	5.42	–	–	30	1.2E–09	1.2E–09	1.2E–05	
KLX06	832.34	837.34	5	–	12.16	4.44E–08	5.39	6.5E–09	–	30	1.2E–09	1.2E–09	1.2E–05	
KLX06	837.35	842.35	5	–4.19E–08	12.13	1.88E–07	5.32	3.3E–08	10.9	30	1.2E–09	1.2E–09	1.2E–05	
KLX06	842.37	847.37	5	–	12.06	–	5.27	–	–	30	1.2E–09	1.2E–09	1.2E–05	
KLX06	847.39	852.39	5	–	12.05	–	5.24	–	–	30	1.2E–09	1.2E–09	1.2E–05	
KLX06	852.41	857.41	5	–	12.01	2.17E–08	5.21	3.2E–09	–	30	1.2E–09	1.2E–09	1.2E–05	
KLX06	857.42	862.42	5	–	11.97	–	5.15	–	–	30	1.2E–09	1.2E–09	1.2E–05	
KLX06	862.44	867.44	5	–	11.91	–	5.08	–	–	30	1.2E–09	1.2E–09	1.2E–05	
KLX06	867.46	872.46	5	–	11.88	–	5.05	–	–	30	1.2E–09	1.2E–09	1.2E–05	
KLX06	872.47	877.47	5	–	11.83	–	5.02	–	–	30	1.2E–09	1.2E–09	1.2E–05	
KLX06	877.47	882.47	5	–	11.78	–	4.97	–	–	30	1.2E–09	1.2E–09	1.2E–05	
KLX06	882.47	887.47	5	–	11.74	–	4.91	–	–	30	1.2E–09	1.2E–09	1.2E–05	
KLX06	887.48	892.48	5	–	11.72	–	4.90	–	–	30	1.2E–09	1.2E–09	1.2E–05	
KLX06	892.48	897.48	5	–	11.66	–	4.84	–	–	30	1.2E–09	1.2E–09	1.2E–05	
KLX06	897.48	902.48	5	–	11.63	–	4.79	–	–	30	1.2E–09	1.2E–09	1.2E–05	
KLX06	902.48	907.48	5	–	11.60	–	4.77	–	–	30	1.2E–09	1.2E–09	1.2E–05	
KLX06	907.49	912.49	5	–	11.56	–	4.71	–	–	30	1.2E–09	1.2E–09	1.2E–05	

Appendix 7.6

Borehole ID	Secup L (m)	Seclow L (m)	L _w (m)	Q ₀ (m ³ /s)	dh ₀ (m)	Q ₁ (m ³ /s)	dh ₁ (m)	T _D (m ² /s)	h _i (m)	Q-lower limit P (mL/h)	TD-meas _{LT} (m ² /s)	TD-meas _{LP} (m ² /s)	TD-meas _U (m ² /s)	Comments
KLX06	912.49	917.49	5	–	11.58	2.64E–08	4.66	3.8E–09	–	30	1.2E–09	1.2E–09	1.2E–05	
KLX06	917.49	922.49	5	–	11.68	–	4.62	–	–	30	1.2E–09	1.2E–09	1.2E–05	
KLX06	922.49	927.49	5	–	11.64	–	4.56	–	–	30	1.2E–09	1.2E–09	1.2E–05	
KLX06	927.50	932.50	5	–5.67E–08	11.51	1.03E–07	4.51	2.3E–08	9.0	30	1.2E–09	1.2E–09	1.2E–05	
KLX06	932.50	937.50	5	–	11.47	–	4.46	–	–	30	1.2E–09	1.2E–09	1.2E–05	
KLX06	937.50	942.50	5	–	11.43	4.78E–08	4.41	6.7E–09	–	30	1.2E–09	1.2E–09	1.2E–05	
KLX06	942.50	947.50	5	–	11.40	–	4.37	–	–	30	1.2E–09	1.2E–09	1.2E–05	
KLX06	947.50	952.50	5	–	11.37	–	4.32	–	–	30	1.2E–09	1.2E–09	1.2E–05	
KLX06	952.50	957.50	5	–	11.32	–	4.29	–	–	30	1.2E–09	1.2E–09	1.2E–05	
KLX06	957.50	962.50	5	–	11.28	–	4.25	–	–	30	1.2E–09	1.2E–09	1.2E–05	
KLX06	962.50	967.50	5	–	11.26	–	4.19	–	–	30	1.2E–09	1.2E–09	1.2E–05	
KLX06	967.50	972.50	5	–	11.23	–	4.14	–	–	30	1.2E–09	1.2E–09	1.2E–05	
KLX06	972.50	977.50	5	–	11.23	–	4.06	–	–	30	1.2E–09	1.2E–09	1.2E–05	
KLX06	977.51	982.51	5	–	11.16	–	4.04	–	–	30	1.2E–09	1.2E–09	1.2E–05	
KLX06	982.52	987.52	5	–	11.16	–	4.04	–	–	30	1.2E–09	1.2E–09	1.2E–05	

** Values from the measurement with smaller pumping (original flow over measurement limit).

Appendix 8.1

PFL – Difference flow logging – Inferred flow anomalies from overlapping flow logging

Borehole ID	Length to flow anom. L (m)	L_w (m)	dL (m)	Q_0 (m ³ /s)	dh_0 (m)	Q_1 (m ³ /s)	dh_1 (m)	T_D (m ² /s)	h_i (m)	Comments
KLX06	101.9	1	0.1	–	13.20	8.69E–06	6.11	1.2E–06	–	
KLX06	103.2	1	0.1	–	13.14	6.19E–07	6.12	8.7E–08	–	
KLX06	103.8	1	0.1	–	13.10	1.31E–07	6.12	1.9E–08	–	
KLX06	104.5	1	0.1	–	13.08	1.00E–07	6.13	1.4E–08	–	
KLX06	106.3	1	0.1	–	13.10	6.94E–08	6.12	9.8E–09	–	
KLX06	107.6	1	0.1	–	13.07	1.86E–05	6.12	2.7E–06	–	
KLX06	108.4	1	0.1	8.06E–06	13.07	6.39E–05	10.66	2.3E–05	13.4	**
KLX06	113.1	1	0.1	–	13.07	3.33E–07	6.13	4.8E–08	–	
KLX06	113.6	1	0.1	–	13.07	1.69E–06	6.13	2.4E–07	–	
KLX06	117.1	1	0.1	–	13.07	7.78E–09	6.17	1.1E–09	–	*
KLX06	117.4	1	0.1	–	13.08	5.00E–08	6.17	7.2E–09	–	*
KLX06	117.6	1	0.1	–	13.08	2.14E–07	6.17	3.1E–08	–	
KLX06	135.1	1	0.1	–	13.09	2.14E–08	6.16	3.1E–09	–	
KLX06	136.8	1	0.1	–	13.09	3.06E–08	6.17	4.4E–09	–	
KLX06	153.9	1	0.1	–	13.15	2.39E–08	6.24	3.4E–09	–	
KLX06	155.5	1	0.1	–	13.16	3.33E–08	6.24	4.8E–09	–	
KLX06	156.1	1	0.1	–	13.16	5.56E–08	6.23	7.9E–09	–	
KLX06	160.8	1	0.1	1.08E–08	13.16	2.58E–07	6.24	3.5E–08	13.5	
KLX06	162.8	1	0.1	–	13.17	2.78E–07	6.25	4.0E–08	–	*
KLX06	163.7	1	0.1	–	13.18	1.39E–07	6.26	2.0E–08	–	*
KLX06	164.8	1	0.1	–	13.19	1.06E–06	6.25	1.5E–07	–	
KLX06	165.6	1	0.1	–	13.19	6.11E–07	6.25	8.7E–08	–	
KLX06	168.2	1	0.1	–	13.19	1.08E–05	6.28	1.6E–06	–	
KLX06	168.6	1	0.1	–	13.20	2.67E–05	6.28	3.8E–06	–	
KLX06	169.2	1	0.1	–	13.20	2.78E–05	6.28	4.0E–06	–	
KLX06	170.0	1	0.1	–	13.19	3.33E–05	6.28	4.8E–06	–	
KLX06	171.4	1	0.1	–	13.21	4.44E–07	6.29	6.4E–08	–	*
KLX06	172.4	1	0.1	–	13.20	2.22E–07	6.28	3.2E–08	–	*
KLX06	177.5	1	0.1	–	13.20	9.17E–08	6.28	1.3E–08	–	
KLX06	178.7	1	0.1	–	13.21	6.11E–06	6.30	8.8E–07	–	
KLX06	179.0	1	0.1	–	13.21	1.39E–06	6.30	2.0E–07	–	
KLX06	183.2	1	0.1	–	13.21	4.44E–06	6.32	6.4E–07	–	
KLX06	184.0	1	0.1	–	13.21	3.89E–05	6.32	5.6E–06	–	
KLX06	185.0	1	0.1	–	13.20	1.28E–07	6.32	1.8E–08	–	*
KLX06	185.6	1	0.1	–	13.20	7.50E–07	6.33	1.1E–07	–	
KLX06	186.5	1	0.1	–	13.21	6.11E–06	6.31	8.8E–07	–	
KLX06	189.6	1	0.1	–	13.21	3.61E–07	6.32	5.2E–08	–	
KLX06	191.5	1	0.1	–	13.21	3.61E–07	6.31	5.2E–08	–	
KLX06	196.0	1	0.1	2.50E–06	13.21	4.17E–05	6.34	5.6E–06	13.7	
KLX06	202.6	1	0.1	–	13.21	3.33E–07	6.35	4.8E–08	–	
KLX06	203.1	1	0.1	–	13.22	2.47E–07	6.35	3.6E–08	–	
KLX06	204.7	1	0.1	–	13.21	2.78E–06	6.36	4.0E–07	–	
KLX06	205.7	1	0.1	–	13.21	1.25E–06	6.37	1.8E–07	–	
KLX06	206.7	1	0.1	–	13.24	1.56E–07	6.38	2.2E–08	–	

Appendix 8.2

Borehole ID	Length to flow anom. L (m)	L_w (m)	dL (m)	Q_0 (m ³ /s)	dh_0 (m)	Q_1 (m ³ /s)	dh_1 (m)	T_D (m ² /s)	h_i (m)	Comments
KLX06	209.1	1	0.1	–	13.23	2.53E–08	6.38	3.7E–09	–	
KLX06	211.4	1	0.1	–	13.23	4.44E–06	6.38	6.4E–07	–	
KLX06	214.2	1	0.1	2.78E–07	13.24	3.61E–06	6.38	4.8E–07	13.8	
KLX06	225.0	1	0.1	8.33E–08	13.24	1.11E–06	6.37	1.5E–07	13.8	
KLX06	226.1	1	0.1	–	13.25	4.44E–06	6.39	6.4E–07	–	*
KLX06	226.5	1	0.1	–	13.25	2.08E–05	6.41	3.0E–06	–	
KLX06	227.4	1	0.1	–	13.25	7.22E–06	6.40	1.0E–06	–	
KLX06	228.3	1	0.1	–	13.25	1.94E–05	6.40	2.8E–06	–	
KLX06	228.8	1	0.1	–	13.25	7.50E–07	6.42	1.1E–07	–	*
KLX06	235.8	1	0.1	–	13.24	2.78E–08	6.40	4.0E–09	–	
KLX06	239.5	1	0.1	–	13.25	5.00E–07	6.40	7.2E–08	–	*
KLX06	240.0	1	0.1	–	13.26	1.61E–05	6.40	2.3E–06	–	
KLX06	241.1	1	0.1	–	13.27	5.00E–06	6.39	7.2E–07	–	
KLX06	241.7	1	0.1	–	13.25	6.67E–08	6.39	9.6E–09	–	
KLX06	243.5	1	0.1	–	13.26	7.22E–07	6.40	1.0E–07	–	
KLX06	247.3	1	0.1	–	13.25	3.06E–07	6.42	4.4E–08	–	
KLX06	247.7	1	0.1	–	13.25	4.44E–07	6.42	6.4E–08	–	
KLX06	248.1	1	0.1	–	13.25	3.89E–06	6.43	5.6E–07	–	
KLX06	249.2	1	0.1	–	13.24	2.06E–07	6.42	3.0E–08	–	*
KLX06	250.0	1	0.1	–	13.24	2.78E–07	6.42	4.0E–08	–	
KLX06	250.4	1	0.1	–	13.25	1.67E–07	6.42	2.4E–08	–	
KLX06	251.0	1	0.1	–	13.26	2.08E–06	6.43	3.0E–07	–	
KLX06	252.2	1	0.1	–	13.25	8.89E–06	6.41	1.3E–06	–	
KLX06	254.3	1	0.1	–	13.25	6.94E–07	6.43	1.0E–07	–	
KLX06	254.5	1	0.1	–	13.26	4.17E–07	6.44	6.0E–08	–	*
KLX06	255.1	1	0.1	–	13.25	6.39E–08	6.44	9.3E–09	–	*
KLX06	264.3	1	0.1	–	13.29	1.36E–06	6.48	2.0E–07	–	
KLX06	264.7	1	0.1	–	13.28	4.42E–05	10.97	1.9E–05	–	**
KLX06	265.3	1	0.1	–	13.28	1.67E–08	6.48	2.4E–09	–	*
KLX06	267.0	1	0.1	–	13.29	3.33E–08	6.52	4.9E–09	–	
KLX06	271.6	1	0.1	–	13.28	3.33E–08	6.51	4.9E–09	–	
KLX06	272.4	1	0.1	–	13.29	2.50E–07	6.51	3.7E–08	–	
KLX06	273.1	1	0.1	–	13.28	6.39E–06	6.50	9.3E–07	–	
KLX06	274.6	1	0.1	–	13.28	1.61E–06	6.50	2.4E–07	–	
KLX06	275.0	1	0.1	–	13.29	5.56E–07	6.52	8.1E–08	–	
KLX06	276.0	1	0.1	–	13.28	2.03E–06	6.52	3.0E–07	–	
KLX06	276.8	1	0.1	–	13.28	1.06E–07	6.52	1.5E–08	–	
KLX06	281.7	1	0.1	–	13.30	4.17E–07	6.50	6.1E–08	–	
KLX06	283.5	1	0.1	–	13.30	8.89E–08	6.50	1.3E–08	–	
KLX06	287.1	1	0.1	3.06E–07	13.29	2.78E–06	6.48	3.6E–07	14.1	
KLX06	294.9	1	0.1	–	13.25	2.58E–08	6.47	3.8E–09	–	*
KLX06	296.2	1	0.1	–	13.34	1.81E–06	6.51	2.6E–07	–	
KLX06	297.6	1	0.1	–	13.34	8.06E–08	6.52	1.2E–08	–	
KLX06	298.4	1	0.1	–	13.34	7.50E–08	6.53	1.1E–08	–	
KLX06	300.9	1	0.1	–	13.34	5.00E–08	6.54	7.3E–09	–	*
KLX06	301.2	1	0.1	–	13.35	1.25E–06	6.55	1.8E–07	–	

Appendix 8.3

Borehole ID	Length to flow anom. L (m)	L_w (m)	dL (m)	Q_0 (m ³ /s)	dh ₀ (m)	Q_1 (m ³ /s)	dh ₁ (m)	T_D (m ² /s)	h _i (m)	Comments
KLX06	308.5	1	0.1	–	13.37	3.33E–07	6.57	4.9E–08	–	
KLX06	309.7	1	0.1	–	13.38	1.33E–06	6.58	1.9E–07	–	
KLX06	310.2	1	0.1	–	13.38	2.50E–06	6.58	3.6E–07	–	
KLX06	310.5	1	0.1	–	13.37	5.28E–06	6.59	7.7E–07	–	*
KLX06	311.5	1	0.1	–	13.37	2.36E–06	6.59	3.4E–07	–	*
KLX06	312.1	1	0.1	–	13.36	5.28E–06	6.59	7.7E–07	–	
KLX06	312.6	1	0.1	–	13.35	2.00E–06	6.59	2.9E–07	–	*
KLX06	313.3	1	0.1	–	13.36	5.56E–07	6.58	8.1E–08	–	*
KLX06	314.0	1	0.1	–	13.34	5.00E–07	6.58	7.3E–08	–	
KLX06	315.0	1	0.1	–	13.37	2.19E–08	6.57	3.2E–09	–	*
KLX06	315.5	1	0.1	–	13.36	2.11E–08	6.58	3.1E–09	–	*
KLX06	318.5	1	0.1	–	13.36	6.94E–07	6.57	1.0E–07	–	
KLX06	321.8	1	0.1	–	13.36	6.94E–07	6.57	1.0E–07	–	
KLX06	323.5	1	0.1	–	13.35	1.89E–08	6.57	2.8E–09	–	
KLX06	327.2	1	0.1	–	13.36	1.47E–08	6.61	2.2E–09	–	
KLX06	329.7	1	0.1	–	13.37	8.06E–07	6.60	1.2E–07	–	
KLX06	330.6	1	0.1	–	13.37	3.61E–07	6.60	5.3E–08	–	
KLX06	331.4	1	0.1	–	13.37	8.33E–09	6.59	1.2E–09	–	*
KLX06	332.4	1	0.1	–	13.36	2.22E–07	6.60	3.3E–08	–	
KLX06	334.1	1	0.1	–	13.37	2.33E–07	6.61	3.4E–08	–	
KLX06	334.4	1	0.1	–	13.38	6.11E–07	6.61	8.9E–08	–	
KLX06	334.7	1	0.1	–	13.41	3.89E–06	6.60	5.7E–07	–	
KLX06	335.1	1	0.1	–	13.38	3.61E–06	6.61	5.3E–07	–	
KLX06	336.1	1	0.1	–	13.37	9.44E–08	6.60	1.4E–08	–	*
KLX06	336.9	1	0.1	–	13.38	1.11E–06	6.60	1.6E–07	–	
KLX06	338.4	1	0.1	–	13.38	1.11E–08	6.62	1.6E–09	–	*
KLX06	339.7	1	0.1	–	13.38	2.25E–05	6.61	3.3E–06	–	
KLX06	341.7	1	0.1	–	13.37	2.33E–06	6.60	3.4E–07	–	
KLX06	342.2	1	0.1	–	13.37	8.61E–08	6.60	1.3E–08	–	*
KLX06	342.5	1	0.1	–	13.37	1.89E–07	6.61	2.8E–08	–	
KLX06	343.0	1	0.1	–	13.36	2.11E–08	6.60	3.1E–09	–	*
KLX06	343.4	1	0.1	–	13.36	1.81E–08	6.60	2.6E–09	–	*
KLX06	345.0	1	0.1	–	13.36	4.44E–06	6.60	6.5E–07	–	
KLX06	345.2	1	0.1	–	13.36	1.47E–06	6.61	2.2E–07	–	
KLX06	346.9	1	0.1	–	13.38	4.72E–08	6.61	6.9E–09	–	
KLX06	347.8	1	0.1	–	13.38	3.89E–07	6.61	5.7E–08	–	
KLX06	350.3	1	0.1	–	13.37	1.03E–05	6.61	1.5E–06	–	
KLX06	351.5	1	0.1	–	13.37	3.61E–07	6.60	5.3E–08	–	
KLX06	353.0	1	0.1	–	13.37	3.33E–07	6.61	4.9E–08	–	
KLX06	354.6	1	0.1	–	13.37	1.56E–06	6.61	2.3E–07	–	
KLX06	355.4	1	0.1	–	13.36	2.08E–07	6.61	3.1E–08	–	
KLX06	355.8	1	0.1	–	13.37	3.61E–07	6.61	5.3E–08	–	
KLX06	357.5	1	0.1	–	13.36	7.50E–06	6.61	1.1E–06	–	
KLX06	358.6	1	0.1	–	13.37	7.50E–06	6.61	1.1E–06	–	
KLX06	359.2	1	0.1	–	13.36	3.33E–06	6.60	4.9E–07	–	
KLX06	360.4	1	0.1	–	13.37	2.08E–06	6.59	3.0E–07	–	

Appendix 8.4

Borehole ID	Length to flow anom. L (m)	L_w (m)	dL (m)	Q_0 (m ³ /s)	dh_0 (m)	Q_1 (m ³ /s)	dh_1 (m)	T_D (m ² /s)	h_1 (m)	Comments
KLX06	360.7	1	0.1	–	13.37	8.06E–07	6.59	1.2E–07	–	*
KLX06	361.2	1	0.1	–	13.38	4.72E–07	6.60	6.9E–08	–	*
KLX06	362.3	1	0.1	–	13.39	3.33E–07	6.60	4.9E–08	–	*
KLX06	363.8	1	0.1	–	13.38	6.39E–07	6.60	9.3E–08	–	
KLX06	364.3	1	0.1	–	13.38	2.53E–05	6.60	3.7E–06	–	
KLX06	364.6	1	0.1	–	13.37	4.44E–06	6.60	6.5E–07	–	
KLX06	366.2	1	0.1	–	13.38	2.31E–07	6.59	3.4E–08	–	
KLX06	368.6	1	0.1	–	13.38	4.72E–08	6.64	6.9E–09	–	*
KLX06	368.8	1	0.1	–	13.39	1.39E–06	6.65	2.0E–07	–	
KLX06	370.1	1	0.1	–	13.39	1.31E–06	6.64	1.9E–07	–	
KLX06	372.1	1	0.1	–	13.39	5.28E–08	6.64	7.7E–09	–	
KLX06	373.4	1	0.1	–	13.40	1.14E–07	6.65	1.7E–08	–	
KLX06	375.6	1	0.1	–	13.39	1.78E–07	6.64	2.6E–08	–	
KLX06	376.7	1	0.1	–	13.43	1.00E–06	6.66	1.5E–07	–	
KLX06	377.0	1	0.1	–	13.43	5.56E–07	6.66	8.1E–08	–	*
KLX06	377.2	1	0.1	–	13.42	7.50E–08	6.64	1.1E–08	–	*
KLX06	378.7	1	0.1	–	13.41	6.94E–07	6.65	1.0E–07	–	
KLX06	379.6	1	0.1	–	13.41	1.03E–07	6.64	1.5E–08	–	
KLX06	379.8	1	0.1	–	13.41	3.89E–07	6.64	5.7E–08	–	
KLX06	389.0	1	0.1	–	13.42	1.94E–08	6.67	2.9E–09	–	*
KLX06	403.8	1	0.1	–	13.47	1.75E–08	6.72	2.6E–09	–	
KLX06	405.2	1	0.1	–	13.45	1.08E–08	6.72	1.6E–09	–	
KLX06	410.3	1	0.1	–	13.48	1.11E–08	6.75	1.6E–09	–	*
KLX06	478.3	1	0.1	–6.11E–08	13.41	1.39E–08	6.71	1.1E–08	8.0	
KLX06	497.0	1	0.1	–3.89E–08	13.40	1.67E–08	6.69	8.2E–09	8.7	*
KLX06	507.3	1	0.1	–2.14E–08	13.39	1.50E–08	6.71	5.4E–09	9.5	
KLX06	509.9	1	0.1	–4.17E–07	13.37	2.58E–07	6.71	1.0E–07	9.3	
KLX06	512.1	1	0.1	–	13.37	2.75E–08	6.71	4.1E–09	–	
KLX06	530.8	1	0.1	–	13.35	7.50E–09	6.70	1.1E–09	–	*
KLX06	533.9	1	0.1	–6.39E–08	13.34	3.06E–08	6.69	1.4E–08	8.8	
KLX06	548.2	1	0.1	–	13.36	1.19E–08	6.69	1.8E–09	–	*
KLX06	561.2	1	0.1	–2.86E–07	13.35	1.31E–07	6.68	6.2E–08	8.8	
KLX06	562.2	1	0.1	–2.25E–05	13.35	1.25E–05	6.67	5.2E–06	9.1	
KLX06	628.0	1	0.1	–3.06E–07	13.21	3.33E–07	6.55	9.5E–08	10.0	
KLX06	635.2	1	0.1	–	13.21	1.39E–08	6.52	2.1E–09	–	*
KLX06	654.0	1	0.1	–5.28E–08	13.15	6.39E–08	6.49	1.7E–08	10.1	
KLX06	654.7	1	0.1	–5.83E–08	13.15	5.83E–08	6.49	1.7E–08	9.8	
KLX06	734.8	1	0.1	–	12.84	3.06E–08	6.14	4.5E–09	–	
KLX06	736.4	1	0.1	–	12.82	8.33E–09	6.13	1.2E–09	–	*
KLX06	777.5	1	0.1	–	12.63	3.61E–08	5.91	5.3E–09	–	
KLX06	779.0	1	0.1	–3.06E–06	12.61	4.44E–06	5.90	1.1E–06	9.9	
KLX06	815.0	1	0.1	–	12.35	2.14E–08	5.63	3.2E–09	–	
KLX06	835.3	1	0.1	–	12.16	3.89E–08	5.45	5.7E–09	–	
KLX06	838.2	1	0.1	–	12.14	1.11E–08	5.42	1.6E–09	–	
KLX06	838.7	1	0.1	–	12.13	1.75E–07	5.41	2.6E–08	–	
KLX06	854.3	1	0.1	–	12.01	1.75E–08	5.32	2.6E–09	–	

Appendix 8.5

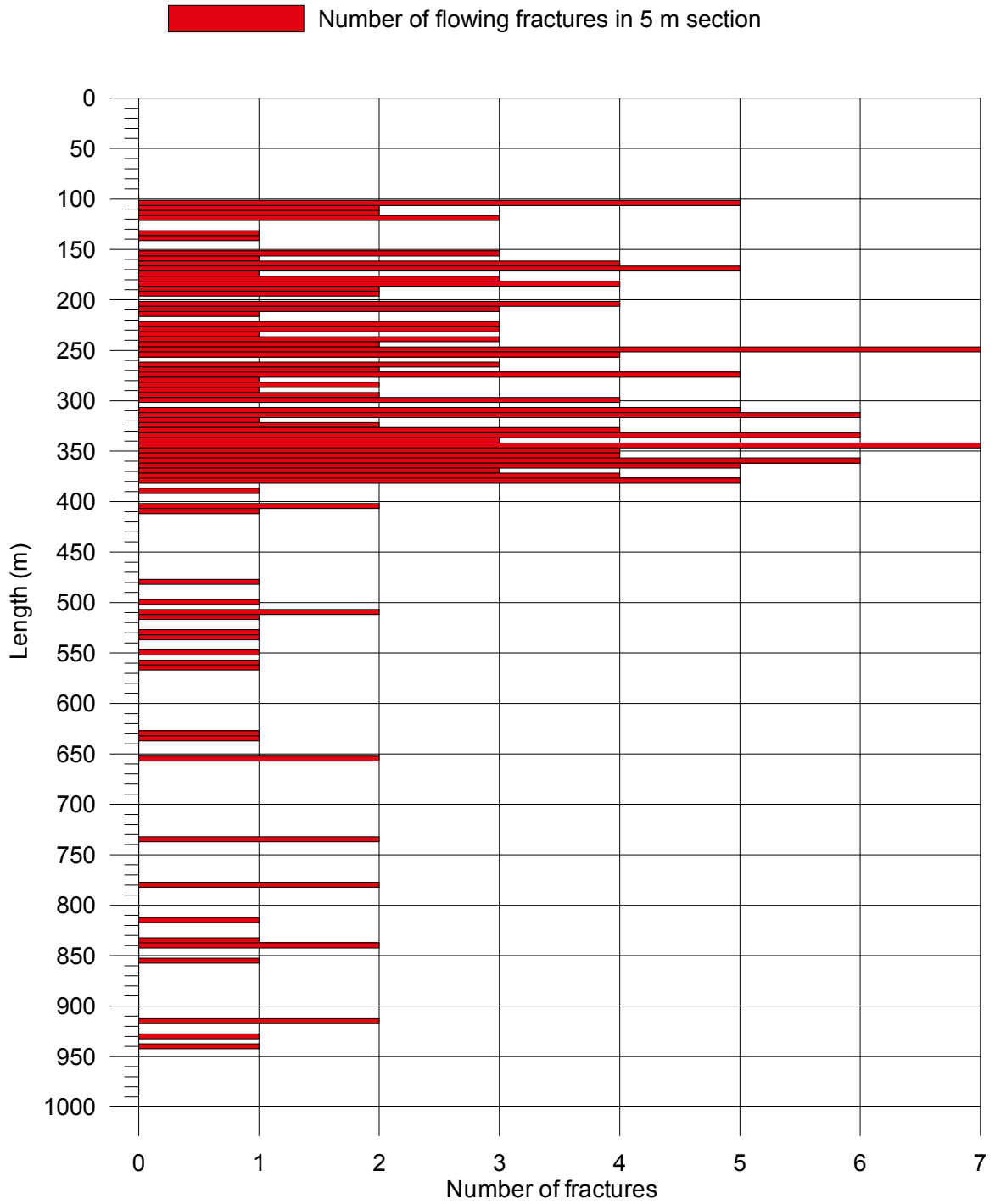
Borehole ID	Length to flow anom. L (m)	L_w (m)	dL (m)	Q_0 (m ³ /s)	dh_0 (m)	Q_1 (m ³ /s)	dh_1 (m)	T_D (m ² /s)	h_i (m)	Comments
KLX06	913.0	1	0.1	–	11.57	1.72E–08	4.92	2.6E–09	–	*
KLX06	914.7	1	0.1	–	11.56	8.61E–09	4.90	1.3E–09	–	*
KLX06	927.7	1	0.1	–5.56E–08	11.55	1.06E–07	4.89	2.4E–08	9.3	
KLX06	938.8	1	0.1	–	11.43	4.17E–08	4.59	6.0E–09	–	

* Uncertain = The flow rate is less than 30 mL/h or the flow anomalies are overlapping or unclear because of noise.

** Values from the measurement with smaller pumping (original pumped flow over measurement limit).

Appendix 11

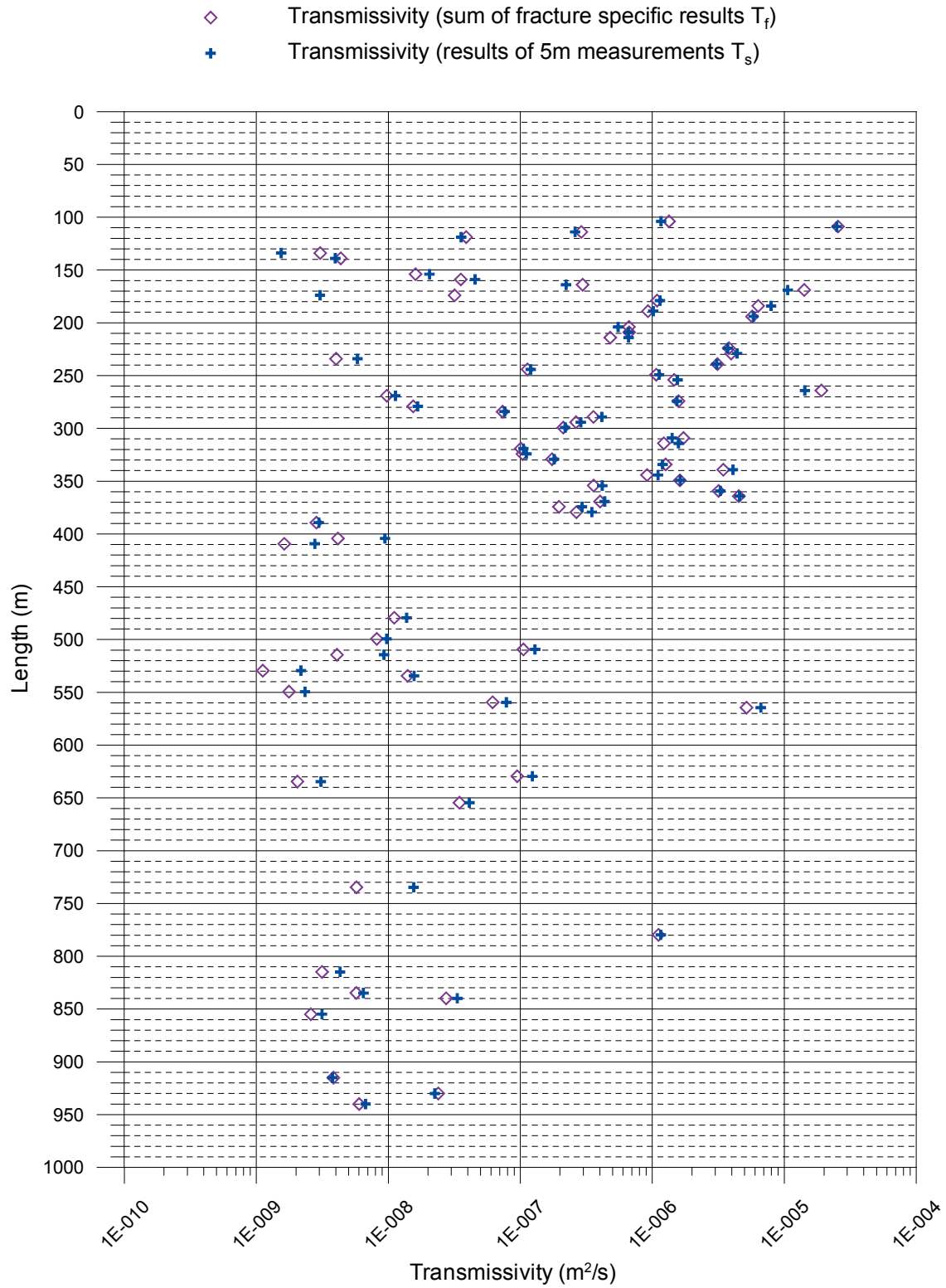
Laxemar, borehole KLX06
Calculation of conductive fracture frequency



Appendix 12

Laxemar, borehole KLX06

Comparison between section transmissivity and fracture transmissivity

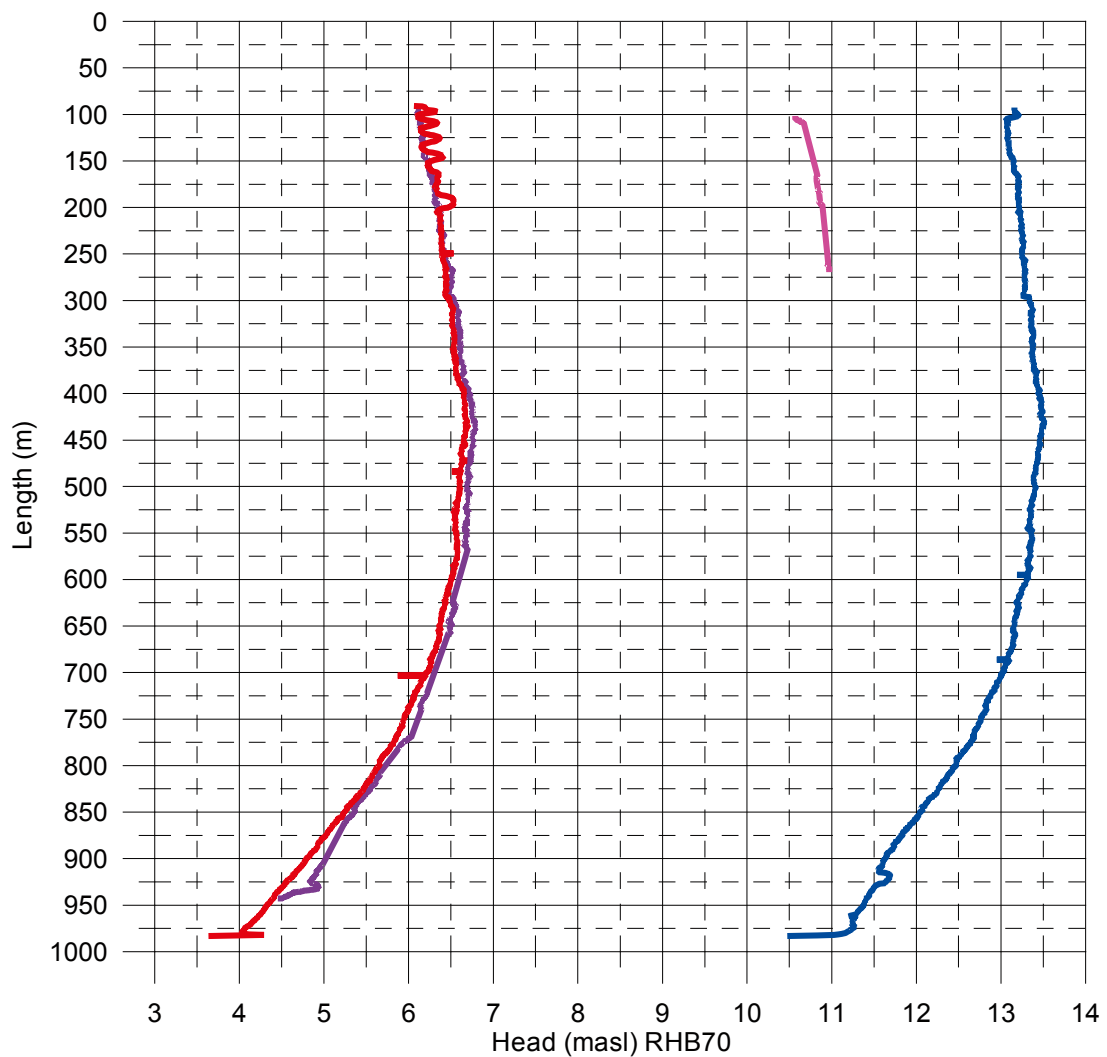


Appendix 13.1

Laxemar, borehole KLX06 Head in the borehole during flow logging

Head(masl) = (Absolute pressure (Pa) - Airpressure (Pa) + Offset) / (1000 kg/m³ * 9.80665 m/s²) + Elevation (m)
Offset = 2460 Pa (Correction for absolut pressure sensor)

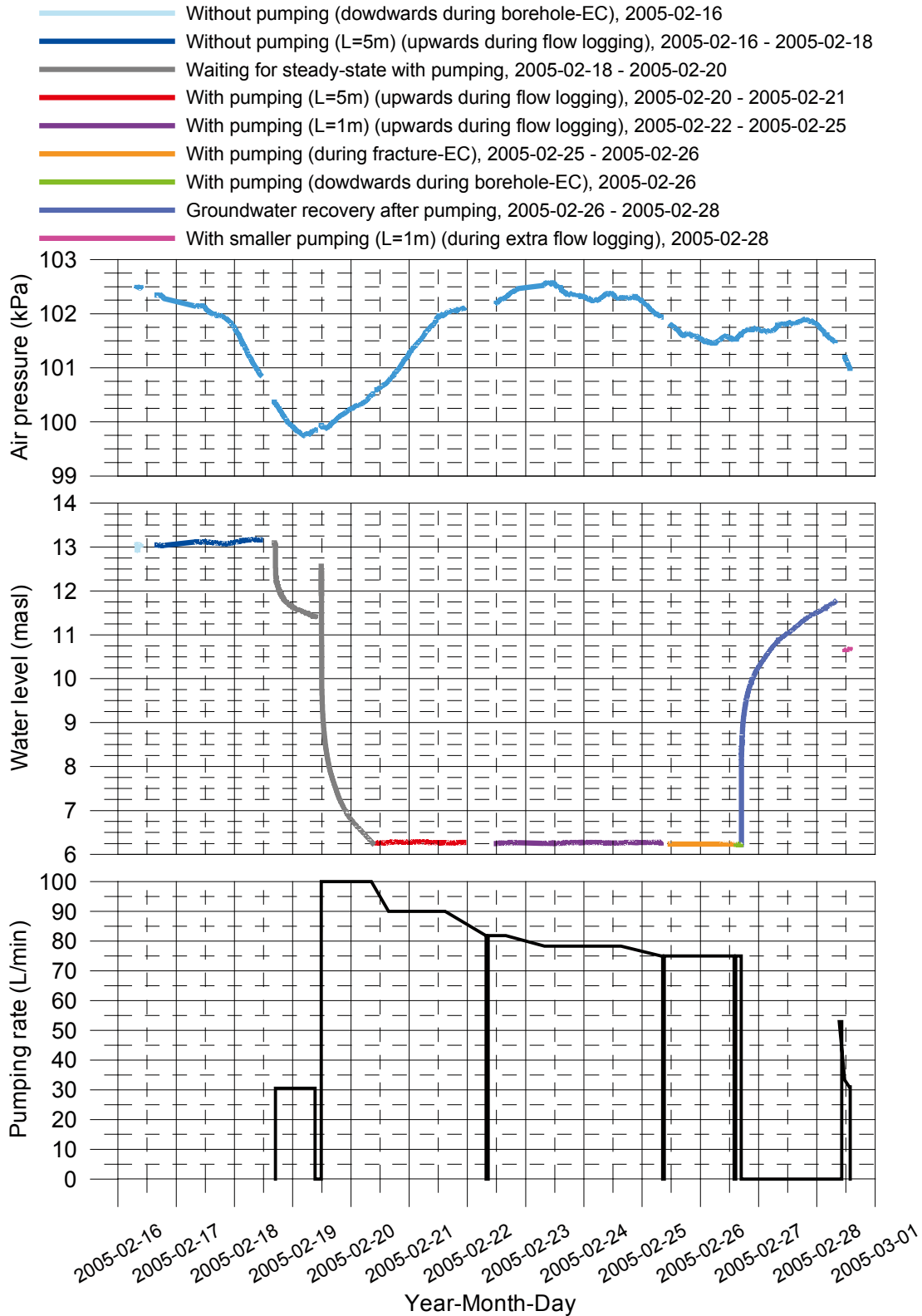
- Without pumping (upwards during flow logging, L=5 m, dL=0.5 m), 2005-02-16 - 2005-02-18
- With pumping (upwards during flow logging, L=5 m, dL=0.5 m), 2005-02-20 - 2005-02-21
- With pumping (upwards during flow logging, L=1 m, dL=0.1 m), 2005-02-22 - 2005-02-25
- With smaller pumping (during extra flow logging, L=1 m, dL=0.1 m), 2005-02-28



Appendix 13.2

Laxemar, borehole KLX06

Air pressure, water level in the borehole and pumping rate during flow logging



Laxemar, borehole KLX06 Groundwater recovery after pumping

Head(masl)= (Absolute pressure (Pa) - Airpressure (Pa) + Offset) / (1000 kg/m³ * 9.80665 m/s²) + Elevation (m)
Offset = 2460 Pa (Correction for absolut pressure sensor)

- Measured at the length of 14.27 m using water level pressure sensor
- Corrected pressure measured at the length of 976.86 m using absolute pressure sensor

