

REPUBLIC OF INDONESIA
DIRECTORATE GENERAL OF
WATER RESOURCES DEVELOPMENT
MINISTRY OF PUBLIC WORKS

TECHNICAL FEASIBILITY STUDY
ON
CIBANJUR SUBWATER
WATER RESOURCES DEVELOPMENT PROJECT

FINAL REPORT

VOLUME V

DATA BOOK

June, 1992
JAPAN INTERNATIONAL COOPERATION AGENCY
TOKYO, JAPAN

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REPUBLIC OF INDONESIA
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ON
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June, 1992
JAPAN INTERNATIONAL COOPERATION AGENCY
TOKYO, JAPAN

This Report consists of

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**THE FEASIBILITY STUDY
ON
CIDANAU-CIBANTEN
WATER RESOURCES DEVELOPMENT PROJECT**

DATA BOOK

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DATA BOOK I.
TOPOGRAPHY

The following topographic maps are separately compiled :

- I.1 Topographic Map on a Scale of 1 to 5,000 for Cidanau Basin
- I.2 Topographic Map on a Scale of 1 to 2,000 for Krenceng Reservoir
- I.3 Cross Section on a Scale of 1 to 400 along the existing Krenceng Dam
- I.4 Project on a Scale of 1 to 400 along the route of Beroeng Diversion Tunnel

DATA BOOK II.
HYDROLOGY

II.1 Meteorological Data

MEAN TEMPERATURE (SERANG)

Unit: °C

YEAR	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC
1971	-	-	-	-	-	-	26.2	26.5	26.1	-	-	26.6
1972	25.6	26.5	25.8	26.8	26.7	27.0	26.2	26.5	27.1	-	-	26.6
1973	-	-	-	-	-	-	-	-	-	-	-	-
1974	25.8	-	26.8	27.4	27.7	27.0	27.6	27.3	27.0	27.4	27.2	-
1975	27.4	27.0	27.0	26.9	26.7	26.4	25.9	26.3	26.6	26.4	26.8	26.3
1976	25.5	25.9	26.1	26.3	26.8	26.3	26.2	26.6	26.9	27.2	27.2	27.2
1977	26.5	26.6	26.5	27.1	27.3	26.4	26.6	26.4	26.7	27.8	27.6	26.7
1978	26.6	26.9	26.8	27.1	27.5	27.1	26.4	26.6	26.7	26.7	26.9	26.5
1979	26.4	26.6	26.8	27.0	27.2	26.5	26.2	26.4	26.9	27.3	27.1	26.4
1980	26.2	26.5	26.7	27.1	27.4	26.9	26.5	25.9	27.0	27.0	-	26.5
1981	25.9	26.2	26.7	26.9	27.0	26.7	26.3	26.6	26.8	-	26.7	26.7
1982	25.6	26.5	26.4	26.7	27.1	26.6	25.9	26.2	26.4	27.7	27.9	27.4
1983	26.8	28.4	27.5	27.8	27.5	27.5	26.6	26.8	27.3	27.5	26.7	26.6
1984	25.9	26.3	26.1	26.9	26.7	26.4	26.3	26.3	26.1	27.2	26.9	26.3
1985	26.3	26.9	26.6	26.5	27.1	26.1	25.6	26.4	26.4	26.7	27.4	26.6
1986	26.9	26.1	26.3	26.9	26.8	26.4	25.9	25.5	25.9	26.5	26.1	26.7
1987	26.1	26.0	26.6	27.0	26.7	27.0	26.6	26.4	26.9	27.9	27.9	26.7
1988	26.8	26.7	26.8	27.0	26.9	26.6	26.5	26.3	26.9	26.9	26.7	25.9
1989	26.3	25.4	26.4	26.6	26.7	26.2	26.5	26.3	26.5	27.1	26.9	-
Ave	26.2	26.5	26.6	26.9	27.0	26.6	26.3	26.4	26.7	27.2	27.1	26.7

MEAN RELATIVE HUMIDITY (SERANG)

Unit : %

YEAR	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC
1971	-	-	-	-	-	-	81	77	77	-	-	81
1972	86	82	86	81	83	77	81	77	77	-	-	81
1973	-	-	-	-	-	-	-	-	-	-	-	-
1974	-	-	-	-	-	-	-	-	-	-	-	-
1975	-	-	-	-	83	80	80	80	80	81	79	81
1976	85	82	84	83	81	80	77	78	73	75	77	79
1977	84	82	84	83	81	83	77	76	76	72	77	81
1978	81	80	83	80	79	80	80	79	78	80	78	84
1979	85	85	84	83	80	81	82	79	78	78	81	84
1980	87	86	84	83	82	80	80	79	78	78	-	83
1981	83	83	83	83	83	81	82	79	79	78	80	81
1982	86	81	81	83	80	81	80	76	71	69	74	79
1983	83	83	81	81	81	78	77	74	-	77	80	79
1984	83	83	84	82	83	79	80	79	81	76	80	80
1985	83	80	81	84	81	82	83	77	79	79	75	78
1986	84	82	83	83	81	82	79	79	82	81	82	83
1987	85	85	83	83	84	81	77	75	75	73	73	81
1988	82	83	84	84	85	81	78	79	77	78	79	83
1989	85	87	80	81	83	81	78	80	80	77	79	-
Ave	84	83	83	82	82	80	80	78	78	77	78	81

MEAN DURATION OF SUNSHINE (SERANG)

Unit : %/8hr/day

YEAR	JAN	FEB	MAR	APR	MAR	JUN	JUL	AUG	SEP	OCT	NOV	DEC
1971	-	-	-	-	-	-	-	-	-	-	-	-
1972	-	-	-	-	-	-	-	-	-	-	-	-
1973	-	-	-	-	-	-	-	-	-	-	-	-
1974	-	-	58	62	55	67	69	67	63	55	48	-
1975	42	32	50	57	43	61	56	49	63	35	57	10
1976	30	41	30	49	67	69	75	67	64	59	51	48
1977	34	28	37	45	35	23	75	77	73	-	-	53
1978	38	-	60	63	47	41	40	57	-	-	-	-
1979	-	43	53	66	64	66	75	75	74	72	45	49
1980	33	50	64	63	75	76	74	72	65	57	-	33
1981	32	44	67	67	62	60	71	81	65	67	42	52
1982	23	55	60	63	69	70	76	89	92	89	75	50
1983	52	55	65	62	65	82	82	89	85	58	42	56
1984	27	28	45	58	65	73	73	71	55	58	55	35
1985	56	57	60	60	76	55	61	85	78	53	53	47
1986	21	52	50	68	73	55	74	65	62	53	47	61
1987	27	39	73	62	73	58	81	89	75	76	62	32
1988	40	55	37	68	66	68	85	66	83	50	43	37
1989	52	21	58	63	61	65	77	68	73	53	45	
Ave	36	43	54	61	62	62	72	73	71	60	51	43
h/day	2.9	3.4	4.3	4.9	5.0	4.9	5.8	5.8	5.7	4.8	4.1	3.5

MEAN WIND VELOCITY (SERANG)

Unit: knots

YEAR	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC
1971	-	-	-	-	-	-	5	5	5	-	-	6
1972	5	5	5	5	5	6	5	5	5	-	-	6
1973	-	-	-	-	-	-	-	-	-	-	-	-
1974	3	3	3	3	3	3	3	4	4	3	4	-
1975	4	-	4	3	4	4	4	4	4	5	5	5
1976	3	4	3	3	4	4	3	5	3	3	2	3
1977	2	3	2	3	3	2	3	3	3	3	3	3
1978	4	3	3	3	3	3	3	3	3	3	4	3
1979	4	6	5	3	3	3	2	2	3	3	3	3
1980	3	3	3	3	3	3	3	3	5	6	-	5
1981	6	6	6	6	6	5	6	6	6	-	6	6
1982	5	6	5	5	5	5	5	6	6	5	5	5
1983	5	5	5	5	5	5	4	5	-	5	5	4
1984	5	4	5	4	4	4	5	4	4	4	6	6
1985	6	7	7	6	5	5	5	5	6	6	6	6
1986	6	6	6	6	5	5	5	5	5	5	6	5
1987	6	5	6	5	5	5	5	6	6	6	6	5
1988	5	5	5	5	4	5	5	5	5	5	6	
1989	5	5	5	5	4	5	5	5	5	5	5	5
Ave	4.5	4.8	4.6	4.3	4.2	4.2	4.2	4.5	4.6	4.5	4.9	4.8
km/day	201	211	204	191	186	188	188	200	204	199	216	211

MEAN TEMPERATURE (CIKADU)

Unit: °C

YEAR	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC
1978	-	-	-	-	-	-	24.7	25.1	24.5	25.1	25.4	24.3
1979	25.5	25.3	25.9	26.2	26.2	26.6	25.9	26.2	26.7	27.9	27.1	27.7
1980	27.3	28.6	28.7	29.7	29.9	30.0	29.5	29.4	29.9	30.1	29.8	-
1981	29.9	29.8	30.7	-	32.3	32.1	30.9	31.3	31.4	31.7	32.4	32.6
1982	31.2	31.7	31.9	32.9	34.1	34.2	-	33.5	33.7	34.1	27.9	27.8
1983	27.5	27.8	28.0	27.9	27.9	28.7	28.9	28.5	-	-	-	27.7
1984					28.0	26.8	28.3	28.3	29.3	30.7	30.2	31.6
1985	31.7	32.3	32	32	-	-	-	32.3	29.9	27.7	28.6	28.7
1986	29.2	31.5	-	-								
1987			-	-	-	-	-	-	-	-	-	-
1988												
Ave	28.9	29.5	29.5	29.7	29.7	29.7	28.0	29.3	29.3	29.6	28.7	28.7

MEAN WIND VELOCITY (CIKADU)

Unit: km/day

YEAR	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC
1978	-	67.9	61.8	57.5	58.8	67.8	78.0	89.6	102.0	77.4	88.8	75.1
1979	83.2	77.1	105.0	81.0	87.0	60.0	63.0	70.0	75.0	79.8	71.6	102.0
1980	80.0	68.7	80.7	37.9	36.5	32.3	40.6	50.2	44.2	56.5	70.0	77.4
1981	62.6	84.2	53.1	51.8	41.6	46.3	37.1	35.2	40.5	34.9	80.3	58.7
1982	32.7	51.1	28.3	22.7	10.6	13.1	-	13.7	35.9	40.9	38.8	45.3
1983	33.1	-	42.6	40.6	31.7	30.9	46.8	21.4	-	-	-	20.1
1984												
1985			51.0	45.0	29.0	39.3	37.1	41.9	80.4	112.0	145.0	153.0
1986	108.0	61.0	98.2	68.1	73.0	94.4	102.4	45.9	98.1	113.5	121.6	76.2
1987	105.3	88.0	78.4	-	92.3	66.6	69.2	-	-	101.8	86.0	116.9
1989												
Ave	72.1	71.1	66.5	50.5	51.1	50.0	59.2	45.9	68.0	77.1	87.7	80.5

MEAN PAN-~~E~~VAPORATION (PADARINCANG)

Unit : mm/day

YEAR	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC
1978					3.5							
1979				2.0	3.4	4.2	4.0	4.2	4.5	4.1	3.1	2.7
1980	1.9	1.9	4.0	3.3	3.9	3.5	3.9	4.0	3.2	2.7	3.1	2.9
1981	3.5	2.9	3.0	2.7	2.9	3.4	4.1	4.1	3.3	5.3	4.6	3.7
1982	3.7	3.9	3.3		3.5	3.0						3.4
1983		4.0	3.6						3.3			
1984			2.3	-	-	2.0	1.0	5.0	4.5	3.7	4.5	5.8
1985	7.2	6.4	4.1	6.0	4.7	3.7	4.5	3.7	4.6	5.5	4.3	2.5
1986	7.2	4.1	4.3	3.2	2.4	2.4	3.2	5.6	3.8	-	7.8	7.8
1987	3.7	3.0	-	-	-	-	-	-	-	-	-	-
1988												
1989			-	3.6	-	-	3.7	3.4	4.0	3.1	2.9	3.8
1990	6.1	6.9	4.3		-	-	-	-	4.9	3.5	-	
Ave.	4.5	3.7	3.3	3.4	3.4	3.1	3.4	4.4	4.0	4.1	4.5	4.1

MEAN PAN-EVAPORATION (CIKADU)

Unit: mm/day

YEAR	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC
1978	2.1	4.9	3.4	4.5	4.1	3.9	4.1	4.8	4.5	4.8	5.6	3.1
1979	3.3	3.2	3.8	4.3	4.9	4.8	4.8	5.1	4.8	5.9	5.0	4.7
1980	2.3	3.5	4.2	3.4	4.3	4.9	4.5	4.3	3.6	4.0	3.6	2.6
1981	2.8	3.1	3.8	4.1	4.7	5.1	4.6	4.6	4.0	4.3	2.8	4.3
1982	2.9	3.0	4.5	3.3	4.8	4.8	-	5.5	4.9	5.2	4.7	3.8
1983	3.4	3.9	4.0	3.4	3.6	4.8	5.2	5.0	-	-	-	4.5
1984			-	-	3.4	3.7	4.3	4.6	5.0	4.6	4.5	4.6
1985	4.1	4.7	5.8	5.0	5.1	5.0	5.1	4.4	7.3	4.7	6.1	5.0
1986	7.1	4.6	6.4	7.0	4.2	4.5	4.9	4.9	5.3	4.8	6.6	5.6
1987	7.2	5.8	5.2	-	6.3	5.2	6.2	-	-	4.3	6.5	8.9
1988			-	-	4.8	-	-	5.8	-	-	-	6.3
1989	7.3	-										
Ave	4.2	4.0	4.5	4.3	4.5	4.6	4.8	4.9	4.9	4.7	5.0	4.8

MEAN SUNSHINE (CIKADU)

Unit : hours/day

YEAR	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC
1978	-	-	-	-	-	-	4.4	4.0	5.0	5.2	5.0	2.6
1979	3.3	4.1	4.1	5.3	5.1	5.5	6.4	6.5	5.2	6.5	5.3	4.2
1980	2.4	4.1	5.4	4.5	6.5	7.0	6.5	6.5	5.3	5.5	4.5	3.3
1981	2.4	4.0	4.5	6.1	6.2	5.1	5.1	6.3	5.3	6.5	3.3	4.3
1982	2.2	4.5	4.7	5.1	6.5	6.0	-	6.3	-	7.3	5.8	4.5
1983	4.7	5.5	6.2	6.4	5.1	3.1	-	7.7	-	-	-	3.9
1984												
1985			6.2	4.9	6.0	6.0	5.1	6.6	6.1	5.0	3.9	4.0
1986	2.5	4.6	4.7	5.4	6.0	-	-	5.4	4.5	4.7	5.1	5.5
1987	-	4.9	-	-	-	-	-	-	-	-	-	-
1988												
1989												
Ave	7.8	4.5	5.1	5.3	5.9	5.4	5.5	6.1	5.2	5.8	4.7	4.0

MEAN RELATIVE HUMIDITY (CIKADU)

Unit: %

YEAR	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC
1978	-	-	-	-	-	-	84.3	82.1	82.5	-	-	-
1979	86.8	87.8	86.1	84.6	83.4	80.4	78.9	79.4	80.4	77.8	81.8	80.7
1980	84.1	81.6	79.6	80.8	78.1	77.8	76.6	77.1	82.9	82.8	85.6	-
1981	81.7	81.4	77.9	-	80.9	85.9	83.8	85.7	88.9	86.1	89.6	88.9
1982	96.4	91.2	91.2	89.9	86.1	82.1	-	77.9	79.9	79.8	80.7	81.5
1983	84.9	85.4	81.3	86.4	83.2	81.0	81.9	76.9	-	-	-	88.7
1984					84.4	76.5	80.3	83.7	84.4	82.1	85.9	87.1
1985	86.7	85.3	88	91	87.7	77	75.5	74.8	73.7	87.3	86.7	83.3
1986	82.6	84.6	75.7	-	-	-	-	70.7	69.9	70.7	73.4	71.8
1987	77.6	74.4	-	-	-	-	-	-	-	-	-	-
1988												
1989												
Ave	85.1	83.9	82.8	86.5	83.4	80.1	80.2	78.7	80.3	80.9	83.4	83.1

MEAN TEMPERATURE (PADARINCANG)

Unit : °

YEAR	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC
1978					26.9	27.2	25.6	25.9	26.5			
1979				29.0	29.6	28.7	28.8	29.1	30.1	30.5	30.8	30.4
1980	30.4	31.9	32.7	-	-	-	-	-	-	-	-	28.8
1981	29.5	31.1	32.0	29.3	30.1	31.0	31.7	32.7	-	-	-	-
1982	-	-	-	-	-	-	-	-	-	-	-	-
1983	-	-	-	-	-	-	-	-	-	-	-	-
1984	-	-	-	-	-	-	-	-	-	-	-	-
1985	-	-	-	-	-	-	-	-	-	30.8	29.5	30.9
1986	28.9	28.9	29.5	29.4	29.8	-	-	-	-	-	-	-
1987	-	-	-	-	-	-	-	-	-	-	-	-
1988	-	-	-	-	-	-	-	-	-	-	-	-
1989	-	-	-	-	-	-	-	-	-	-	-	-
1990	-	-	-	-	-	-	-	-	-	-	-	-
Ave.	32.9	33.9	34.7	29.2	29.1	28.9	28.7	29.2	28.3	30.6	30.1	33.3

MEAN HUMIDITY (PADARINCANG)

Unit : %

YEAR	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC
1978					86.8	86.8	87.0	85.8	85.2			
1979				88.7	88.0	86.1	86.7	88.6	88.1	87.2	90.2	90.8
1980	90.6	89.5	90.6	-	-	-	-	-	-	-	-	91.8
1981	91.5	91.9	92.5	74.6	79.4	79.2	81.1	80.7	-	-	-	-
1982	-	-	-	-	-	-	-	-	-	-	-	-
1983	-	-	-	-	-	-	-	-	-	-	-	-
1984	-	-	-	-	-	-	-	-	-	-	-	-
1985	-	-	-	-	-	-	-	-	-	90.2	88.9	90.8
1986	88.7	88.4	87.6	87.1	88.9	-	-	-	-	-	-	-
1987	-	-	-	-	-	-	-	-	-	-	-	-
1988	-	-	-	-	-	-	-	-	-	-	-	-
1989	-	-	-	-	-	-	-	-	-	-	-	-
1990	-	-	-	-	-	-	-	-	-	70.5	78.4	-
Ave.	90.2	89.9	90.2	83.4	85.7	84.0	84.9	85.0	86.6	82.6	85.8	91.1

MEAN WIND VELOCITY (km/day)

YEAR	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC
1978					53.9	54.9	61.9	61.8	57.2			
1979				39.0	61.5	52.8	52.3	57.4	55.3	64.2	45.1	46.7
1980	48.8	9.8	15.0	19.7	16.3	23.6	21.0	30.1	27.6	39.7	47.6	56.5
1981	38.9	26.6	38.0	47.1	50.8	51.7	45.9	53.7	48.1	29.6	36.8	32.8
1982	-	-	67.1		41.5	42.4						44.3
1983		43.4	47.3						48.5			
1984			111.7			89.0	27.5	33.9	38.0	67.3	36.0	21.4
1985	11.8	57.0	114.9	54.3	30.0	56.2	-	-	-	-	-	-
1986	-	41.0	308.5	305.8	275.0	329.6	327.	115.7	130.1	102.7	73.5	16.0
1987	-	-	-	-	-	-	-	-	-	-	-	-
1988			65.5	58.7	31.8	24.5	45.2	121.2	126.0	-	-	-
1989	-	-	100.1	-	41.9	-	134.3	113.9	165.7	208.3	248.1	81.7
1990	270.3	203.7	157.9		150.0	127.1	128.7	101.9	150.2	102.8	205.2	
Ave.	33.1	177.8	102.8	87.4	78.9	85.1	88.6	71.9	75.6	67.7	74.0	36.2

MEAN DURATION OF SUNSHINE (PADARINCANG)

YEAR	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC
1978					3.2	-	1.1	5.4	4.2			
1979				5.5	2.3	7.3	4.4	5.6	5.4	5.3	3.1	4.0
1980	2.4	4.0	-	5.1	5.2	-	-	-	-	-	-	4.5
1981	4.0	5.3	5.4	4.4	-	-	-	5.8	5.1	5.6	2.7	4.3
1982	2.8	4.1	5.3		5.1	3.8						2.9
1983		4.6	5.5						7.0			
1984			3.8			2.1	2.9	4.6	4.5	5.1	3.6	-
1985	-	4.4	-	-	-	4.6	5.3	6.6	5.2	5.3	3.5	3.3
1986	3.6	4.1	-	4.8	5.0	-	-	-	4.1	5.2	-	-
1987	4.5	4.5	-	-	-	-	-	-	-	-	-	-
1988			4.2	6.1	3.6	3.1	-	-	5.5	-	-	-
1989	-	-	-	-	-	5.5	6.0	-	-	4.4	3.9	3.0
1990	2.4	-	4.3		5.5	4.9	5.8	5.3	6.0	5.6	-	
Ave.	3.4	4.4	4.7	5.1	4.2	4.3	3.9	5.5	5.2	5.3	3.2	3.8

II.2 Daily Rainfall Data

DATA : RAINFALL (mm/day)
 STATION : PADARINCANG
 YEAR : 1978

DAY	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC
1					1	15		2				
2					6	5	82					
3					8	5	21	1	2			
4					47	45			4			
5					38		1		6			
6						5	4		3			
7						5	4					
8					2	5	3					
9						49	2					
10												
11					1		61		3			
12					3	12		8	10			
13									13			
14					26	1	13					
15						6			2			
16					21		35	5				
17								11	2			
18					1	1		7				
19							1	8	5			
20								27	15			
21									3			
22					5	17			4			
23									5			
24						1	1	4				
25					23		19		4			
26						5	3	14				
27					1		1					
28					32	2						
29					27	124		1				
30					19							
31					7							
					268	303	251	88	81			

DATA : RAINFALL (mm/day)
 STATION : PADARINCANG
 YEAR : 1979

DAY	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC
1				1	2					1	38	5
2	18	2	7		10					75	6	
3		11	90	16	1					1	16	
4	15		10	61	3	4						24
5	25	1			6							8
6	65	1	16	16	13	3		14		21	27	
7		18		10							3	46
8	17	57	2			18		5	5			11
9	40	30	7	4		72		1			10	1
10	56	20	75	3		13	16				7	
11	4		25	8				6		2		7
12	3		90	11			7				11	3
13	6	5	17	3			14				8	6
14	5		13	6			30				5	
15	25		1						14		10	1
16	55	5		2							5	9
17		35			5		4					6
18	1			11	11					2	7	
19	19			3								17
20	20	17		34			16		23	6		
21	10	18								1	12	24
22	5	10	6		8			36	2	3		9
23		30	5	8				3		4		6
24	24	50		7	1			3	83			4
25		13		4								3
26	25	7								6		
27		10										8
28					13							
29			22		42				81	13	18	3
30				22	1	4				2	1	39
31					11							19
	438	340	386	230	124	114	87	68	208	137	184	259

DATA : RAINFALL (mm/day)
 STATION : PADARINCANG
 YEAR : 1980

DAY	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC
1	13								6		12	
2	38				20	20			8		7	
3	3		25					15	1		25	1
4	2		10	35	4	9		16	23	16		
5	30					5			35			1
6	74								11		31	
7	20	12			7			3				2
8	3	16	40						27		6	8
9	44	16	39						6		3	3
10	2	22	92	6	10		22		45	7		2
11	139				7			15	15			
12	28		28	74					3			
13		49	33				5		2	11		25
14	2	24			1	69	51		9	23		2
15		11		10	2	2			10	27	5	
16	3	10					7		4	7		
17	26	18	24						8		25	
18	28	10	26			44					52	
19	37	21		5		34		49				
20	36	43		8		6					15	106
21	35	18		19	38							7
22	25			4			10		2			
23		17		20		1			3	29		
24									1			
25		1					2		3	9		118
26	4	2	46	2		1						1
27		49	4	13	17	1	7					9
28			4		5	2				4		
29	4	12	4	21			1					9
30	61		89	3						5		5
31	23		3				1			42		48
	680	351	467	220	111	194	106	95	222	180	181	347

DATA : RAINFALL (mm/day)
 STATION : PADARINCANG
 YEAR : 1981

DAY	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC
1		3	15		18		3				5	10
2	2	8	15	2					4	4		11
3	65	44			3				2	2	6	9
4	50			12	6					15	9	
5	45	10		9	11				27	12	6	13
6	10	37	2							35		9
7	52	12	6		34			2	19	6		5
8	2	4	2			46		3	33			8
9		17	1	2							13	3
10			18					2	31		10	
11				5		17	5		2		6	31
12		71		18			36		4		35	12
13	1	1		1	24	4					8	
14	50	53			17	34	15		1		31	
15	13	5	4	18		3					96	
16	11	8		39			11		6			
17	38	6			11	2	2				27	
18	5		11		4		8	8		22	1	8
19		34	25	2	14	15	7		4		2	
20			2	10	8	1		19	4		5	
21				34								8
22	12		26					18			2	
23							15	11	2	19		
24			10	10			3	2	47	64	1	11
25			43				48				13	33
26	7	69	58		15				4			10
27	53	2				1			66		31	7
28	1	7	5	14		1	4			5		
29	6		6			1	3					3
30	3			16			29			17		1
31												11
	379	444	196	192	165	125	188	66	256	202	307	203

DATA : RAINFALL (mm/day)
 STATION : PADARINCANG
 YEAR : 1982

DAY	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC
1	18		12		22							
2	1	11	2	9	3	1						
3	10	19	11	5	1						15	
4		17				19	16			18		
5	87	2	30		6	3						
6			55	26		1	3				40	
7	7	4	54	42						20		
8	1											21
9	69		5		5						50	9
10			2		19					25		13
11	93	14			2						43	11
12			21			2	9					1
13	52	1	2									
14	25	37	62			1				35	3	2
15	29	21										17
16	18	3		10			30					22
17			4			11						2
18	71					2				6		1
19	11	1	1								29	
20	27	5										4
21									11		3	16
22	13						18		9			4
23	13								13			23
24	8	18	64	18						30		1
25	2		23	5	1							2
26	7		4								10	11
27		14	9		33				3			24
28		6	8			3	11			20	23	1
29	19		6	3			20					24
30			7				16			15	21	
31			6	16								1
	581	173	388	296	92	43	123	0	43	169	237	210

DATA : RAINFALL (mm/day)
 STATION : PADARINCANG
 YEAR : 1983

DAY	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC
1	3		150	50	25		25	25			4	47
2			60	20	90		25				2	15
3				30	102		25	24			12	5
4	7			20	25	21	7	16			15	
5				25	25						10	
6					50						10	
7	5				17						25	
8					20						25	
9	9										11	
10											13	6
11		1	130		5							
12			170		25						10	
13	15	11	75		35							5
14	10	2			41							5
15	6	2										5
16					20						25	6
17	20	5	20	20	57						91	
18	14		3	13							16	
19			24	24			17			50	5	
20							21			65	25	6
21	12	5			14		23				37	25
22			25				40			57	91	25
23	11		60	5			35				91	6
24	19	9		16	5		25			27	25	15
25		5		40	4						75	27
26		3		37							125	10
27		1			10					5	25	15
28	17	6	5		23					12	50	4
29	25		51							32	14	55
30			75		5					40		4
31			50							60		
	173	50	862	300	598	21	243	65	0	348	832	286

DATA : RAINFALL (mm/day)

STATION : PADARINCANG

YEAR : 1984

DAY	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC
1	23	10	6			25				48		
2	20	5	2		15				5	93	3	2
3	30	10		5	28	25			19	5	6	135
4	35		2		7	25	25		1		7	150
5			48		17	6	27				7	72
6	10	33	53		5				11			11
7	12				20		21		2	10	6	
8			14		12				38			
9					25	19			4		18	
10		25							2		8	
11		3		17	21				2	5		5
12			14			10			1		37	30
13			26					4				14
14	10	9						2	4	5	3	17
15	10	10							6		17	24
16	25	6		7	19					20	17	
17	5	21							4	25	1	
18	20	50				25	15		4		30	
19	25	10			5	20					2	
20	25	50		25			30		1		1	
21	50	9		31			5				2	
22		14							4			
23		5										
24		4		31							2	
25	31	10		101					1	15	9	21
26	35	35		5				16			8	23
27	45	5					13		20		8	
28				6			5					108
29			2								2	
30				6	35	35		50			4	3
31	35											
	446	324	167	234	209	190	141	72	129	226	198	615

DATA : RAINFALL (mm/day)
 STATION : PADARINCANG
 YEAR : 1985

DAY	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC
1	12		6					13			11	1
2			15								2	
3	18	32	7			6		18			3	28
4	18	32	7			16	4					
5	7		25	9		3				17		
6		16	4	25	33		5	16		4		
7	7			25		2	15				7	
8	9	14	26		45		3	7				
9	56		15	17	8		4			21		
10	7			16		13	20		15			
11	37	32		10		6			50	41		
12		18		10						2		
13	2	6		11		4				26		
14	33	16			6					10	41	
15	2			49			25	15		7		
16					30			27				
17				12	4	8						
18							6			2		
19	6			75	5	35			5	4		
20	4								20	14		
21	5	26		8			25		5	5		
22	75	40					6				2	
23		6				3	30			3	18	
24		13				12					16	
25	5	1					7			16	10	
26	34	1		33					12		37	
27	10			60			1				14	
28	2			30						6		
29	1		25							6	4	
30							31			27	1	
31	2		25							10		
	352	253	155	390	178	108	182	96	107	221	166	29

DATA : RAINFALL (mm/day)
 STATION : PADARINCANG
 YEAR : 1986

DAY	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC
1		3			9							14
2	5						7					6
3	9	14	4	28				25		74		
4	3	37	3	6								8
5	17	1	5	22				4		20	14	
6	8	20	1	10			6	26			9	
7	7	12			6	9		11			80	
8	9		2									
9	5		3						7	16	52	
10	3		9						8		33	7
11	4		5		7				3		59	
12	2	11	13	14			4			2	10	
13	17	6	3	6					2	4	8	
14	14	7			11						23	18
15	5							48			10	40
16	42		7	7					4			23
17		3				9	6					38
18		10										28
19	8	7										
20	21	25	9			5						
21	48		28	5					9			
22	43		35	17			5					31
23	35		3	9					17	50		
24	6		15		6		3		23			
25	33		8					4	12			
26	17	6					32			32		
27	30	12	34				4			2		43
28	5		12							63		
29	7			5	5		20			9	62	
30		11					15				23	
31	1						11					
	404	174	211	129	44	23	113	118	75	272*	383	254

* PABUARAN

DATA : RAINFALL (mm/day)
 STATION : PADARINCANG
 YEAR : 1987

DAY	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC
1	4		17									
2	3		49			5					64	1
3		7	75		20				4			
4	8	10			25	7	2				28	2
5	12	12				14	20					1
6			8		6	1	2				15	3
7	5	4		75							17	9
8	4	9		5		42					23	7
9	4			32	14						64	18
10		7	21		26	23					4	12
11	2		21		27			6		11	8	2
12	6			8		7				5	14	4
13	12		3							18		6
14	7											9
15				17		26			4			10
16			60	8	34	25						3
17	3		52	22		8						18
18	2				7					1		23
19	14				63					3		30
20			25	18								20
21		7	42		23					1		6
22	6	7	10		20							5
23	6		33	14			10					23
24	4											
25	5	1				8						2
26						5						
27		6				35	25		10			
28			29		16		6				1	
29	12		4	39						4	91	
30	12					2			3			
31												
	129	70	449	238	284	208	65	6	21*	43*	279*	216*

* PABUARAN

DATA : RAINFALL (mm/day)
 STATION : PADARINCANG
 YEAR : 1988

DAY	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC
1		50		7							10	
2		17		3						8		
3		47			15		1					
4		35			7						4	
5		49	23			11						
6		10	9									
7			10					23	6	2		3
8		50								5		
9					2							
10			1		5				3			
11		20			6						7	3
12		13	3	3	5						73	50
13	13		6	36	20				2	24	13	56
14	5	16	1							2		30
15	18	22		1	9	15	23	20		2		
16		4	2		4					5		
17	9		4		2		2			20	10	5
18	9	6		6						20	13	
19	1			3						7		30
20	17		5					43				
21	56			10							3	3
22	1		25	7							10	3
23		11									4	
24	2		3		40			35			5	
25			4						5	40	3	
26				7	2					6		
27	3		7								9	
28	26		3	1		1				17	10	
29	27	3	34	1	1						30	5
30											5	
31	66				2							
	252*	353*	140*	85*	120*	27*	61*	91*	11*	158*	199*	188*

* PABUARAN

DATA : RAINFALL (mm/day)
 STATION : PADARINCANG
 YEAR : 1989

DAY	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC
1		15			5	5						
2		6		3					18		4	
3		5			26	8	4			4		31
4						1				1		
5		8			25			5				4
6		8		5	27			3				
7		3	25			3	8				17	
8			1	1								2
9	7	30		10	14	54	9					1
10		11					17					19
11	5		1	25			18	2		6		2
12			3		12		2					
13	3	40							35			
14		20	3			10			3		3	30
15		30			7	8						
16	18	38		2			14					
17	4								1			
18	12	45			7		2		2			
19		35	2								5	
20		25			7		20		6		4	
21		23			8				3	5	10	
22	38		3	5	8							
23	27	8		3	17					3		6
24	25					8		2				
25	4	10				1		3	5			
26	3	15			56							
27					15					4		
28		7	3			9					5	2
29				8	5				4		1	
30			2	1	25	8		11	15			4
31					5							
	146*	382*	43	63	269	115	94	26	92	23	49	101

* PABUARAN

DATA : RAINFALL (mm/day)
 STATION : PADARINCANG
 YEAR : 1990

DAY	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC
1	2		25						1		2	
2					16		4	2				
3	53								24			3
4	3								12			
5	4					5	21	5				
6			30		4			15	2			
7	17						16		7			
8			13		7				28		35	
9	15		2						34			
10			4		9			3	3	15		15
11												
12	2				1			2				
13	14				8			1				24
14		2					16	14				
15					8				1			28
16		41			12			40	1			
17									2			20
18	21										17	27
19	17	34			1				4		6	
20	43						4				30	43
21											5	
22	6		1					3	21			32
23	30					2			23		12	27
24	34						25	17				31
25	3						2			32		65
26	11				8		10		2			7
27					2						5	9
28											30	
29						1						5
30						3						
31												
	280	77	75		75	11	97	102	165	47	142	

DATA : RAINFALL (mm/day)
 STATION : KEPUH
 YEAR : 1979

DAY	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC
1				11	3	4		1		6		
2			12		10		12			0	64	2
3		2	132		2					21	70	0
4			2	31			9			6	0	16
5			4				0		9	28	24	
6			14	36	7		0	2			1	
7		64	4									
8		9	6		8		12		25			22
9			7				0					
10	45		4	16			42			13		
11	33			67					0			
12		23	25	4			15				3	
13	4		12			11					12	
14	37		9				0				0	
15	14			6		13	13				0	16
16					0			12				8
17	23				0	34						18
18				17	15				34		18	
19	108	3		31					0		12	21
20	19	3	8	35			37					
21	21		22			5				8		9
22			8									10
23	15	6				4		28				
24		57		26		6						
25				7					75	39		
26	56					14			0	0		
27	52	11									74	
28					13							21
29					20				7		20	
30					0				0	5		
31					7					24		14
	437*	165*	269	287	85	81	140	43	148	150	298	157

* Baros

DATA : RAINFALL (mm/day)
 STATION : KEPUH
 YEAR : 1980

DAY	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC
1	1	11			18		2		1			
2	15				21				4			
3	5							52	8	21	21	
4	3		9		4	4		26	16			4
5	19		33		18							
6	29		5					10				
7	0	8			5	7	5	7				8
8	14	0	29					4				
9	0	44			16				5	35	35	
10	12	13		10				44	5			
11	5		12	51						20		11
12	103	66		64				7				
13	7	1	2					17		34	4	3
14	0				11		5			56	56	4
15	22	38						51			18	
16	16	33		8			7			29		
17			17					37	22			
18	20	11	3							29		
19	39	15	7		2	17				5		
20		113										
21	20	4							43			36
22	31			1								17
23		13		23			8				16	32
24												13
25							4			39	2	
26	4									0		
27				7	7				8			
28		14	9	9	21						6	
29		4		26			20					3
30				10			13			5	23	
31	15						7			24		7
	380	388	126	209	123	28	71	255	112	297	181	138*

* Baros

DATA : RAINFALL (mm/day)
 STATION : KEPUH
 YEAR : 1981

DAY	JAN	FEB	MAR	APR	MAY	JUNE	JULY	AUG	SEP	OCT	NOV	DEC
1	32		61	35								5
2					23					45	26	
3					4							
4										5	9	33
5	13			23						16	7	12
6								9		1	6	6
7	15			17	16		3				3	3
8		19						1				
9												4
10			60						50	6		16
11										21	16	
12		41										7
13		23			20	11	58	26				
14	20			17							5	
15	48			45	35	3						
16		19							28			6
17	39		52	3		34	31				16	
18					7		41	11		6		
19		12										6
20											30	8
21	28			22		5					18	
22		21	9				11	3	30	6		9
23					2	4	12	1		8	49	3
24	65			35	28	6			80		13	
25		71										9
26		10				14				7	29	5
27								13		22	65	6
28	0	12									46	
29	15			23			15					3
30	16						35		72		7	
31			7		5					11		
	291	228	189	220	140	77	206	64	260	154	345	141

DATA : RAINFALL (mm/day)
 STATION : KEPUH
 YEAR : 1982

DAY	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC
1		33	8							10		
2	9	14	7			8						
3		1									22	
4	6									5		
5	5		22		8							
6	6		3			28					4	
7			5								3	
8		22										10
9	126				12	12						
10	32	8	17								12	4
11		8	7									
12	34	2	1	9			3					8
13	11	11	59	22		6				2		7
14	24	12								2		
15	7	2	3				4			20		
16			29									4
17	35											
18	10											
19	30			22								
20	8						32					
21												30
22	30			27								
23		5		2								
24			48									
25	6										17	
26	4	30		49			14					7
27				7	27							
28	38	10				34					6	5
29					41						5	36
30			21									6
31	5									7		6
	426	158	243	146	88	91	53*		0	46	69	123

* Baros

DATA : RAINFALL (mm/day)
 STATION : KEPUH
 YEAR : 1983

DAY	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC
1	13					8						
2	2					18						
3	23	32	16							11		
4		60	48		26							
5				22		1						
6	10	5		30	69						17	
7	6		3								19	
8						19						
9	12	5	26		5				6	6		
10			4		5				74	74		15
11					6							
12	48		8									
13		6	1		5							8
14	12								62	62		
15	23				5					4	15	8
16		16			17							
17					26						18	
18	7						52			17		
19	59			16	49						23	
20	7	16									16	
21					6	17	14				5	
22	20			70	1						6	3
23				16			52					5
24				35						13	64	
25		29	40	37	58					17	30	11
26		22			3						17	17
27		19	50									6
28		66								9		
29										6		
30						99					70	5
31			4									16
	310	296	196	226	281	162	118	0	142	209	300	94

DATA : RAINFALL (mm/day)
 STATION : KEPUH
 YEAR : 1984

DAY	JAN	FEB	MAR	APR	MAY	JUNE	JULY	AUG	SEP	OCT	NOV	DEC
1	19		53	13						35		5
2	15	5		11	7				4		7	
3	25		18				16					
4	20	19	34	15		16	4					
5	61		5		10							56
6							2				14	
7		12	6		13						2	4
8												9
9	6	7	59	6	4	52			15			
10							6		29	8		3
11			5		5			2				6
12	16	18				7		7		22		9
13	4											7
14	21		41	21	8			6	8			5
15			16	8						3		
16		24	17					58			9	
17		15								6		
18	6	25	3	29		96		37				
19												
20		14				15			15		55	
21									9			
22		5	27								9	
23					53			9			5	
24	10	5		11						12		14
25	6	11								13	17	8
26	75	15		11	6			40				
27	25		41	7								45
28	27	2	6		5							12
29	17		6									2
30	23		3	16	8			29			8	
31												
	260	182	340	148	119	186	28	179	263	89	126	183

DATA : RAINFALL (mm/day)
 STATION : KEPUH
 YEAR : 1985

DAY	JAN	FEB	MAR	APR	MAY	JUNE	JULY	AUG	SEP	OCT	NOV	DEC
1			6			14	6	2				5
2				1		6				10		10
3	5			13								9
4			49	10		32		45				
5		12										22
6	19		19			2	6					
7	73		6	2		32						
8			25	26		17	6					
9						17				29		
10				29			24		67			
11	8		6	2		28					20	
12					14				2			
13				35		2						
14				1	43		3					
15				22								
16			21	22			8	6		54		
17				21			28			16		
18	15			6		13			6			
19	10	5			7							
20		35				7	6					34
21		6										
22						31				3		9
23			11	7		5					12	
24				12			14					
25	7		7									
26	15	18			11				22			
27				48		23			2			
28	5	20		1		4	7					
29			9		8					4	29	9
30	2		13		28		19				43	20
31					33							
	159	96	172	258	144	233	127	53	99	116	104	118

DATA : RAINFALL (mm/day)
 STATION : KEPUH
 YEAR : 1986

DAY	JAN	FEB	MAR	APR	MAY	JUNE	JULY	AUG	SEP	OCT	NOV	DEC
1				51					63			
2									28		3	
3	29	18		6		9					14	
4	14		15	5	42							
5	21				41			11				
6	68				1	30						
7			8		12				24		25	
8	14	28	13	74	6	5	14	10				
9		30						31	9			
10	4	27	14	3		5			11		20	
11				15	9				17	15	9	
12	15		4				45		7			
13	2		5		23		22					
14			36	42		7	63					23
15												19
16				27		6						43
17	25									10	6	
18						2					9	
19	30		3								8	
20	48	10										
21	19								15			
22	19	12										
23	35	13	30		40		13			5		
24			2					6		21	10	
25	27		2	12	2		2	17		11	7	20
26	20	7					35		2			
27	70			44						28		
28	41					7	14			10	10	5
29	32					10						8
30	33											
31	11		1							15		
	577	145	133	279	176	81	208	75	176	115	121	118

DATA : RAINFALL (mm/day)
 STATION : KEPUH
 YEAR : 1987

DAY	JAN	FEB	MAR	APR	MAY	JUNE	JULY	AUG	SEP	OCT	NOV	DEC
1		10	23	10								
2	23				33				35		36	7
3	22						10					20
4	23	10			35	13			4			20
5		15				8					42	7
6					19						8	6
7	43	25		9	40						17	
8		4	20			11				12		22
9	20			13	18	14					33	4
10				25						22		
11					21							
12	26				23							
13					22							9
14	11				4				15			9
15				7	25					4		20
16		23										
17		12										20
18	12											22
19	5		30							15		12
20	4										8	
21	18	20	6									
22		25				8						
23		10	4	23								
24	14											
25	13	8				26	7					
26					12	3						
27		34		41	28							
28			16								5	
29	8							21	15		44	
30						34						
31	5				23							19
	246	196	93	128	303	114	17	21	69	53	193	197

DATA : RAINFALL (mm/day)
 STATION : KEPUH
 YEAR : 1988

DAY	JAN	FEB	MAR	APR	MAY	JUNE	JULY	AUG	SEP	OCT	NOV	DEC
1			2	2	9							6
2		32	5		7		10					
3	3	30	16					38			16	
4		13			13	7						
5		3						13				
6	17					12						15
7	5	37						13		12	42	4
8			22					15				
9			22	6	31				9			
10		20	12		19							
11		17			3						44	12
12	25			15					4		4	
13		12	6					11				41
14		37		5	37							
15					37		17					
16				11	38					30	5	42
17	44		7		8					20	5	31
18	34				9					15		5
19				21				35			16	
20	21										13	
21		15	37							15		22
22	10											
23			16				37			5		
24								18			21	
25	6				21						12	
26				6						13	1	
27						12			7	2		
28	37	3	37		0						40	20
29												
30	23		17		8					35		
31												
	225	219	199	66	240	31	64	108	20	147	68	192

DATA : RAINFALL (mm/day)
 STATION : KEPUH
 YEAR : 1989

DAY	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC
1	17			4	19							9
2		32			19							12
3		30		36	12		42					
4		13		3				10	27			
5		10		26	2			2			25	5
6		20						110				
7				21				30			8	59
8		10	41	27	32			2				60
9		2	10	21			4	2	6			
10	13	10		9	19						27	
11												
12							5					22
13	4	17										6
14		58	11		20							3
15		53	10					6			32	2
16	5	7			19							24
17		4		32			22					5
18	3	91										
19		13						54		18		16
20		95			91							
21	46			17	17					3		
22	37	7										
23	9					4						
24	18	8		32	7	21		10			32	10
25	6	21	31					10				
26							15			2		42
27								3		32		20
28								7				
29												
30	3		20	12						4	5	
31	30				12			18				
	191	501	123	240	269	25	88	264	33	59	129	321

DATA : RAINFALL (mm/day)
 STATION : KEPUH
 YEAR : 1990

DAY	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC
1		10						5	8	12		14
2			8						23			12
3	100		22	6	6	6				12		44
4	13	11	11					12				29
5	12				13		12	6				13
6		4		26	30	3	18					8
7	6		33		30		4					
8	39			1				4				
9	3				17							26
10			20	4				4				3
11	23	6	22		7			14				16
12	119		11								15	
13	7	6	12		9		33				4	
14	9											
15	4	7	35		7							38
16			12									
17	28		9						8			
18	17	3										
19	37	10					8			13		10
20	37						3					46
21	39			7		11						
22	32									8	14	
23	22							5		10		43
24	7	1					19	13			40	
25		16	22									
26	70	41	22		34					15	3	22
27	25							12				
28			10	7	27	32				8		
29	40			9	13	8		7				15
30	14				4	7						8
31	26		11				3					
	729	115	256	56	197	67	100	82	39	41	76	347

II.3 Daily Discharge

1980.

Daily Discharge at Kubang Baros

month	1	2	3	4	5	6	7	8	9	10	11	12
day 1	8.18	6.37	17.03	7.94	3.08	5.33	4.16	4.16	7.48	2.57	19.16	50.65
2	7.71	7.26	10.93	4.54	1.93	8.18	3.79	4.34	7.26	1.48	19.46	55.79
3	8.18	7.26	8.66	2.74	2.09	7.94	3.60	4.16	3.79	0.65	20.09	63.18
4	8.66	7.26	7.94	4.93	1.19	9.14	3.25	4.54	4.73	1.93	20.76	67.10
5	9.14	7.26	4.16	3.79	0.52	10.67	2.74	6.37	5.13	2.57	21.46	63.18
6	8.66	9.89	1.93	2.25	0.26	10.67	2.41	8.18	29.53	2.25	22.21	65.12
7	8.90	10.93	1.05	1.78	0.26	10.41	3.25	9.64	50.65	1.63	22.99	68.11
8	8.65	11.19	6.16	1.63	0.26	10.41	10.41	12.00	62.22	0.78	23.81	65.12
9	7.94	10.93	12.28	1.63	0.39	8.66	8.42	10.15	67.10	0.78	24.67	69.12
10	8.66	11.46	15.48	11.73	0.78	7.03	5.74	8.18	80.90	1.34	25.11	73.27
11	8.66	10.93	28.48	9.64	1.05	5.74	5.74	8.90	73.27	2.25	26.03	75.48
12	8.66	10.67	26.50	13.41	1.48	4.73	6.37	10.67	65.12	2.09	26.98	69.12
13	8.90	10.93	37.28	16.73	1.93	3.79	5.74	12.28	59.41	2.91	27.97	66.11
14	8.66	10.67	35.35	15.78	2.25	3.25	5.33	15.17	58.49	7.48	29.00	67.10
15	8.66	10.67	22.99	14.28	2.74	2.74	7.03	26.50	52.33	12.56	34.11	73.27
16	8.18	10.67	19.77	14.58	3.08	5.74	9.39	30.62	43.58	16.72	31.18	80.90
17	8.18	10.67	17.35	11.19	3.60	6.59	11.73	27.97	34.72	10.93	32.32	85.47
18	8.66	11.46	24.67	9.39	4.16	6.37	12.28	27.47	27.47	12.56	33.50	80.90
19	8.42	10.67	22.99	8.66	4.54	5.95	9.64	28.48	16.09	12.56	34.11	34.11
20	8.66	10.93	18.00	8.18	5.13	9.39	7.94	23.40	11.19	13.12	35.35	172.25
21	8.42	10.93	11.73	7.03	7.26	8.90	6.37	18.58	7.94	13.70	36.62	153.78
22	8.18	10.67	6.81	7.03	11.73	9.39	5.13	13.99	6.16	14.28	37.94	162.03
23	8.42	11.19	3.60	7.03	13.41	8.42	4.54	10.41	4.93	14.87	39.29	162.03
24	8.42	10.41	1.63	7.03	13.41	7.26	6.16	7.94	4.16	15.17	40.68	177.49
25	8.42	11.46	0.78	7.03	11.73	6.59	6.16	5.95	3.43	15.78	42.11	162.03
26	6.37	11.19	1.48	5.13	9.39	6.16	5.95	4.73	3.60	16.40	43.58	127.49
27	6.37	10.93	1.63	4.34	10.15	5.53	5.33	3.60	4.34	17.03	44.33	96.30
28	6.37	11.19	1.78	4.34	11.73	4.93	4.93	2.74	3.97	17.67	45.85	70.14
29	6.37	21.11	3.08	3.79	9.39	4.34	4.73	3.43	3.08	18.32	47.41	49.83
30	6.37	4.54	4.54	3.79	7.03	4.54	4.34	3.97	2.57	18.05	49.01	57.58
31	6.37	6.16	6.16		5.95		4.16	4.34		18.58		106.58
mean	250.41	307.16	382.22	221.33	151.90	208.79	186.76	362.86	804.64	289.01	957.09	2771.63
Max	8.08	10.59	12.33	16.72	13.41	10.67	12.28	30.62	60.90	9.32	31.90	89.41
Min	9.14	21.11	37.28	16.72	13.41	10.67	12.28	30.62	80.90	18.58	49.01	177.49
M.I.T.	6.37	6.37	0.78	1.63	0.26	2.74	2.41	2.74	2.57	0.65	19.16	34.11

Daily Discharge at Kubang Baros

Month day	1	2	3	4	5	6	7	8	9	10	11	12
1	131.93	22.21	42.11	25.11	14.87	5.95	12.84	26.50	6.16	121.71	10.67	24.24
2	117.47	18.32	31.74	27.47	14.28	5.13	11.46	20.76	4.93	109.25	8.66	23.81
3	106.58	58.49	25.57	27.97	13.70	5.53	9.14	17.35	4.16	90.17	7.26	30.62
4	144.19	52.33	18.87	26.98	13.41	6.16	7.26	12.56	3.97	73.27	8.66	31.18
5	167.10	46.63	13.12	26.03	12.84	7.48	5.53	9.14	3.97	54.91	14.28	27.47
6	190.04	45.08	7.94	26.50	12.28	8.18	4.16	6.81	4.93	45.85	9.39	22.60
7	184.60	45.85	3.97	24.67	12.28	8.42	3.08	5.53	4.93	36.62	6.37	26.03
8	153.78	51.48	1.34	25.50	11.19	8.42	2.41	6.59	18.05	29.53	4.93	26.03
9	131.93	42.84	1.93	27.97	6.81	8.66	2.09	7.03	23.81	23.81	7.48	27.97
10	117.47	45.85	3.60	26.50	4.93	5.95	1.93	7.26	18.32	18.05	15.17	22.21
11	90.19	40.68	3.25	24.67	4.16	5.53	2.09	7.03	17.35	14.28	21.83	19.16
12	68.11	26.50	4.16	26.50	3.79	5.13	5.53	5.74	17.03	11.73	39.29	19.46
13	49.83	27.47	4.54	25.57	5.74	5.74	6.81	4.54	16.72	9.89	56.68	21.11
14	45.08	27.97	5.53	24.67	9.39	18.87	7.03	3.43	14.58	8.42	57.58	18.32
15	55.79	29.00	6.81	23.81	8.66	19.46	8.42	3.08	10.41	8.90	85.47	14.58
16	41.39	29.53	8.18	22.99	9.14	20.09	9.14	2.74	5.74	9.14	165.40	10.93
17	73.27	30.62	9.14	22.60	10.15	19.46	10.15	2.25	3.08	8.90	128.96	8.18
18	75.40	22.60	9.64	21.83	9.39	20.09	11.19	2.09	1.63	7.94	116.08	6.59
19	75.40	17.67	5.95	21.11	8.42	22.99	13.12	2.41	3.43	6.59	167.30	5.74
20	60.34	13.12	6.59	20.42	9.64	19.46	16.09	7.48	3.79	5.33	155.41	5.53
21	50.65	8.90	7.26	19.77	10.93	14.87	15.78	9.14	2.41	4.34	85.47	7.94
22	31.18	4.73	2.74	19.16	8.66	10.93	13.99	8.18	1.05	3.08	80.90	11.46
23	27.47	1.48	2.74	18.58	6.81	8.42	15.17	7.94	0.52	3.60	57.58	12.56
24	21.83	1.19	5.33	18.05	4.93	6.59	15.17	7.71	1.63	4.54	33.50	12.56
25	18.31	3.79	7.03	17.80	3.43	5.53	18.87	7.48	6.59	4.16	21.11	17.67
26	16.72	26.50	6.81	18.00	2.41	5.95	21.83	6.81	6.59	26.03	17.03	39.29
27	34.72	44.33	14.58	17.35	1.78	6.59	18.87	5.95	8.66	21.11	16.72	54.91
28	34.11	49.01	24.24	16.72	1.63	7.71	18.31	10.67	8.90	18.87	22.60	72.22
29	34.11	27.97	27.97	16.09	2.41	11.73	17.03	13.99	28.48	19.46	21.46	86.64
30	34.72	27.97	27.97	15.48	2.09	13.41	18.32	11.46	53.18	18.00	22.60	80.90
31	29.53		25.11		1.48		28.48	8.42		13.41		72.22
mean	2413.24	834.17	365.76	676.87	241.63	318.43	351.29	258.07	305.19	830.91	1465.64	860.13
Max	77.85	29.79	11.80	22.56	7.79	10.61	11.33	8.32	10.17	26.80	48.85	27.75
Min	190.04	58.49	42.11	27.97	14.87	22.99	28.48	26.50	53.18	121.71	167.30	86.64
	16.72	1.19	1.34	15.48	1.48	5.13	1.93	2.09	0.52	3.08	4.93	5.53

Daily Discharge at Kubang Baros

Month	1	2	3	4	5	6	7	8	9	10	11	12
Day												
1	62.22	6.59	18.05	16.09	18.00	4.16	2.25	5.95	1.78	3.08	1.19	4.34
2	53.18	4.93	16.40	19.77	17.67	3.97	3.08	4.16	1.78	2.74	0.92	3.43
3	45.08	6.81	16.72	19.46	7.48	3.79	3.25	2.91	1.93	3.25	1.05	3.25
4	37.94	5.95	21.83	19.46	8.42	5.74	3.25	2.41	1.63	2.57	1.05	2.25
5	31.18	5.53	25.11	37.28	6.81	8.42	3.25	2.57	1.93	1.93	1.05	1.34
6	26.03	3.79	53.18	34.11	6.16	8.90	3.08	2.57	1.63	1.05	2.91	0.65
7	21.83	1.78	83.17	29.53	8.90	8.90	2.57	2.74	1.48	0.92	9.89	0.39
8	18.58	1.19	89.00	21.83	7.71	8.66	2.74	2.91	1.19	1.19	17.35	0.39
9	20.09	1.63	68.11	17.03	7.26	7.71	2.74	3.08	0.92	1.48	15.48	0.39
10	38.61	3.79	47.41	11.73	8.42	6.59	2.57	2.41	0.92	1.34	11.73	2.74
11	16.40	5.13	20.42	10.67	8.42	5.53	2.41	1.93	1.34	0.65	8.42	4.54
12	9.39	3.43	12.84	9.39	7.48	5.13	2.57	1.78	1.19	0.78	3.25	5.53
13	8.18	4.34	12.28	10.41	6.37	5.74	2.74	1.63	1.19	0.92	2.74	4.73
14	7.03	3.08	44.33	17.03	7.26	5.74	2.74	1.63	0.92	0.78	2.25	3.97
15	5.95	2.57	45.85	30.07	6.59	5.33	2.91	1.78	1.05	0.78	1.78	5.13
16	14.58	6.16	39.98	42.11	5.74	4.54	2.91	1.78	1.05	1.05	1.19	8.42
17	29.00	4.16	29.53	51.48	4.93	4.93	3.43	1.63	0.92	1.48	1.34	5.53
18	45.08	2.41	19.46	41.39	3.97	5.74	3.79	1.63	1.05	1.93	1.63	5.53
19	45.85	1.05	18.00	30.62	3.25	6.16	4.34	1.34	0.78	2.74	2.25	4.93
20	60.34	3.08	75.40	20.09	2.91	5.95	4.73	1.05	1.05	3.08	1.93	5.53
21	60.34	5.95	71.18	14.87	4.73	5.13	5.53	1.19	2.74	3.43	3.25	5.74
22	36.62	8.18	66.11	10.93	4.16	4.34	4.54	1.19	3.08	3.43	4.54	6.37
23	27.97	8.90	53.18	7.26	3.60	3.79	4.54	1.34	2.09	1.34	7.03	6.37
24	26.03	6.59	41.39	12.00	3.08	3.60	4.54	1.19	1.63	0.65	6.81	6.59
25	19.16	6.16	31.74	13.12	2.74	3.43	4.54	1.19	0.78	1.19	6.81	6.37
26	13.12	6.16	20.09	16.09	2.74	3.43	5.74	1.19	0.92	0.78	5.33	7.48
27	8.18	8.18	15.78	19.77	3.79	2.91	7.71	1.19	0.92	0.92	5.95	20.09
28	3.60	16.09	15.48	16.40	4.54	2.57	9.64	1.05	2.25	1.19	5.74	18.05
29	1.48		15.17	13.41	4.73	2.57	10.41	0.78	3.60	0.92	5.53	15.17
30	6.16		10.93	14.28	4.73	2.41	9.64	0.78	3.79	1.48	4.73	20.42
31	6.81		9.89		4.34		8.18	0.78		1.48		10.93
Total	806.01	143.61	1108.01	627.68	196.93	155.81	136.36	59.76	47.53	50.55	145.12	196.59
Mean	26.00	5.13	35.74	20.92	6.35	5.19	4.40	1.93	1.58	1.63	4.84	6.34
Max	62.22	16.09	89.00	51.48	18.00	8.90	10.41	5.95	3.79	3.43	17.35	20.42
Min	1.48	1.05	9.89	7.26	2.74	2.41	2.25	0.78	0.78	0.65	0.92	0.39

Daily Discharge at Kubang Baros

month	1	2	3	4	5	6	7	8	9	10	11	12
day	11.73	13.41	12.00	7.71	1.93	17.67	16.72	4.34	1.05	0.92	16.72	37.94
2	16.40	16.72	13.41	7.48	1.93	17.67	18.32	3.08	0.92	0.92	16.72	42.11
3	15.78	15.48	13.41	10.41	1.34	2.91	17.67	1.78	0.92	0.78	15.48	42.11
4	14.28	17.03	10.93	13.12	2.74	1.93	16.72	3.08	1.05	0.78	14.87	43.58
5	14.58	22.21	8.42	14.28	14.28	3.08	16.09	3.08	1.34	0.85	12.28	42.11
6	18.31	24.24	7.03	13.99	2.91	6.37	15.17	1.93	1.48	0.52	12.28	32.32
7	17.35	23.81	5.95	5.74	3.08	7.71	13.12	0.92	1.78	0.65	10.67	27.97
8	16.72	20.09	5.33	10.67	2.74	8.90	10.67	1.05	1.93	0.65	11.19	21.46
9	18.70	18.00	5.95	9.89	2.91	7.94	8.42	1.63	1.93	0.65	12.28	18.32
10	8.90	14.87	4.93	6.59	10.15	5.95	5.53	1.78	1.05	0.65	14.87	10.41
11	9.14	10.67	4.16	10.15	15.17	4.93	12.28	2.09	2.74	0.65	17.03	10.67
12	7.03	7.03	5.33	12.00	16.72	4.93	2.25	2.25	1.78	0.78	17.03	8.90
13	4.93	5.13	4.93	6.59	12.84	3.60	2.25	2.41	1.63	0.78	17.03	9.14
14	22.60	3.08	5.33	6.59	10.41	7.26	4.93	3.25	1.48	0.78	14.87	8.90
15	22.60	1.93	5.13	5.53	10.41	8.18	5.53	2.91	1.48	0.52	13.12	9.39
16	20.42	1.19	4.73	6.59	5.33	14.28	8.18	2.41	1.48	0.65	45.85	9.89
17	20.76	1.34	4.34	4.73	6.59	9.89	10.93	2.74	1.93	0.65	91.39	11.46
18	20.76	10.93	4.34	6.16	7.71	4.73	10.93	2.91	1.34	0.65	84.31	8.90
19	25.57	9.14	4.16	13.12	6.37	6.16	3.43	2.57	1.34	0.65	92.61	9.14
20	31.18	7.71	3.79	18.00	7.03	7.03	2.57	5.33	1.48	1.34	105.26	8.18
21	34.11	7.94	3.25	14.58	5.33	14.28	2.57	8.66	1.63	3.43	131.93	8.18
22	45.08	7.48	3.97	12.56	2.74	14.28	2.57	10.67	1.63	4.34	127.49	8.18
23	42.84	6.37	4.34	5.33	5.74	4.54	5.53	11.19	1.48	5.33	98.82	7.03
24	46.63	5.53	4.73	4.73	15.78	12.84	8.90	7.94	1.48	6.37	113.32	6.81
25	46.63	6.16	4.93	3.97	13.70	6.16	6.81	3.79	1.34	7.48	35.35	9.89
26	45.85	7.94	5.33	4.16	5.74	15.78	5.33	2.91	1.34	8.66	49.83	10.67
27	29.00	8.90	5.74	5.95	6.37	14.58	3.97	2.74	1.19	9.64	54.04	7.71
28	21.11	9.89	6.16	4.93	3.08	4.73	8.18	1.93	1.19	10.93	39.98	8.42
29	18.67		6.59	17.67	4.34	8.18	5.95	1.78	1.05	12.28	42.84	10.67
30	16.72		6.81	18.00	5.74	12.00	6.81	1.03	1.05	13.70	48.21	19.46
31	15.17		7.26		8.18		5.95	0.92		15.17		18.87
Total	694.75	304.22	192.71	281.22	219.33	258.49	264.28	105.12	43.51	111.95	1377.67	528.79
Mean	22.41	10.86	6.22	9.37	7.08	8.62	8.53	3.39	1.45	3.61	45.92	17.06
Max	46.63	24.24	13.41	18.00	16.72	17.67	18.32	11.19	2.74	15.17	131.93	43.58
Min	4.93	1.19	3.25	3.97	1.34	1.93	2.25	0.92	0.92	0.52	10.67	6.81

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Daily Discharge at Kubang Baros

month	1	2	3	4	5	6	7	8	9	10	11	12
day	17.03	10.93	13.99	44.33	12.28	22.60	4.34	5.74	3.25	29.00	3.97	5.74
	14.58	9.39	12.28	31.74	11.46	13.12	4.16	5.33	3.25	24.24	3.25	5.13
	12.00	7.48	12.28	22.21	12.84	10.15	3.79	5.33	3.25	21.83	3.25	56.68
	9.64	26.03	12.28	17.35	13.70	11.19	6.59	5.33	3.97	18.58	3.60	80.90
	7.71	26.03	12.28	12.00	12.56	9.89	6.59	5.13	4.16	18.05	3.25	66.11
	5.74	29.53	12.28	7.03	14.28	8.90	11.19	5.13	4.73	16.72	3.97	63.18
	3.97	30.62	12.28	5.95	17.80	8.18	11.46	4.73	5.74	7.94	4.73	51.48
	2.57	30.62	30.07	4.93	22.99	7.26	10.67	4.16	10.67	10.15	5.74	39.98
	1.19	31.74	30.07	5.33	31.18	6.81	9.89	3.43	15.17	7.03	7.48	27.47
	1.34	12.00	30.07	7.48	28.48	6.16	9.39	3.25	17.35	5.53	7.71	24.24
	3.97	12.00	30.07	10.93	64.15	7.48	8.90	3.25	16.40	4.73	7.71	21.46
	14.87	12.00	30.07	8.42	45.08	7.26	7.94	3.08	13.99	4.54	9.39	17.03
	19.16	12.00	30.07	7.94	26.03	7.03	7.03	2.91	13.12	3.60	10.67	15.48
	17.03	12.28	30.07	7.48	18.87	6.37	5.95	3.43	12.28	4.34	12.28	15.17
	12.00	12.28	18.87	6.37	13.70	5.53	5.53	3.25	11.46	4.54	12.28	16.09
	1.34	12.28	18.87	9.14	15.78	4.54	4.93	3.25	11.46	4.54	13.12	18.00
	17.80	12.28	18.87	9.14	15.78	3.79	4.73	3.25	10.67	5.95	10.93	16.72
	17.67	9.14	18.87	6.59	11.73	3.08	4.54	3.25	9.89	5.33	10.93	14.58
	19.46	5.95	18.87	4.93	9.89	5.95	4.54	3.25	11.19	5.13	9.64	13.70
	18.31	4.93	39.98	6.37	9.14	10.67	4.34	3.25	10.93	4.73	8.42	12.28
	18.32	3.08	65.12	13.12	11.19	10.67	7.26	3.25	10.93	4.73	7.94	9.14
	10.67	3.08	46.63	9.89	8.65	7.94	7.03	3.08	10.41	4.73	7.48	7.71
	15.17	5.95	35.35	7.94	7.26	6.37	5.33	2.91	9.89	4.73	6.81	6.81
	14.28	7.48	29.53	7.94	6.37	4.73	4.93	2.74	9.64	5.13	6.16	5.95
	17.35	11.19	28.48	8.16	9.14	3.79	5.13	3.08	6.16	5.53	9.89	6.16
	16.09	3.25	31.74	12.28	11.19	2.74	7.48	3.79	5.53	8.66	9.89	15.48
	22.60	20.09	39.29	13.70	10.93	2.25	6.81	3.43	5.13	5.95	9.14	13.99
	21.11	23.40	45.85	13.70	13.41	1.63	8.18	4.16	4.54	4.93	7.94	49.83
	17.03	18.05	49.83	15.17	33.50	4.34	4.54	4.73	4.16	4.93	7.03	42.11
	15.48		56.68	14.87	40.68	3.97	4.93	3.79	18.00	5.74	6.37	35.35
	13.41		60.34		26.03		8.18	3.43		6.16		29.53
Total	398.89	415.08	921.33	382.45	586.08	214.39	205.45	118.12	277.32	267.72	230.97	803.48
Mean	12.87	14.31	29.72	11.75	18.91	7.15	6.63	3.81	9.24	8.64	7.70	25.92
Max	22.60	31.74	65.12	44.33	64.15	22.60	11.46	5.74	18.00	29.00	13.12	80.90
Min	1.19	3.08	12.28	4.93	6.37	1.63	3.79	2.74	3.25	3.60	3.25	5.13

Daily Discharge at Kubang Baros

month	1	2	3	4	5	6	7	8	9	10	11	12
day	6.81	32.32	11.19	29.00	13.41	5.95	3.08	3.25	1.93	7.94	18.58	18.00
2	10.15	29.53	10.15	19.46	13.12	5.53	2.91	3.95	1.93	7.71	18.32	13.99
3	13.70	26.03	10.15	17.67	12.28	5.33	2.41	6.53	1.78	7.26	17.35	9.14
4	18.00	23.40	11.73	22.21	10.93	5.53	2.41	6.16	1.63	6.81	17.80	7.48
5	21.46	20.76	12.28	25.11	9.14	5.13	2.25	7.26	1.48	6.81	26.50	6.81
6	27.47	20.42	11.46	26.98	9.14	5.13	2.09	7.03	1.63	4.73	21.46	5.53
7	34.72	17.03	9.64	27.47	9.14	5.13	2.41	6.59	1.93	4.73	26.50	4.93
8	44.33	17.03	9.14	21.46	9.14	5.13	2.91	6.16	2.09	4.73	34.72	4.34
9	55.79	16.40	8.42	18.58	8.66	5.13	3.60	4.34	4.16	5.13	30.07	3.60
10	63.18	14.87	7.94	17.03	9.39	5.13	3.79	9.39	4.54	5.13	39.98	3.25
11	69.18	18.32	7.48	17.03	9.14	5.13	4.16	8.66	5.13	6.16	40.68	3.25
12	60.34	25.57	8.42	17.03	9.14	5.13	5.13	7.26	4.93	7.03	49.01	3.08
13	48.21	24.24	7.71	18.87	8.66	4.93	4.73	6.59	6.16	8.42	58.49	2.74
14	37.28	22.99	7.03	17.80	8.66	4.34	4.16	8.66	5.95	9.64	54.04	29.53
15	29.00	22.21	6.81	17.35	9.89	3.97	3.43	8.66	5.53	9.64	45.85	27.47
16	29.00	21.11	6.81	17.03	9.64	3.97	3.43	6.81	5.33	9.64	39.98	25.11
17	26.50	20.09	6.16	21.46	9.39	3.97	3.08	6.16	6.16	9.39	22.99	23.40
18	23.40	19.16	5.95	17.80	8.90	4.16	3.08	5.13	6.59	9.14	14.28	20.09
19	22.21	18.58	5.74	15.17	8.18	5.33	2.74	4.34	6.59	8.66	15.17	17.67
20	20.42	17.80	7.03	12.00	7.48	6.59	2.57	3.79	6.16	7.71	14.58	17.03
21	34.72	17.67	23.81	10.41	6.37	6.16	2.41	3.43	6.16	6.81	13.41	16.09
22	43.58	16.72	27.47	9.14	5.95	5.95	2.25	3.08	5.95	6.16	8.42	13.12
23	56.68	16.09	23.40	9.39	5.13	5.95	2.25	2.57	6.37	5.74	7.48	10.41
24	57.58	15.17	33.50	11.73	5.13	5.33	2.25	2.09	6.16	4.93	7.26	8.42
25	57.58	14.28	27.47	10.67	5.13	4.16	2.41	2.25	7.03	4.54	7.26	7.48
26	57.58	13.41	20.42	8.90	4.73	3.97	2.74	2.41	7.26	9.14	7.03	7.48
27	54.04	12.84	101.37	8.42	4.73	3.43	3.08	2.09	8.90	12.28	6.37	8.90
28	49.01	12.00	65.12	7.94	4.73	3.25	3.25	2.09	9.64	12.28	7.26	7.71
29	47.41		46.63	7.71	4.73	3.25	4.93	2.25	8.90	18.00	17.80	6.37
30	42.11		34.11	7.26	4.93	3.08	5.74	2.09	8.42	18.58	18.32	5.13
31	34.11		31.74		5.53		7.71	1.93		18.31		5.13
Total	1189.55	546.04	606.28	488.08	250.52	145.17	103.39	154.20	156.42	263.18	706.96	342.68
Mean	38.37	19.50	19.56	16.27	8.08	4.84	3.34	4.97	5.21	8.49	23.57	11.05
Max	63.18	32.32	101.37	29.00	13.41	6.59	7.71	9.39	9.64	18.58	58.49	29.53
Min	6.81	12.00	5.74	7.26	4.73	3.08	2.09	1.93	1.48	4.54	6.37	2.74

1987.

Daily Discharge at Kubang Baros

month day	1	2	3	4	5	6	7	8	9	10	11	12
1	7.26	16.40	31.74	7.03	20.09	6.37	4.73	2.91	1.19	1.05	1.34	1.63
2	7.48	15.17	34.11	10.41	20.76	6.37	4.73	2.91	1.19	1.05	1.05	1.63
3	7.71	15.78	34.11	13.41	21.83	6.37	5.13	2.74	1.19	1.05	1.34	1.63
4	15.48	17.35	34.72	12.00	22.21	6.37	5.53	2.57	1.05	1.05	1.78	2.09
5	15.48	18.05	34.11	11.19	19.77	6.59	4.93	2.41	1.05	1.05	1.63	2.09
6	21.11	20.09	39.98	12.28	17.67	6.16	4.73	2.25	1.05	1.05	1.93	2.74
7	19.46	20.42	35.99	12.84	14.87	5.95	3.97	1.93	1.05	1.05	1.63	2.41
8	51.48	22.99	32.32	14.87	13.70	5.95	3.79	1.93	1.05	1.05	2.09	4.54
9	51.48	36.62	32.32	15.48	16.09	7.03	3.43	1.93	1.05	1.05	2.74	3.08
10	61.28	30.62	27.97	14.58	18.32	7.48	3.25	1.93	1.05	1.05	3.97	2.74
11	65.11	28.48	23.40	14.28	17.03	7.03	3.25	2.25	1.05	2.41	5.13	3.97
12	61.28	23.40	20.09	13.99	16.72	7.26	3.25	2.41	1.05	2.74	5.33	10.15
13	64.15	22.60	18.00	12.00	18.87	7.26	3.25	2.25	1.05	2.74	5.95	7.71
14	49.83	22.21	16.09	16.40	20.42	6.81	3.08	2.09	1.05	2.74	5.33	6.59
15	42.84	21.46	13.12	18.32	19.16	7.03	2.57	1.93	1.05	2.41	5.13	5.53
16	40.68	20.76	12.00	18.32	17.80	7.48	2.41	1.93	1.05	1.63	6.59	8.66
17	36.62	19.77	9.39	16.72	17.35	7.26	2.25	1.63	1.05	1.63	5.74	8.18
18	31.18	18.56	7.94	14.58	16.09	7.26	2.25	1.63	1.05	1.78	4.73	5.95
19	24.67	18.05	5.74	12.56	14.87	6.81	2.25	1.63	1.05	2.41	3.97	9.64
20	25.57	17.35	4.34	10.41	12.00	6.37	2.25	1.63	1.05	2.57	3.60	9.69
21	21.46	18.00	7.48	8.18	10.41	6.37	2.09	1.63	1.05	2.25	3.43	14.28
22	19.46	12.00	10.93	5.74	8.66	6.37	3.08	1.48	1.05	2.57	3.08	12.56
23	17.67	13.12	9.64	4.34	7.26	6.37	2.25	1.48	1.05	2.41	2.91	12.00
24	18.56	74.33	10.93	5.13	7.26	6.37	2.25	1.34	1.05	2.25	2.91	11.73
25	20.42	82.03	9.64	8.66	7.03	6.59	2.25	1.19	1.05	2.25	2.91	10.67
26	20.09	57.58	9.39	7.94	6.59	6.16	3.08	1.19	1.05	1.63	2.91	9.39
27	18.87	32.91	9.89	7.26	7.03	5.95	3.08	1.19	1.05	1.34	1.78	7.71
28	20.42	32.91	10.15	6.81	8.42	5.74	2.57	1.19	1.05	1.34	1.63	7.26
29	18.58		10.93	11.73	8.42	5.33	2.74	1.19	1.05	1.34	1.48	5.95
30	19.16		10.67	18.32	7.26	5.13	3.25	1.19	1.05	1.48	1.48	5.33
31	17.35		9.39		6.81		2.91	1.19		1.48		5.13
Total	913.21	749.03	576.51	355.78	440.77	195.59	100.58	57.15	31.92	54.04	95.52	202.86
Mean	28.46	26.75	18.60	11.86	14.22	6.52	3.24	1.84	1.06	1.74	3.18	6.54
Max	66.11	82.03	39.98	18.32	22.21	7.48	5.53	2.91	1.19	2.74	6.59	14.28
Min	7.26	12.00	4.34	4.34	6.59	5.13	2.09	1.19	1.05	1.05	1.05	1.63

Daily Discharge at Kubang Baros

month	1	2	3	4	5	6	7	8	9	10	11	12
day 1	4.34	16.40	5.13	32.91	13.70	6.37	5.13	2.09	2.09	2.91	7.48	36.62
2	3.25	21.83	5.13	63.18	18.05	5.95	4.73	2.57	2.09	3.25	8.90	35.35
3	3.08	26.98	4.93	45.85	17.03	5.53	4.34	2.57	1.93	3.25	7.94	31.18
4	2.57	55.79	29.00	40.68	16.40	5.97	3.97	1.93	1.63	3.08	7.26	29.00
5	2.25	56.68	26.50	39.29	18.31	10.15	3.43	1.93	1.63	2.91	7.03	23.81
6	1.93	49.83	24.24	34.11	20.76	10.41	3.60	2.91	1.63	2.74	9.14	22.60
7	1.63	41.39	24.24	20.42	23.81	10.67	3.43	3.43	2.25	2.74	15.17	21.11
8	1.63	53.18	24.24	20.09	18.87	11.46	2.74	3.97	2.41	2.57	10.67	20.76
9	1.63	39.29	22.60	18.03	14.87	14.58	2.74	5.13	2.74	2.09	8.18	18.58
10	1.48	39.29	20.42	16.40	14.28	14.28	2.25	4.93	3.25	2.25	5.13	18.32
11	1.63	36.62	20.42	14.28	13.12	14.28	2.09	3.97	3.43	2.09	4.34	16.09
12	1.63	34.11	16.72	18.31	12.00	13.70	1.93	3.60	3.23	1.93	9.14	14.87
13	1.63	26.98	12.28	16.40	13.41	13.41	1.93	3.25	3.25	1.93	16.09	15.48
14	1.63	25.11	10.67	14.58	16.09	12.84	1.93	2.74	3.08	3.08	18.00	39.98
15	2.57	35.98	10.67	14.87	17.80	13.12	1.93	2.57	3.08	3.08	16.09	58.49
16	3.97	59.41	10.93	14.28	18.32	12.28	2.57	3.43	2.57	3.08	13.70	56.68
17	3.43	49.01	15.48	15.48	17.67	12.00	2.57	3.08	2.57	3.08	11.46	58.49
18	4.54	47.41	14.87	13.41	21.46	11.73	2.25	2.74	2.91	3.79	10.41	56.68
19	5.95	42.11	13.70	16.40	21.11	11.46	2.09	2.91	2.91	4.16	11.73	52.33
20	4.73	34.72	12.84	18.32	20.76	11.19	2.09	2.74	3.25	7.48	11.19	48.21
21	4.54	34.72	12.84	18.05	22.60	10.93	2.09	3.25	3.25	5.95	11.46	42.84
22	4.54	30.07	13.41	18.58	18.05	9.64	2.09	3.60	2.74	5.74	14.58	29.00
23	6.81	25.11	17.35	18.05	15.78	9.39	1.93	3.25	2.74	4.54	18.32	22.60
24	9.39	17.80	17.80	15.48	13.70	9.14	1.93	3.08	2.74	4.34	19.77	20.09
25	9.64	9.64	16.09	20.09	13.12	8.90	1.93	2.74	2.41	3.79	21.11	18.31
26	9.14	9.39	14.58	13.41	12.00	7.94	1.93	2.41	2.41	4.73	23.40	17.57
27	14.28	7.48	13.70	10.67	7.71	6.59	1.93	2.25	2.41	4.16	30.07	16.09
28	16.72	6.59	13.70	12.28	7.26	6.81	1.93	2.09	2.41	3.97	30.62	13.98
29	16.09	5.74	19.16	13.70	7.03	6.37	2.25	1.93	3.08	3.79	29.00	12.56
30	16.40		32.32	15.48	7.03	5.95	2.25	1.93	3.08	3.79	31.18	10.67
31	16.40		31.74		6.81		2.09	1.78		7.26		8.66
Total	179.45	938.66	527.70	643.10	478.91	302.60	80.09	90.80	79.22	113.55	438.56	837.11
Mean	5.79	32.37	17.02	21.44	15.45	10.08	2.58	2.93	2.64	3.66	14.62	28.62
Max	16.72	59.41	32.32	63.18	23.81	14.58	5.13	5.13	3.43	7.48	31.18	58.49
Min	1.48	5.74	4.93	10.67	6.81	5.53	1.93	1.78	1.63	1.93	4.34	8.66

Daily Discharge at Kubang Baros

month	1	2	3	4	5	6	7	8	9	10	11	12
day	11.19	7.26	59.41	7.26	7.26	7.26	2.91	2.91	1.79	2.91	4.73	4.93
	9.39	8.42	57.56	7.26	7.26	7.26	3.08	2.74	4.34	2.74	4.73	4.93
	8.90	10.41	54.04	7.26	7.03	7.03	3.08	2.57	4.54	2.91	2.91	4.34
	8.42	10.41	48.21	7.26	6.81	6.81	2.91	2.41	4.16	3.08	2.91	4.34
	10.15	9.14	47.41	7.26	7.03	7.03	2.74	1.78	3.25	3.08	2.74	5.74
	8.90	39.98	43.58	7.26	7.26	7.26	4.93	1.63	2.91	2.74	2.57	5.74
	8.18	36.62	39.29	7.26	7.26	7.48	4.54	1.34	2.41	2.74	2.57	5.53
	7.03	34.11	36.62	7.26	7.26	7.03	3.25	1.63	2.09	2.41	3.08	5.33
	6.59	34.11	33.50	7.26	7.26	6.16	6.81	2.09	1.93	2.41	3.08	6.37
	6.16	25.57	31.18	7.26	7.26	15.17	9.64	1.63	1.78	2.09	4.16	7.03
	6.16	22.99	24.24	7.26	7.26	12.00	11.46	1.93	1.63	2.09	4.16	7.03
	7.26	21.46	23.40	7.26	7.26	9.39	12.00	2.74	2.09	1.93	5.13	9.39
	6.37	20.42	19.77	7.26	7.26	7.48	9.89	2.41	4.73	1.93	5.13	9.14
	5.53	20.42	17.80	7.26	7.26	7.03	8.42	1.78	5.13	2.09	4.73	9.14
	4.93	26.50	16.09	7.26	7.26	7.26	7.03	1.63	6.59	2.09	4.73	9.14
	7.94	33.50	18.87	7.26	7.26	7.03	13.12	1.48	6.37	1.93	3.97	9.64
	7.94	32.32	19.45	7.26	7.26	6.59	9.64	1.34	5.52	1.93	4.73	9.64
	9.14	55.79	18.32	7.26	7.26	6.16	12.00	1.05	4.54	1.63	4.54	9.64
	7.71	105.26	16.40	7.26	7.26	4.93	7.26	1.48	4.34	1.63	4.54	10.15
	6.81	120.29	13.99	7.26	7.26	4.73	15.17	1.34	4.54	1.63	4.73	10.15
	6.16	121.71	12.00	7.26	7.26	4.34	12.00	1.63	4.54	1.63	5.13	9.14
	5.53	141.07	10.41	7.26	7.26	4.16	9.64	1.48	4.16	1.93	5.33	9.14
	10.41	137.88	9.39	7.26	7.26	3.25	7.94	1.34	2.91	1.93	5.13	9.39
	10.41	128.96	9.14	7.26	7.26	2.91	5.74	1.63	2.57	1.93	4.73	9.14
	9.39	113.32	9.14	7.26	7.26	2.74	5.13	1.48	2.25	1.93	4.54	9.14
	8.66	98.82	7.94	7.26	7.26	3.08	4.93	2.57	1.78	2.57	4.34	8.90
	7.48	70.14	6.37	7.26	7.26	2.91	4.73	2.41	1.63	3.79	3.97	8.66
	6.81	61.28	7.03	7.26	7.26	2.74	4.54	2.74	1.48	4.73	3.97	9.89
	6.37		7.26	7.26	7.26	3.25	4.16	2.57	1.34	5.13	3.60	9.89
	5.74		6.16	7.26	7.26	3.08	3.25	1.63	2.74	5.13	2.91	9.39
	5.95		7.26		7.26		3.08	1.78		4.73		9.14
Total	237.61	1548.26	731.26	217.80	225.06	183.55	215.02	59.17	100.08	61.42	123.52	249.56
Mean	7.66	59.30	23.59	7.26	7.26	6.12	6.94	1.91	3.34	2.63	4.12	8.05
Max	11.19	141.07	59.41	7.26	7.26	15.17	15.17	2.91	6.59	5.13	5.33	10.15
Min	4.93	7.26	6.15	7.26	7.26	2.74	2.74	1.05	1.34	1.63	2.57	4.34

1990

Daily Discharge at Kubang Baros

month	1	2	3	4	5	6	7	8	9	10	11	12
Day												
1	8.18	34.72	1.78	2.74	2.25	1.93	1.93	2.41	1.93	4.34	7.03	9.89
2	8.18	34.72	1.78	2.74	2.25	1.93	1.93	2.41	1.93	4.34	7.03	9.89
3	9.14	47.41	1.63	2.57	2.25	1.93	1.93	2.74	1.78	4.54	7.26	9.64
4	9.14	48.21	1.63	2.57	2.09	1.93	1.93	2.74	1.78	4.54	7.26	9.64
5	9.14	47.41	1.63	2.41	2.09	1.93	1.93	2.74	1.78	4.73	7.48	9.64
6	8.90	29.00	1.93	2.41	2.09	1.93	2.25	2.41	1.78	4.73	7.48	9.64
7	8.90	29.00	1.93	2.41	2.09	1.93	2.25	2.41	1.78	4.73	7.48	9.64
8	8.66	26.50	2.25	2.25	1.93	1.93	2.25	2.91	1.63	4.93	7.71	9.39
9	8.66	26.03	2.25	2.25	1.93	1.93	2.25	2.91	1.63	4.93	7.71	9.39
10	8.66	24.24	2.25	2.25	1.93	1.93	2.25	2.91	1.63	5.13	7.94	9.14
11	8.42	24.24	2.57	2.57	1.93	1.93	1.63	2.74	1.63	5.13	7.94	9.14
12	8.42	21.46	2.57	2.57	1.93	1.93	1.63	2.74	1.63	5.13	7.94	9.14
13	18.05	21.46	2.57	2.91	1.93	1.93	2.09	2.57	1.63	5.33	8.18	9.64
14	22.60	19.46	2.25	3.25	1.93	1.93	1.93	2.57	1.63	5.33	8.18	9.64
15	22.21	18.05	2.25	3.97	1.93	1.93	1.93	2.57	1.63	5.53	8.42	9.64
16	21.83	17.03	3.25	3.97	1.93	1.93	1.93	2.41	1.63	5.53	8.42	9.14
17	21.83	15.48	3.25	3.97	1.93	1.93	1.93	2.41	1.63	5.74	8.66	9.14
18	25.57	9.64	3.60	3.97	1.93	1.93	1.93	2.25	1.63	5.74	8.66	10.93
19	24.24	8.90	3.60	3.60	1.93	1.93	1.93	2.25	1.63	5.95	8.90	10.93
20	34.72	4.34	3.79	3.60	1.93	1.93	1.93	2.25	1.63	5.95	8.90	10.67
21	34.72	3.08	3.79	3.25	1.93	1.93	2.25	2.25	1.63	5.95	8.90	10.67
22	41.39	2.91	3.97	3.25	1.93	1.93	2.25	1.93	2.57	6.16	9.14	10.41
23	41.39	2.74	4.34	3.08	1.93	1.93	2.09	1.93	3.60	6.16	9.39	10.41
24	45.08	2.41	4.34	3.08	1.93	1.93	2.09	1.93	4.54	6.16	9.14	10.41
25	47.41	2.41	4.54	2.91	1.93	1.93	2.09	1.93	5.13	6.37	9.39	9.64
26	47.41	2.09	4.54	2.91	1.93	1.93	2.09	1.93	4.54	6.37	9.39	9.64
27	47.41	1.93	3.97	2.57	1.93	1.93	1.93	1.93	4.16	6.59	9.64	9.39
28	49.01	1.93	3.79	2.57	1.93	1.93	1.93	1.93	4.16	6.59	9.64	9.39
29	41.39		3.79	2.57	1.93	1.93	1.93	1.93	4.16	6.81	9.89	9.39
30	41.39		3.60	2.41	1.93	1.93	1.93	1.93	4.16	6.81	9.89	7.94
31	39.98		3.25		1.93		2.41	1.93		6.81		7.94
Total	772.03	526.80	92.68	87.58	61.43	57.90	62.91	72.90	72.45	173.08	252.99	299.14
Mean	24.90	18.81	2.99	2.92	1.98	1.93	2.03	2.33	2.41	5.58	8.43	9.63
Max	49.01	48.21	4.54	3.97	2.25	1.93	2.41	2.91	5.13	6.81	9.89	10.93
Min.	8.18	1.93	1.63	2.25	1.93	1.93	1.63	1.93	1.63	4.34	7.03	7.94

1980.

Daily Discharge at Serut.

month	1	2	3	4	5	6	7	8	9	10	11	12
day												
1	3.36	3.94	1.86	0.66	1.29	0.58	0.49	0.86	0.44	0.75	1.56	0.54
2	0.99	1.45	1.65	0.66	1.65	2.45	0.47	0.58	0.61	0.70	0.99	0.49
3	0.92	2.09	1.46	0.61	1.29	1.65	0.45	1.21	0.92	0.66	2.20	0.49
4	0.06	1.65	1.76	0.79	1.06	0.86	0.44	2.20	2.58	2.45	2.20	0.49
5	1.29	1.46	1.65	0.70	0.92	0.70	0.43	1.86	8.38	1.65	3.14	0.58
6	0.92	1.37	1.86	0.86	0.80	0.58	0.44	1.06	2.33	1.13	1.65	1.29
7	0.86	1.46	5.03	0.80	1.56	0.66	0.43	0.86	1.37	0.92	1.21	0.80
8	2.72	1.37	3.00	0.70	1.06	0.66	0.44	0.92	3.45	1.56	0.99	0.61
9	3.36	16.01	1.76	0.66	1.13	0.80	0.45	0.80	1.65	1.56	0.99	0.54
10	3.36	6.93	1.37	0.70	0.80	0.66	0.44	6.93	2.33	1.76	0.99	0.52
11	3.36	7.64	2.72	3.77	0.99	0.61	0.44	3.45	3.14	1.21	1.06	0.52
12	3.36	5.42	1.46	6.48	0.80	0.58	0.43	3.77	3.00	0.80	0.92	0.52
13	3.19	4.65	1.76	2.86	0.75	0.54	0.47	3.14	1.97	0.80	1.06	0.58
14	3.36	4.65	1.46	1.46	2.33	1.46	0.52	2.09	7.40	2.58	0.99	0.75
15	3.27	5.42	1.37	1.46	1.29	1.06	0.58	3.61	2.58	1.56	3.14	0.54
16	3.19	13.95	1.29	1.65	0.86	0.66	0.75	6.48	1.76	1.06	7.40	0.49
17	3.19	5.22	1.37	1.21	1.21	0.54	0.75	8.13	1.46	0.80	2.86	0.54
18	3.27	4.11	2.86	0.99	0.75	0.49	0.49	4.11	1.13	1.37	3.77	0.58
19	3.27	5.42	2.33	0.86	0.70	0.49	0.49	1.65	0.99	0.70	2.09	1.65
20	3.45	15.30	1.37	0.86	2.45	0.49	0.47	0.92	0.92	0.70	1.65	6.70
21	3.27	8.38	0.99	1.06	1.29	0.66	0.45	0.70	0.80	0.66	1.21	2.86
22	3.19	4.83	0.80	1.06	0.86	0.66	0.45	0.61	1.06	1.76	0.99	7.40
23	3.27	5.83	0.75	3.77	0.70	0.66	0.61	0.54	0.99	1.29	0.75	7.64
24	3.27	4.11	0.70	1.65	0.70	0.66	0.54	0.54	0.80	1.29	0.66	6.04
25	3.27	3.00	0.66	2.09	0.54	0.66	0.58	0.52	0.80	2.20	0.66	6.04
26	3.30	2.33	0.66	1.46	0.47	0.61	0.52	0.52	2.45	1.13	0.70	4.65
27	3.00	2.86	1.13	1.21	0.54	0.61	0.49	0.49	2.09	0.80	0.86	1.86
28	2.33	2.86	1.21	1.21	0.75	0.66	0.49	0.47	1.46	0.70	0.80	1.86
29	1.97	2.45	1.29	1.13	0.61	0.52	0.47	0.44	1.13	0.66	0.66	2.72
30	3.00		1.13	1.06	0.54	0.49	0.49	0.43	0.86	1.65	0.54	11.73
31	8.64		0.86		0.52		1.06	0.44		1.56		13.29
Total	89.35	146.16	49.57	44.44	31.21	22.52	16.04	60.33	60.85	37.99	48.56	85.31
Mean	2.88	5.04	1.60	1.48	1.01	0.75	0.52	1.95	2.03	1.23	1.62	2.75
Max	8.64	16.01	5.03	6.48	2.45	2.45	1.06	8.13	8.38	2.58	7.40	13.29
Min	0.06	1.37	0.66	0.61	0.47	0.45	0.43	0.43	0.44	0.66	0.54	0.49

Daily Discharge at Serut

month day	1	2	3	4	5	6	7	8	9	10	11	12
1	13.29	2.20	4.65	1.46	1.97	0.80	0.70	3.30	1.13	4.46	1.46	3.30
2	13.95	2.09	9.16	1.65	4.28	0.80	0.70	2.20	3.30	3.40	1.46	2.20
3	13.95	11.13	12.03	1.56	2.45	0.75	0.66	1.56	2.86	3.77	1.97	7.16
4	13.95	4.11	6.48	1.56	1.76	0.66	0.66	1.21	1.76	3.45	1.46	2.86
5	41.73	3.00	4.83	1.56	1.56	0.66	0.66	1.06	1.29	3.77	1.46	1.86
6	16.01	2.72	4.11	2.45	1.37	0.66	0.66	0.99	1.21	9.43	1.06	1.76
7	12.65	3.45	3.94	2.45	1.06	0.66	0.61	4.28	3.30	4.46	0.86	3.61
8	12.65	6.26	3.30	1.21	0.92	0.61	0.66	2.09	1.76	2.58	1.13	1.97
9	12.65	4.28	3.61	1.37	2.86	0.61	0.66	1.29	1.29	1.37	6.26	2.33
10	12.65	3.00	3.77	1.29	3.00	0.70	0.66	1.13	2.09	1.06	6.26	1.46
11	12.65	2.20	15.30	1.21	3.00	0.70	0.72	1.13	12.97	1.29	2.33	1.97
12	12.65	2.09	5.42	1.06	1.76	1.29	0.80	0.99	6.93	3.14	3.00	3.61
13	5.03	4.83	3.30	0.99	1.46	1.76	0.70	0.92	3.14	5.83	5.62	1.76
14	5.03	12.65	2.58	1.06	1.37	1.97	6.93	1.29	1.76	2.58	3.77	1.13
15	5.03	7.40	2.20	1.13	4.11	1.21	2.86	1.65	1.86	1.56	8.90	0.99
16	3.94	5.42	2.09	1.13	3.00	0.99	1.76	1.13	1.29	1.21	28.99	1.06
17	6.48	7.86	2.09	2.58	6.26	1.76	1.37	1.06	1.37	1.13	15.30	1.21
18	4.11	4.65	6.48	1.65	3.30	3.00	1.06	1.97	1.37	1.46	5.22	2.09
19	3.77	5.83	4.65	1.21	2.09	4.11	9.98	1.86	1.37	1.21	3.00	1.97
20	5.22	5.22	2.86	1.06	1.65	1.56	3.94	2.20	1.06	0.99	3.14	3.14
21	3.14	3.77	2.20	1.06	1.76	1.13	1.76	1.46	0.92	0.86	2.09	4.65
22	3.14	2.86	2.20	1.56	1.46	0.70	4.11	1.06	0.70	0.80	1.86	2.86
23	4.83	3.94	1.86	2.20	1.13	0.99	2.86	1.06	0.70	0.75	1.86	3.30
24	3.00	11.73	1.65	1.37	0.86	0.99	6.93	2.72	0.70	0.92	1.55	4.28
25	2.58	3.94	1.56	1.56	0.80	1.21	4.46	1.97	2.72	3.61	2.20	3.94
26	1.97	28.04	1.76	2.09	0.86	1.13	2.58	1.46	1.56	2.33	3.45	11.42
27	8.64	9.16	1.29	1.29	0.92	1.65	1.65	1.06	1.29	1.37	2.58	12.56
28	3.94	5.03	1.46	0.99	0.99	1.65	1.37	0.99	1.46	3.30	5.42	5.03
29	6.70		2.20	0.80	1.06	1.21	5.03	1.06	2.72	2.45	2.09	5.22
30	3.77		9.16	0.80	0.92	0.99	20.17	0.92	1.76	1.29	12.65	4.46
31	2.86		1.60		0.86		7.16	1.13		1.65		4.95
Total	271.96	168.88	129.79	43.63	60.85	36.91	94.83	48.20	67.64	77.38	138.50	110.12
Mean	8.77	6.03	4.19	1.45	1.96	1.23	3.06	1.55	2.25	2.50	4.62	3.55
Max	41.73	28.04	15.30	2.72	6.26	4.11	20.17	4.28	12.97	9.43	28.99	12.56
Min	1.97	2.09	1.29	0.80	0.80	0.61	0.61	0.92	0.70	0.75	0.86	0.99

1983

Daily Discharge at Serut

month day	1	2	3	4	5	6	7	8	9	10	11	12
1	0.86	0.49	3.45	2.31	1.95	1.62	4.26	0.16	0.05	0.04	0.45	9.16
2	4.65	0.86	4.46	1.95	1.84	1.52	2.07	0.24	0.04	0.04	0.46	5.22
3	3.00	0.86	2.86	1.72	3.01	1.52	1.10	0.24	0.04	0.03	0.46	3.61
4	1.05	6.26	8.13	2.56	4.90	1.73	0.73	0.24	0.06	0.03	0.47	1.56
5	0.99	3.77	5.62	1.95	2.44	1.95	0.55	0.31	0.07	0.02	0.47	1.37
6	1.13	1.29	3.94	8.65	2.19	7.23	0.31	0.31	0.09	0.01	0.81	6.70
7	1.65	6.48	2.09	4.10	12.32	7.63	0.24	0.39	0.10	0.02	0.91	5.02
8	1.65	2.58	1.56	1.76	5.75	9.08	0.24	0.02	0.12	0.02	0.91	3.61
9	0.92	1.21	1.37	1.29	3.23	13.84	0.24	0.09	0.12	0.02	0.91	2.72
10	0.70	0.86	1.97	0.92	2.56	24.06	0.24	0.09	0.06	0.02	0.91	2.20
11	1.13	0.75	1.13	0.75	3.37	8.03	0.24	0.09	0.17	0.02	0.09	1.86
12	0.80	0.65	1.05	0.66	3.81	4.42	0.24	0.16	0.11	0.03	0.09	1.56
13	0.86	0.61	3.14	0.61	2.44	2.69	0.24	0.16	0.09	0.03	0.09	1.21
14	0.75	0.58	2.20	0.70	3.51	2.69	0.24	0.24	0.08	0.03	0.09	1.05
15	0.92	0.58	1.29	0.75	2.96	2.69	0.09	0.09	0.08	0.01	0.09	0.92
16	0.86	0.80	0.92	1.06	4.58	2.69	0.09	0.09	0.08	0.02	0.09	1.05
17	0.70	1.29	0.75	1.21	3.01	2.69	1.03	0.09	0.12	0.02	1.46	0.92
18	0.61	3.00	0.65	1.29	2.96	2.69	1.03	0.16	0.07	0.02	2.82	0.92
19	1.46	1.76	0.65	2.45	2.96	2.69	0.95	0.16	0.31	0.02	10.18	0.80
20	3.14	0.86	0.61	1.65	2.31	1.40	0.24	0.24	0.08	0.07	11.83	0.80
21	5.22	0.92	0.80	5.62	1.64	1.40	0.24	0.24	0.09	0.39	13.84	0.70
22	7.40	0.80	0.75	3.77	1.73	1.40	0.24	0.24	0.09	0.39	13.58	0.70
23	3.14	1.56	0.70	10.55	2.19	1.40	0.35	0.24	0.09	0.43	13.58	0.61
24	1.56	0.70	0.65	7.88	2.19	1.40	0.86	0.52	0.08	0.47	12.82	0.61
25	0.99	0.70	0.99	5.62	2.07	1.30	0.66	0.25	0.08	0.45	23.72	0.61
26	0.65	2.58	2.20	14.28	3.81	1.30	0.53	0.19	0.07	0.43	48.99	0.54
27	0.61	4.28	4.46	4.46	3.01	2.56	0.40	0.17	0.07	0.42	48.11	0.70
28	0.54	8.13	1.76	2.27	2.56	2.82	0.80	0.12	0.06	0.42	48.11	0.92
29	0.52		5.42	2.31	2.31	1.73	0.59	0.11	0.06	0.43	47.63	0.80
30	0.49		1.56	2.07	1.95	6.66	0.66	0.05	0.05	0.49	28.40	0.70
31	0.49		2.20		1.84		0.59	0.04		0.45		0.61
Total	49.44	55.21	69.33	97.17	97.60	117.84	19.91	5.74	2.68	5.29	332.37	59.76
Mean	1.59	1.97	2.24	3.24	3.15	3.93	0.64	0.19	0.09	0.17	11.08	1.93
Max	7.40	8.13	8.13	14.28	12.32	24.06	4.26	0.31	0.49	0.49	48.99	9.16
Min.	0.49	0.49	0.61	0.61	1.73	0.24	0.09	0.02	0.04	0.01	0.09	0.54

1984

Daily Discharge at Serut

month	1	2	3	4	5	6	7	8	9	10	11	12
day	0.87	5.40	2.72	0.75	4.46	2.86	0.99	1.13	0.92	13.29	1.86	0.80
2	1.13	5.23	2.72	2.86	3.61	1.86	3.61	1.13	0.99	5.42	2.20	0.75
3	1.39	5.07	2.86	3.00	11.42	2.09	3.45	0.92	1.05	3.45	1.65	2.09
4	1.65	5.07	4.28	1.86	5.62	1.76	3.14	0.92	2.33	2.72	1.46	0.99
5	1.92	5.07	8.64	1.56	3.30	2.72	2.45	0.86	2.33	2.09	1.13	1.29
6	2.18	5.07	20.17	1.76	5.42	2.09	4.11	0.86	1.29	1.65	0.86	0.99
7	2.44	5.07	20.17	1.56	3.45	1.65	1.97	0.86	0.92	1.46	0.80	1.37
8	2.70	2.44	4.46	1.29	5.62	1.29	1.37	0.80	3.77	1.37	0.80	0.99
9	2.96	2.69	4.46	5.42	4.65	1.21	1.05	0.75	12.03	1.37	1.21	0.80
10	2.96	3.95	7.88	3.58	4.83	3.14	0.99	0.75	3.94	1.65	0.99	0.70
11	1.10	4.26	16.73	2.58	3.00	3.77	1.37	2.09	5.83	1.65	1.13	0.70
12	1.62	4.26	16.73	1.97	2.86	2.58	1.13	1.86	4.28	4.65	0.70	0.75
13	0.91	4.26	16.73	1.37	2.45	1.86	0.99	0.99	2.20	2.86	0.80	1.65
14	0.55	4.26	16.73	1.46	2.09	1.46	0.92	2.72	1.86	1.76	0.99	2.58
15	0.55	5.40	13.08	1.76	2.26	2.45	0.66	1.05	8.64	1.76	1.13	2.58
16	0.55	5.58	9.43	4.11	2.09	1.76	0.92	0.80	3.94	2.20	0.86	1.86
17	0.47	8.44	10.26	2.33	1.65	1.21	0.86	0.86	4.28	2.09	2.20	2.45
18	0.39	8.44	11.13	1.56	1.56	1.05	1.05	1.46	2.58	3.14	4.65	0.99
19	0.39	8.44	10.26	3.00	1.56	2.86	1.05	1.29	2.58	1.65	1.86	0.70
20	5.58	14.11	11.13	2.72	1.76	4.83	0.86	0.92	1.86	1.13	1.05	0.65
21	7.23	14.11	12.97	1.65	1.46	2.33	0.86	0.86	3.14	6.70	0.92	0.65
22	5.58	5.58	17.83	1.29	1.37	1.56	0.86	0.70	2.33	1.97	0.65	0.65
23	3.81	7.04	22.22	1.13	1.29	1.37	0.75	0.70	1.97	1.21	0.86	0.58
24	16.86	7.04	22.64	1.65	6.04	1.37	3.00	1.05	1.56	1.05	4.28	0.86
25	16.86	7.04	24.82	4.65	3.30	1.29	3.77	1.46	1.37	1.29	1.37	2.86
26	16.86	7.04	25.27	2.09	2.20	1.29	4.28	0.86	1.37	1.21	1.13	1.29
27	16.86	7.04	25.27	4.11	1.86	1.13	1.97	1.46	4.11	1.05	0.80	3.00
28	16.86	7.04	30.46	8.38	1.46	1.13	1.21	4.46	4.28	1.05	0.70	11.73
29	16.86	4.88	29.48	6.04	1.37	1.13	1.05	1.56	2.58	0.99	0.80	3.00
30	16.86	1.97	1.97	5.22	1.37	0.99	0.75	1.13	11.42	1.76	0.99	1.56
31	11.13	1.97	1.97	4.28	4.28	0.66	0.66	1.21	1.21	1.56	1.56	1.29
Total	178.43	179.32	425.47	82.71	99.86	58.09	52.10	38.36	100.69	77.20	40.83	53.15
Mean	5.76	6.18	13.72	2.76	3.21	1.94	1.68	1.24	3.36	2.49	1.36	1.71
Max	16.86	14.11	30.46	8.38	11.42	4.83	4.28	4.46	12.03	13.29	4.65	11.73
Min	0.39	2.44	1.97	0.75	1.25	0.99	0.66	0.70	0.92	0.99	0.65	0.58

Daily Discharge at Serut

month day	1	2	3	4	5	6	7	8	9	10	11	12
1	0.92	0.92	2.58	1.56	1.29	0.58	0.61	1.05	0.45	0.75	0.52	2.14
2	0.86	1.75	2.45	0.75	1.13	0.75	0.58	5.22	0.45	0.70	0.21	2.36
3	1.46	0.80	2.33	0.75	0.92	0.70	1.29	4.83	0.45	1.56	0.70	2.19
4	2.33	0.80	1.45	1.13	1.46	0.75	0.86	1.29	0.45	2.09	0.99	2.42
5	0.80	1.29	0.86	1.86	1.13	0.65	0.61	1.76	0.49	1.42	1.22	7.88
6	0.70	0.99	6.93	1.56	0.99	0.70	0.52	1.86	0.49	0.75	3.94	3.30
7	1.56	0.80	2.09	1.56	0.86	0.80	1.05	1.13	0.54	0.70	3.94	1.46
8	11.13	0.80	5.22	2.33	0.80	1.56	2.09	0.86	1.86	0.70	0.80	0.86
9	6.04	1.46	3.94	1.29	0.86	0.96	2.09	0.75	1.29	0.65	0.58	0.65
10	3.61	0.80	3.30	1.76	0.86	0.81	2.09	0.70	0.58	3.14	0.52	0.65
11	2.09	0.65	1.86	2.09	0.99	0.65	2.86	0.61	0.49	1.13	0.66	0.58
12	1.29	0.65	1.56	3.94	1.13	0.80	4.46	0.58	0.70	0.75	0.58	0.58
13	1.13	1.70	2.09	1.46	1.13	0.52	0.92	0.54	0.75	0.70	0.67	0.54
14	1.13	0.60	1.46	2.33	0.86	0.52	0.75	0.54	0.65	0.80	0.75	0.61
15	0.86	0.58	1.21	4.11	0.86	0.49	0.58	1.21	0.54	0.65	0.70	0.61
16	0.80	0.58	1.05	5.83	0.70	0.45	0.54	0.75	0.79	0.61	0.47	0.61
17	0.75	0.49	1.97	2.72	0.65	0.44	0.49	0.61	0.49	5.22	0.47	0.70
18	0.75	0.49	2.86	14.28	0.61	0.47	0.65	0.54	0.49	1.86	0.47	0.80
19	1.21	0.49	1.65	6.48	0.61	1.13	2.58	0.54	0.47	8.90	0.56	1.05
20	1.46	0.75	0.99	3.14	0.80	0.65	5.42	1.05	0.45	2.58	0.42	1.13
21	1.29	4.83	1.29	2.09	0.65	3.45	5.22	0.65	0.49	0.92	0.47	1.65
22	0.99	2.33	1.13	1.76	0.61	4.65	5.62	0.54	0.49	0.92	0.61	1.76
23	0.75	1.76	0.75	1.90	0.58	1.97	1.56	0.54	0.49	0.75	0.91	1.56
24	0.70	0.80	0.70	2.03	0.58	1.21	1.13	0.54	0.49	0.70	0.79	0.99
25	3.14	0.58	0.61	2.17	0.54	0.65	1.56	0.54	0.49	0.61	0.67	0.86
26	2.86	0.54	0.65	2.31	1.21	0.61	1.13	0.75	1.76	0.58	0.58	0.80
27	3.45	0.54	0.65	2.44	0.99	0.54	1.13	0.92	1.29	0.54	1.12	0.80
28	3.00	0.54	0.61	2.58	1.21	0.75	1.13	0.58	0.75	0.75	0.93	0.80
29	1.65	0.65	1.76	1.76	0.65	0.65	0.75	0.49	0.80	1.29	0.79	0.80
30	1.05	3.00	3.00	1.21	0.61	0.61	0.70	0.48	0.80	0.75	2.33	1.56
31	1.21	2.86	2.86	1.21	0.60	0.60	1.21	0.47	0.54	0.54	1.60	1.60
Total	60.97	29.32	60.75	81.18	26.87	29.27	52.18	32.92	20.72	44.01	28.03	44.18
Mean	1.97	1.05	1.96	2.71	0.87	0.98	1.68	1.06	0.69	1.42	0.93	1.43
Max	11.13	4.83	6.93	14.28	1.46	4.65	5.62	5.22	1.86	8.90	3.94	7.88
Min	0.70	0.49	0.61	0.75	0.54	0.44	0.49	0.47	0.45	0.54	0.42	0.49

Daily Discharge at Serut

month day	1	2	3	4	5	6	7	8	9	10	11	12
1	1.65	4.60	3.45	0.92	1.46	0.65	0.79	0.61	0.49	0.58	1.29	0.86
2	0.75	4.09	2.09	4.65	1.13	0.65	0.94	0.58	0.75	2.33	1.13	0.65
3	0.70	3.93	4.83	3.30	1.13	0.70	1.08	0.54	1.21	1.86	0.72	0.61
4	0.66	2.93	2.45	4.83	0.92	0.70	1.22	0.49	0.54	3.14	1.13	0.61
5	0.58	3.54	1.97	3.00	1.13	0.75	1.36	0.45	0.52	2.20	1.56	0.61
6	2.72	3.62	1.86	2.33	1.46	1.29	1.51	0.47	0.54	2.33	0.99	0.58
7	3.61	2.88	1.29	1.37	1.97	1.05	1.65	0.49	0.54	1.21	1.29	0.58
8	17.09	3.19	2.86	1.37	1.65	1.37	0.29	0.80	1.65	0.70	3.77	0.49
9	17.09	2.24	1.56	4.11	2.20	1.29	0.99	0.66	1.21	0.86	3.45	0.47
10	6.93	3.60	1.46	2.72	1.46	1.05	0.66	0.58	4.11	2.09	1.76	0.47
11	3.77	10.65	3.61	2.72	1.29	0.75	0.92	1.37	3.00	0.86	4.28	0.52
12	2.58	7.90	1.97	4.65	1.37	0.75	0.58	0.70	1.21	0.65	1.37	0.49
13	3.77	3.68	1.65	4.28	3.14	0.65	0.54	0.49	0.75	0.58	1.46	0.92
14	3.61	2.69	2.33	2.09	2.33	0.61	4.86	0.54	1.37	0.99	1.37	6.70
15	2.86	2.29	3.77	1.97	1.37	0.65	10.26	5.62	1.46	0.80	0.99	3.94
16	8.64	2.24	2.09	1.65	0.99	1.76	4.83	1.46	0.75	0.75	0.86	9.70
17	3.14	2.01	1.63	2.45	0.92	1.13	1.56	0.75	1.05	0.70	3.00	2.72
18	2.58	1.69	1.37	2.09	0.92	0.86	0.86	0.61	0.86	0.70	5.02	1.46
19	5.62	1.72	2.72	1.76	0.92	0.75	0.58	0.49	0.75	0.70	3.00	1.21
20	4.28	1.87	2.86	1.46	0.92	0.65	0.54	0.49	0.65	0.70	2.09	0.92
21	19.76	2.77	1.76	1.37	0.92	0.65	0.49	0.45	0.65	0.54	1.29	0.65
22	15.65	1.80	1.46	1.65	0.92	0.65	0.52	0.47	0.65	0.49	1.13	0.92
23	14.96	1.71	1.65	1.46	1.86	0.58	0.54	0.52	0.58	0.49	1.13	0.80
24	6.93	4.05	2.72	1.56	1.87	0.58	1.65	0.58	0.58	0.49	1.13	0.61
25	10.55	2.54	2.33	1.29	1.05	0.54	1.46	0.61	0.54	0.49	1.21	0.58
26	8.38	3.33	2.09	1.86	1.13	0.58	0.92	0.54	0.58	4.28	1.65	1.13
27	12.97	2.66	1.46	1.46	1.37	0.54	0.70	0.49	0.54	3.94	2.09	1.65
28	6.93	2.51	1.46	1.13	0.99	0.54	2.45	0.49	0.54	1.29	1.46	0.86
29	6.93	1.29	4.83	4.83	0.80	0.99	1.65	0.54	0.99	3.45	3.00	0.86
30	9.16	1.05	1.05	2.58	0.80	0.65	1.37	0.49	0.75	2.72	2.33	0.99
31	7.16		0.92		0.70		0.92	1.99		1.46		0.92
Total	212.01	92.69	66.31	72.91	40.59	33.36	48.69	25.36	29.81	44.37	56.95	44.48
Mean	6.84	3.31	2.14	2.43	1.31	1.11	1.57	0.82	0.99	1.45	1.90	1.43
Max	19.76	10.65	4.83	4.83	3.14	9.75	10.26	5.62	4.11	4.28	5.02	9.70
Min	0.58	1.69	0.92	0.92	0.70	0.54	0.29	0.45	0.49	0.49	0.72	0.47

Daily Discharge at Serut

month day	1	2	3	4	5	6	7	8	9	10	11	12
1	0.92	1.56	4.11	1.21	2.33	0.70	0.61	0.49	0.45	0.43	0.44	0.58
2	0.92	1.29	3.45	1.29	0.99	1.21	0.70	0.52	0.43	0.44	0.45	0.52
3	1.76	1.37	2.86	2.20	0.80	0.75	0.66	0.52	0.45	0.43	0.54	0.45
4	2.33	1.65	2.09	1.29	2.20	0.70	0.80	0.45	0.47	0.43	0.58	0.43
5	3.14	1.86	1.76	0.99	4.83	1.46	0.66	0.45	0.45	0.43	0.47	0.43
6	10.55	4.65	1.97	0.99	4.11	1.29	0.66	0.44	0.43	0.43	0.44	0.43
7	4.46	2.09	1.37	0.70	2.72	0.99	0.61	0.44	0.43	0.43	0.47	0.54
8	7.88	2.20	1.37	0.75	1.86	0.54	0.43	0.43	0.43	0.44	0.92	0.47
9	6.93	9.16	1.46	2.33	3.00	1.33	0.52	0.43	0.43	0.43	1.86	0.47
10	4.83	3.14	1.86	0.86	3.14	1.29	0.49	0.43	0.43	0.43	2.20	0.80
11	7.40	2.33	1.97	1.97	3.77	1.21	0.45	0.45	0.44	0.44	0.99	0.75
12	3.00	1.86	1.29	1.29	1.65	1.86	0.49	0.43	0.44	0.43	0.66	0.80
13	9.43	0.99	0.86	0.66	1.46	2.45	0.47	0.43	0.43	0.44	0.52	0.86
14	5.03	1.06	0.99	0.99	1.13	1.13	0.45	0.43	0.43	0.43	0.47	0.66
15	2.86	2.33	1.06	0.99	2.58	0.92	0.49	0.43	0.52	0.43	0.47	0.80
16	2.09	1.46	0.80	0.80	2.09	0.70	0.49	0.43	0.70	0.43	0.47	0.86
17	1.76	1.06	0.80	0.99	2.09	0.86	0.49	0.43	0.58	0.43	0.43	0.66
18	1.46	2.33	1.13	0.70	1.65	1.46	0.45	0.43	0.54	0.43	0.43	1.86
19	1.46	4.46	0.80	2.09	1.46	0.75	0.45	0.43	0.49	0.43	0.43	10.55
20	3.14	1.97	1.76	0.99	1.13	0.66	0.45	0.43	0.45	0.43	0.43	2.09
21	1.56	1.29	1.76	0.70	0.92	0.75	0.45	0.43	0.45	0.43	0.43	1.21
22	2.45	0.99	1.29	0.92	0.92	0.86	0.54	0.43	0.43	0.45	0.43	0.75
23	3.30	1.06	1.46	0.70	0.86	0.99	0.58	0.43	0.43	0.43	0.43	0.58
24	2.72	1.76	1.13	0.80	0.70	0.94	0.49	0.43	0.43	0.43	0.43	0.52
25	2.86	2.27	1.66	1.97	0.80	0.90	0.49	0.43	0.43	0.43	0.43	0.45
26	6.70	3.94	1.13	1.13	1.06	0.85	0.45	0.43	0.43	0.43	0.43	0.43
27	3.00	12.97	2.20	0.86	0.70	0.80	0.47	0.43	0.43	0.43	0.43	0.43
28	2.09	9.16	1.29	1.21	0.80	0.75	0.49	0.43	0.43	0.43	0.43	0.43
29	1.76		1.97	11.42	0.80	0.71	0.49	0.43	0.43	0.43	0.43	0.43
30	1.76		1.29	3.00	0.86	0.66	0.49	0.43	0.43	0.44	0.51	0.43
31	1.29		1.25		0.80		0.49	0.44		0.44		0.43
Total	110.84	82.26	50.09	46.79	54.21	30.68	16.36	13.66	13.76	13.41	18.05	31.11
Mean	3.56	2.94	1.62	1.56	1.75	1.02	0.53	0.44	0.46	0.43	0.60	1.00
Max	10.55	12.97	4.11	11.42	4.83	2.43	0.80	0.52	0.70	0.45	2.20	10.55
Min	0.92	0.99	0.80	0.66	0.70	0.66	0.45	0.43	0.43	0.43	0.43	0.43

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Daily Discharge at Serut

month day	1	2	3	4	5	6	7	8	9	10	11	12
1	0.43	7.70	0.77	1.51	0.73	1.16	1.11	0.54	0.54	0.43	1.78	0.99
2	0.43	10.70	0.77	2.27	0.64	1.28	1.02	0.62	0.46	0.44	0.81	0.48
3	0.44	7.00	1.20	1.87	0.52	0.81	0.85	0.59	0.43	0.43	6.61	0.45
4	0.44	26.00	1.23	1.74	0.67	0.64	0.85	0.49	0.43	0.43	5.86	0.45
5	0.43	20.00	0.67	1.71	0.55	0.56	0.73	0.48	0.42	0.42	2.13	0.45
6	0.43	18.94	0.67	1.56	0.53	0.81	0.79	0.59	0.42	0.42	1.07	0.45
7	0.96	13.90	0.77	1.08	0.52	0.59	0.75	0.61	0.43	0.44	0.64	0.77
8	0.61	8.12	0.88	1.05	0.48	0.52	0.57	0.67	0.42	0.44	0.55	0.59
9	0.61	4.44	0.97	0.95	0.48	0.49	0.57	0.54	0.44	0.42	0.67	0.54
10	1.13	4.01	0.70	0.84	0.61	0.45	0.47	0.49	0.45	0.43	0.91	0.56
11	0.75	2.86	0.78	0.73	0.62	0.51	0.43	0.55	0.44	0.42	1.21	0.66
12	0.66	1.97	0.73	0.97	0.61	0.53	0.38	0.60	0.42	0.42	0.70	5.71
13	0.86	1.63	0.67	0.83	0.67	0.62	0.38	0.66	0.42	4.73	0.56	9.83
14	1.13	1.38	0.56	0.75	0.77	0.49	0.38	0.71	0.43	2.12	0.46	4.64
15	0.75	1.16	0.92	0.76	0.59	0.55	0.38	0.85	0.42	1.02	0.50	2.18
16	0.80	1.05	0.73	0.74	0.92	0.44	0.55	0.74	0.42	2.14	0.52	1.14
17	0.75	0.92	0.59	0.79	0.73	0.45	0.55	0.59	0.43	1.06	0.52	0.75
18	2.45	0.80	0.89	0.70	0.81	0.43	0.47	0.56	0.42	2.23	0.52	0.50
19	1.56	0.80	0.78	0.83	0.81	0.47	0.43	0.51	0.43	1.38	0.59	0.45
20	0.99	0.73	0.61	0.92	0.59	0.48	0.44	0.57	0.42	1.10	0.67	0.44
21	0.66	0.77	0.88	0.96	0.56	0.44	0.44	0.59	0.42	0.96	0.56	0.44
22	1.46	0.70	0.82	0.98	0.76	0.43	0.41	0.51	0.42	0.64	0.51	0.44
23	0.99	0.92	1.10	0.95	0.77	0.44	0.38	0.51	0.42	0.52	0.59	0.44
24	0.70	0.77	0.88	0.80	0.56	0.44	0.38	0.56	0.42	0.52	0.59	0.44
25	0.75	0.84	0.92	1.06	0.54	0.42	0.38	0.59	0.42	0.46	0.59	0.44
26	0.99	0.70	0.80	0.70	0.51	0.43	0.38	0.55	0.42	0.57	0.51	0.44
27	0.70	0.77	0.77	0.56	0.46	0.43	0.38	0.48	0.42	0.59	0.46	0.44
28	0.75	0.80	0.70	0.64	0.42	0.42	0.38	0.45	0.43	0.46	0.53	0.46
29	6.26	0.79	0.88	0.70	0.51	0.42	0.46	0.48	0.44	0.56	0.59	0.44
30	6.74		1.10	0.79	0.56	0.42	0.48	0.45	0.43	7.81	0.51	0.44
31	7.22		0.84		0.55		0.43	0.46		0.48		0.43
Total	44.18	141.17	25.58	30.74	19.11	16.55	16.69	17.59	12.95	38.72	32.79	37.11
Mean	1.43	4.87	0.83	1.02	0.62	0.55	0.54	0.57	0.43	1.25	1.09	1.20
Max	7.22	26.00	1.23	2.27	0.92	1.26	1.11	0.85	0.54	7.81	6.61	9.83
Min	0.43	0.70	0.56	0.56	0.46	0.42	0.38	0.45	0.42	0.42	0.46	0.43

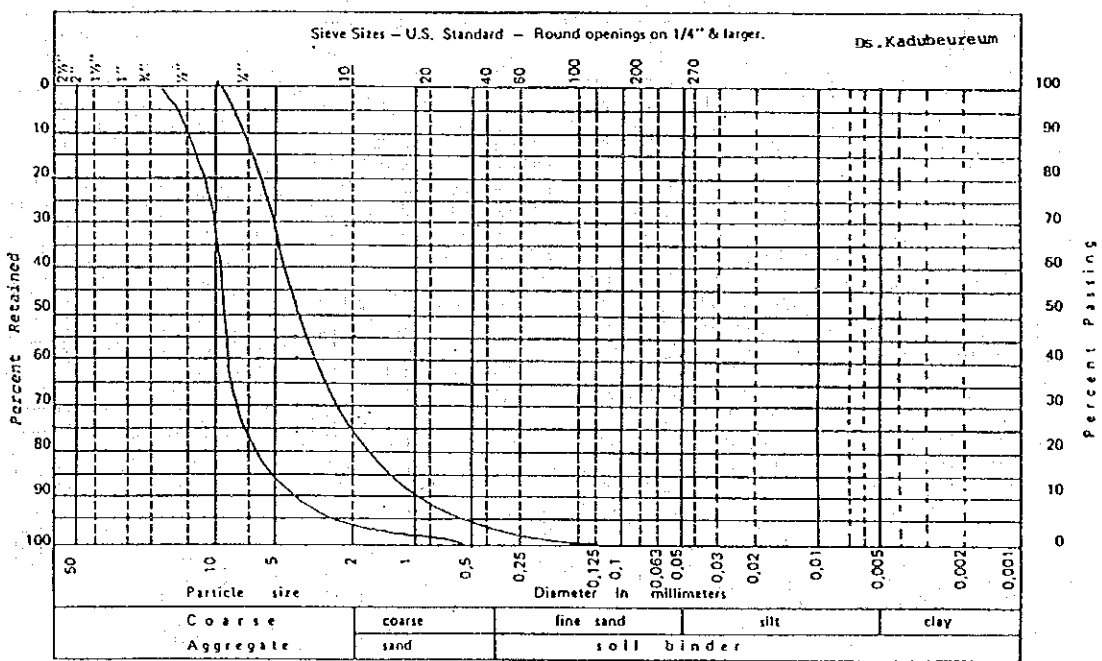
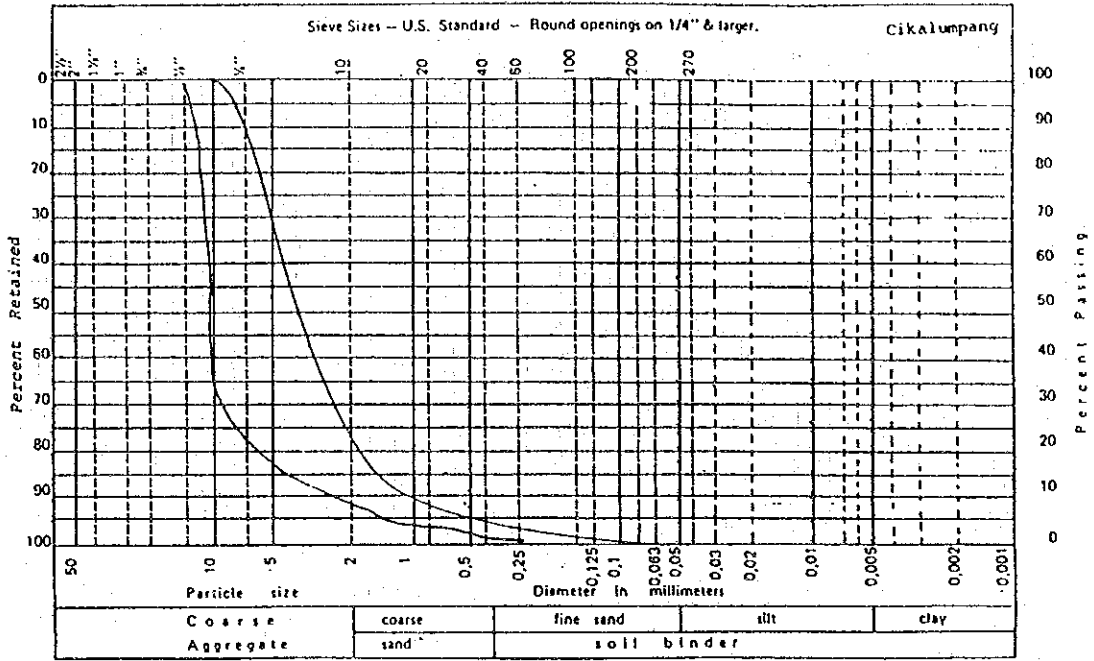
Daily Discharge at Serut

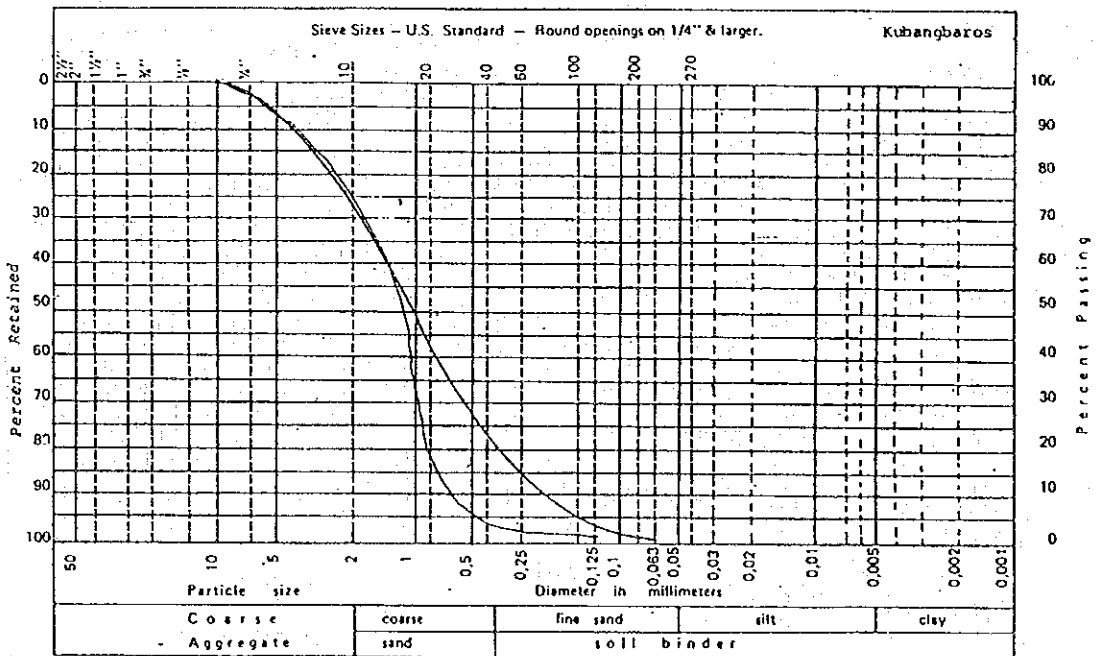
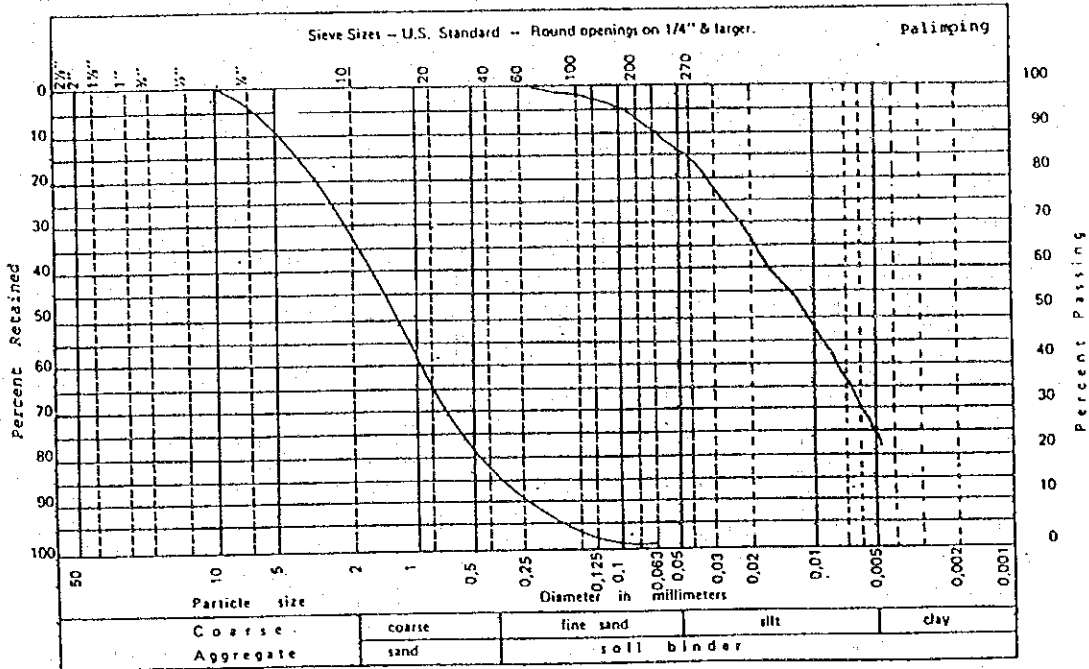
Month	1	2	3	4	5	6	7	8	9	10	11	12
day	0.43	0.59	3.90	0.45	0.13	0.12	0.64	0.64	0.67	0.43	0.42	0.43
1	0.44	0.64	3.92	0.58	0.17	0.43	0.54	0.73	0.53	0.43	0.42	0.43
2	0.48	0.84	3.94	0.26	0.29	0.17	0.51	0.64	0.53	0.42	0.42	0.43
3	0.49	1.62	3.95	0.25	0.14	0.59	0.73	0.73	0.67	0.42	0.43	0.43
4	0.44	8.58	3.84	0.50	0.27	0.19	0.84	0.77	0.55	0.42	0.42	0.47
5	0.44	3.13	3.70	0.43	0.25	0.17	0.64	0.64	0.74	0.42	0.42	0.49
6	0.49	4.18	3.49	0.15	0.23	0.85	0.63	0.56	0.52	0.42	0.42	1.38
7	0.48	2.15	3.42	0.58	0.14	0.83	0.64	0.85	0.51	0.42	0.42	1.00
8	0.56	1.26	3.18	0.75	0.14	0.99	0.66	1.16	0.70	0.42	0.42	0.86
9	0.48	1.51	3.01	0.65	0.14	1.08	0.67	1.27	1.44	0.43	0.42	0.54
10	0.45	0.94	2.88	0.68	0.11	1.12	0.68	0.80	0.85	0.42	0.42	12.44
11	0.64	0.81	2.75	0.56	0.15	1.12	0.70	0.70	0.59	0.42	0.42	1.06
12	0.54	0.92	2.59	0.43	0.12	1.05	0.64	0.64	0.52	0.42	0.42	0.70
13	0.64	1.02	2.20	0.35	0.12	0.97	0.81	0.61	0.45	0.42	0.44	9.36
14	0.84	1.45	2.14	0.34	0.11	0.93	0.64	0.67	0.46	0.42	0.44	4.21
15	0.67	2.29	1.80	0.23	0.11	0.88	0.61	0.67	0.43	0.42	0.44	0.88
16	0.68	1.84	1.64	0.21	0.14	0.86	0.54	0.67	0.42	0.42	0.44	0.49
17	0.84	2.37	1.40	0.18	0.17	0.86	0.59	0.74	0.44	0.42	0.45	6.21
18	0.67	3.75	0.46	0.16	0.13	0.86	0.85	0.62	0.47	0.42	0.66	1.05
19	0.64	4.92	0.46	0.12	0.11	0.89	0.70	0.81	0.44	0.42	0.44	0.60
20	0.59	12.69	0.45	0.21	0.12	0.92	0.61	0.77	0.43	0.43	0.42	1.91
21	0.56	7.66	0.41	0.12	0.32	0.77	0.59	0.61	0.42	0.46	0.45	0.75
22	1.02	3.36	0.41	0.11	0.27	0.95	0.59	0.56	0.42	0.45	0.42	0.55
23	2.84	8.31	0.40	0.21	0.15	0.90	0.57	0.51	0.43	0.43	0.42	0.45
24	1.63	10.66	0.40	0.17	0.12	0.92	0.53	0.63	0.43	0.42	0.43	0.43
25	1.20	7.03	0.51	0.15	0.32	0.93	0.52	1.71	0.42	0.42	0.58	0.47
26	1.01	8.05	0.52	0.11	0.15	0.88	0.78	3.63	0.42	0.42	0.42	7.71
27	0.73	6.72	0.53	0.09	0.12	0.84	1.16	1.58	0.44	0.43	0.42	2.46
28	0.56	0.46	0.46	0.14	0.14	0.86	0.77	0.52	0.58	0.44	0.42	1.88
29	0.51	0.40	0.40	0.13	0.32	0.84	0.64	0.48	0.41	0.42	0.42	0.54
30	0.59	0.43	0.43	0.12	0.12	0.54	0.54	0.46	0.46	0.42	0.42	0.70
31												
Total	22.58	109.29	59.59	9.30	5.49	23.34	20.42	26.38	16.35	13.17	13.21	61.31
Mean	0.73	3.90	1.92	0.31	0.18	0.78	0.66	0.85	0.53	0.42	0.44	1.98
Max	2.84	12.69	3.95	0.75	0.32	1.12	1.16	3.63	1.44	0.46	0.66	12.44
Min	0.43	0.59	0.40	0.09	0.11	0.12	0.51	0.46	0.41	0.42	0.42	0.43

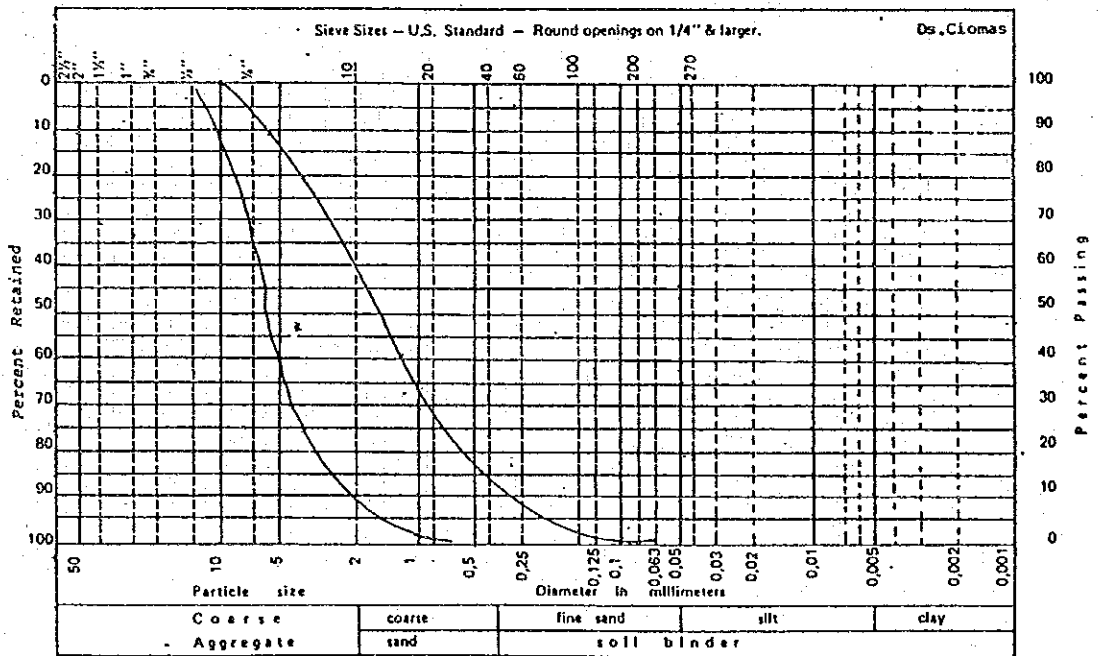
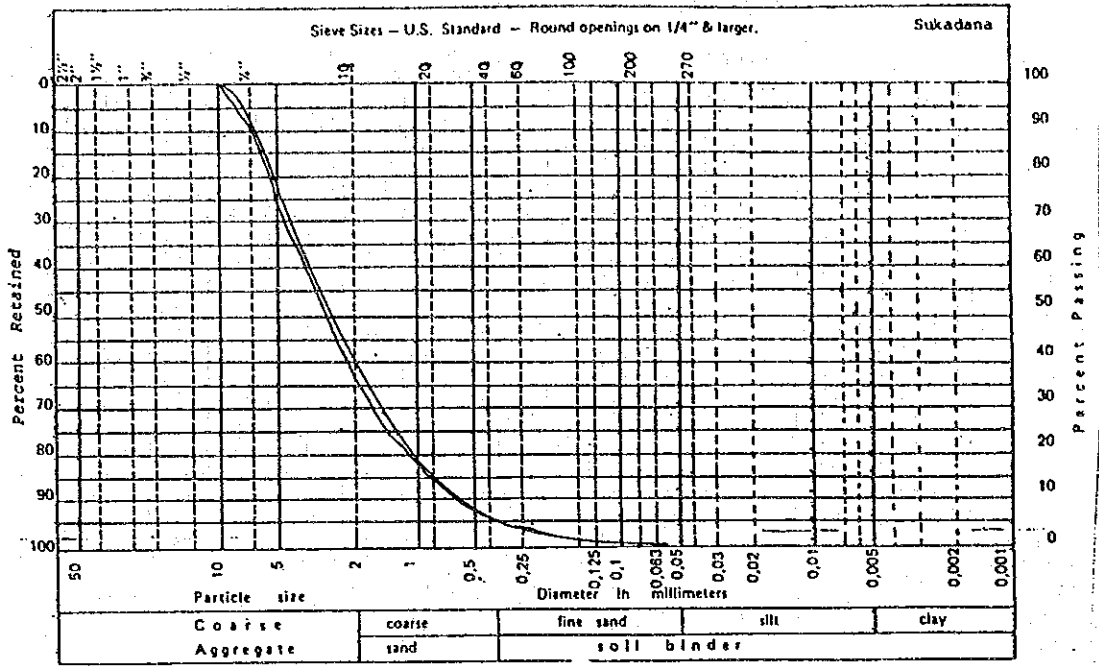
Daily Discharge at Serut

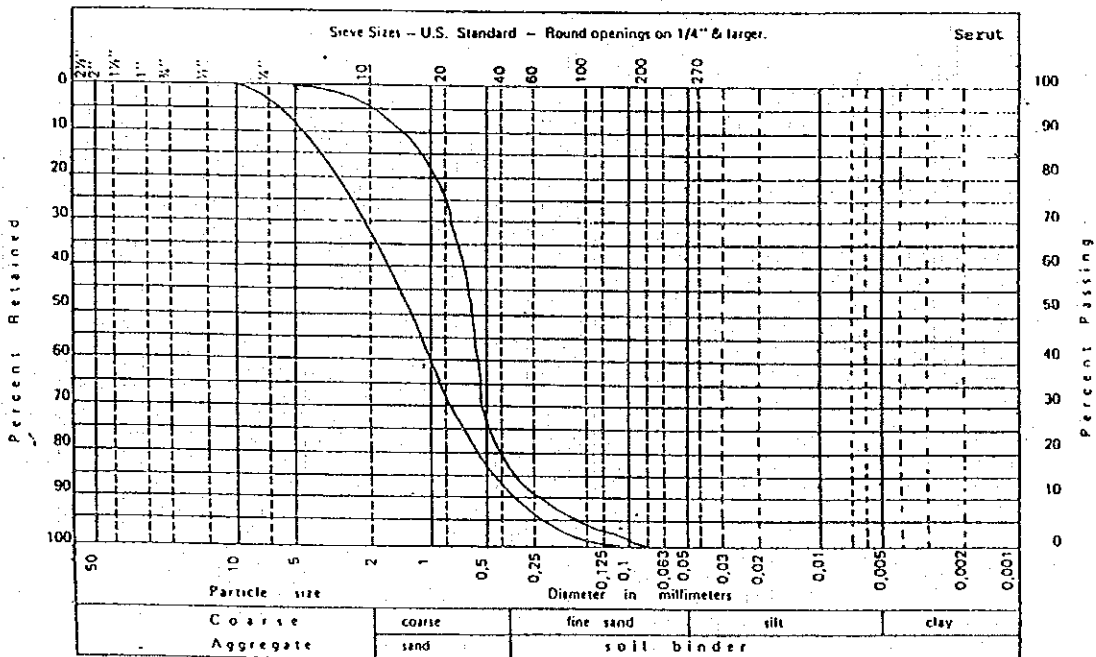
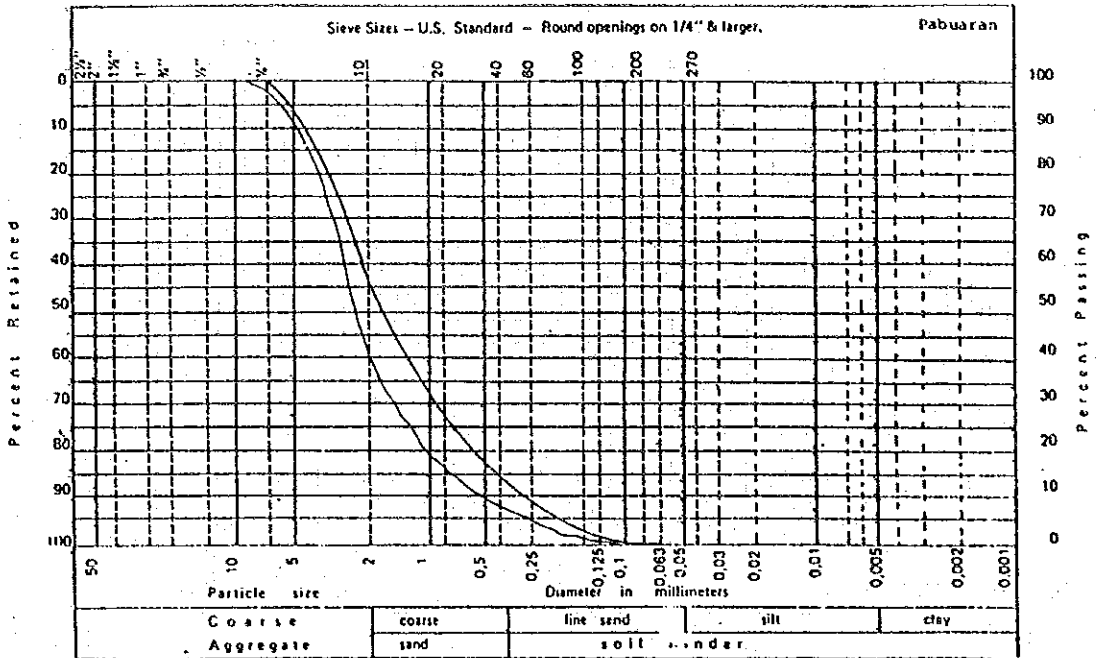
Month	1	2	3	4	5	6	7	8	9	10	11	12
day												
1	0.80	6.48	0.88	2.20	1.76	1.97	1.13	0.86	0.66	0.66	0.48	0.45
2	0.70	4.11	2.35	1.29	1.13	1.46	0.86	0.92	0.58	0.52	0.48	0.61
3	0.70	2.86	15.69	0.70	0.80	1.46	0.99	0.85	0.66	0.52	0.48	3.94
4	1.86	1.86	2.24	0.66	0.70	1.29	0.70	1.05	0.75	0.66	0.48	2.09
5	2.22	1.95	1.31	0.64	2.33	0.99	0.99	0.99	0.80	0.52	0.48	1.29
6	2.72	2.46	0.71	8.38	1.97	0.75	0.86	1.37	0.86	0.49	0.48	0.80
7	2.72	1.98	0.71	5.03	0.92	1.05	0.92	1.65	0.92	0.52	0.48	2.20
8	1.97	2.46	8.67	2.33	1.21	0.80	1.21	1.13	0.86	0.58	0.48	0.66
9	2.72	1.88	8.55	1.21	1.56	0.70	0.80	0.86	0.66	0.80	0.47	1.13
10	1.37	1.38	5.50	2.20	2.72	0.61	1.76	0.80	0.75	0.58	0.47	0.99
11	1.13	1.21	2.34	0.80	1.13	0.65	0.86	0.80	0.66	0.47	0.47	1.13
12	1.06	1.88	1.24	1.21	3.04	0.75	0.80	0.75	0.52	0.52	0.47	0.70
13	0.99	1.01	2.24	1.13	5.02	0.75	0.99	1.05	0.52	0.52	0.47	0.66
14	2.33	1.31	0.87	5.83	3.30	0.86	0.80	0.65	0.47	0.58	0.47	0.66
15	2.45	1.01	1.24	2.33	2.72	0.65	0.92	0.75	0.44	0.47	0.47	1.37
16	1.13	0.93	1.18	1.56	2.09	0.86	1.21	0.75	0.45	0.47	0.47	1.21
17	0.80	2.46	6.13	5.83	1.56	0.92	0.86	0.80	0.44	0.58	0.47	0.66
18	1.48	1.31	2.35	3.77	1.05	0.99	0.75	0.80	0.44	0.54	0.47	0.70
19	0.93	1.31	1.56	3.61	0.99	1.05	0.92	0.65	0.43	0.54	0.47	0.61
20	0.93	1.66	5.84	1.86	0.99	0.86	0.92	0.49	0.43	0.52	0.46	0.61
21	1.06	0.91	3.87	1.29	1.13	1.05	1.86	0.45	0.43	0.47	0.46	0.58
22	1.21	0.67	3.64	0.66	0.86	1.05	1.13	0.80	0.43	0.47	0.46	1.56
23	1.86	0.75	2.21	4.28	0.73	0.80	0.75	0.92	0.43	0.66	0.46	2.09
24	3.77	0.45	1.34	2.45	0.65	0.70	1.13	1.13	0.44	0.92	0.46	1.29
25	1.86	0.85	0.67	2.58	0.86	0.60	0.92	2.72	0.61	0.75	0.46	2.09
26	1.21	1.77	4.28	2.33	2.58	0.99	1.65	1.65	0.54	0.54	0.46	2.45
27	8.64	2.21	2.58	1.29	2.86	0.80	1.13	0.75	0.52	0.52	0.46	2.45
28	3.45	1.63	2.13	0.75	2.45	1.05	0.75	0.92	0.58	0.45	0.45	1.65
29	2.20		2.35	0.75	3.77	1.21	0.77	0.80	0.58	0.49	0.46	1.65
30	4.28		1.34	0.92	4.83	1.46	0.79	0.75	0.47	0.49	0.46	1.41
31	5.93		0.85		2.86		0.80	0.71	0.49			1.41
Total	66.58	50.76	96.86	69.87	60.59	29.13	30.93	29.58	17.32	17.31	14.07	41.10
Mean	2.15	1.61	3.12	2.33	1.95	0.97	1.00	0.95	0.58	0.56	0.47	1.33
Max	8.64	6.48	15.69	8.38	5.02	1.97	1.86	2.72	0.92	0.92	0.48	3.94
Min	0.70	0.45	0.67	0.64	0.65	0.60	0.70	0.45	0.43	0.45	0.46	0.45

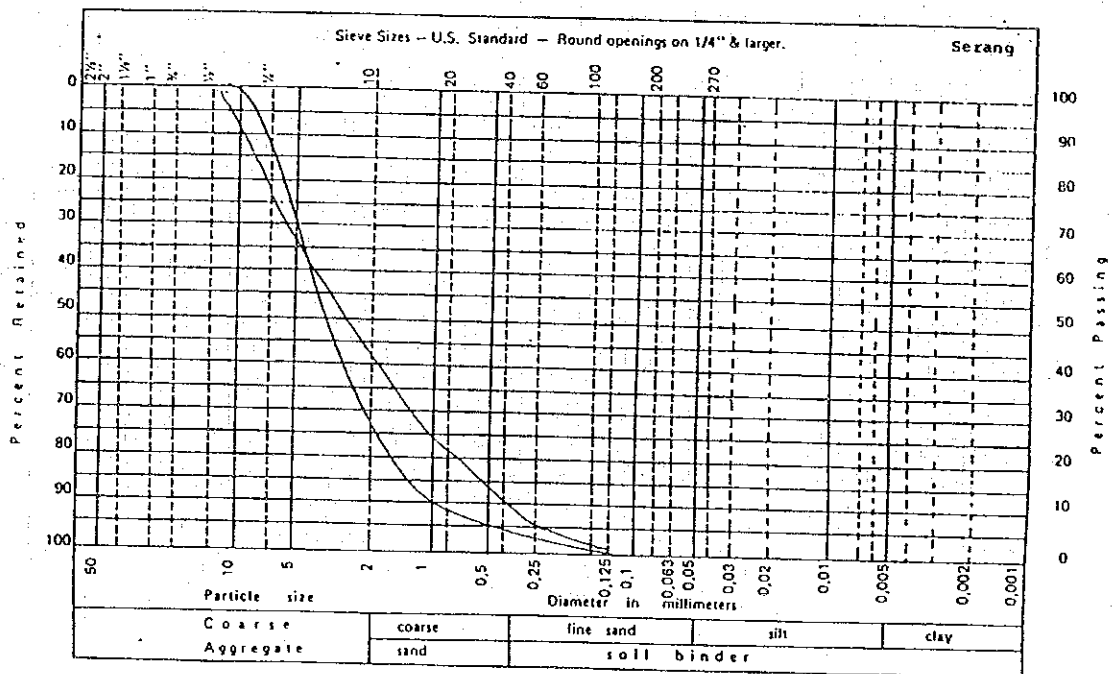
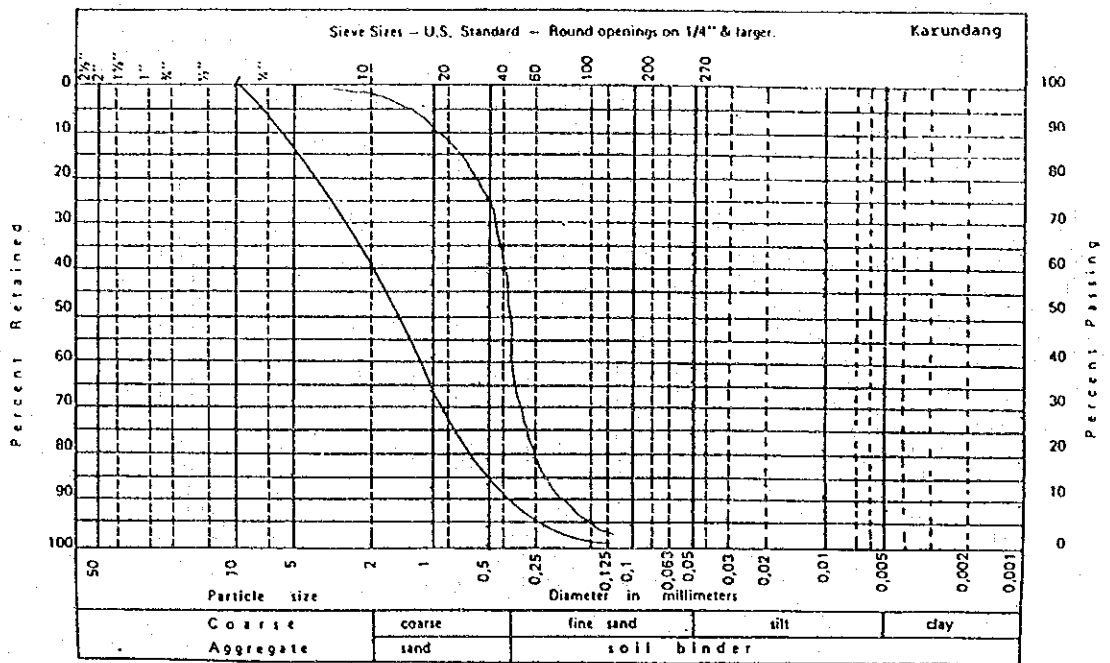
II.4 Grain Size of Sampling for Sediment

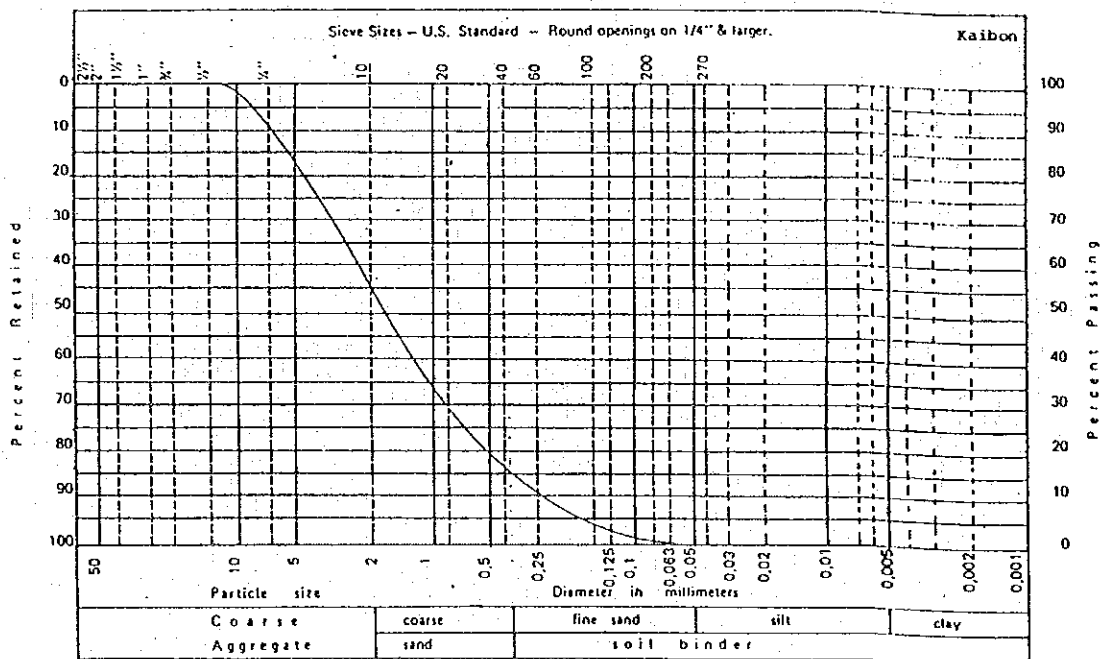
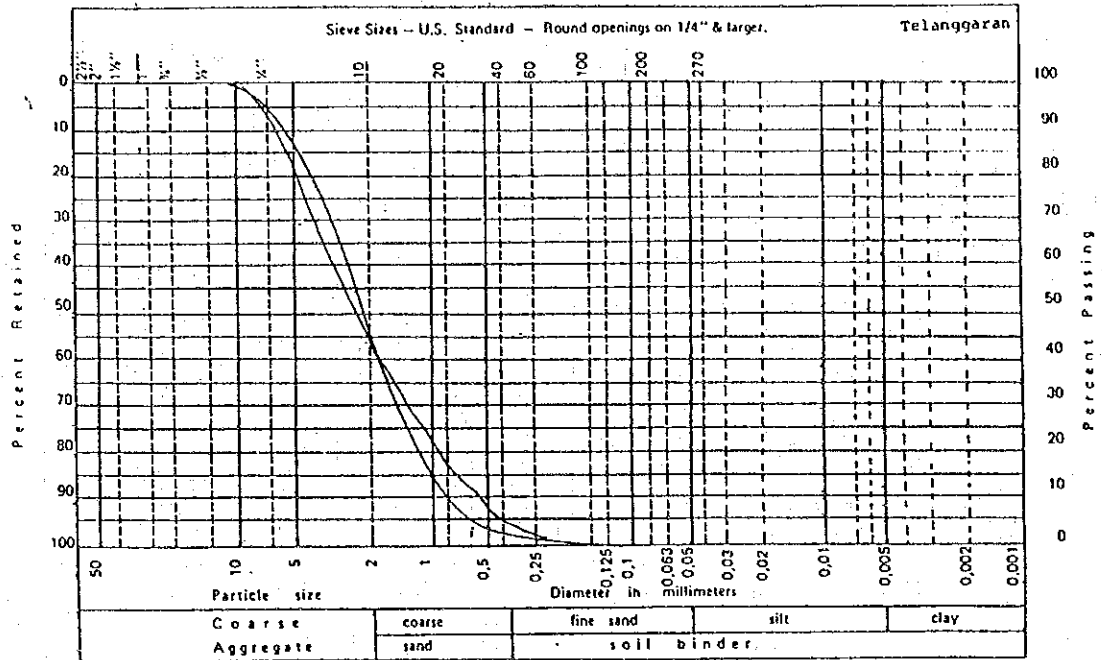


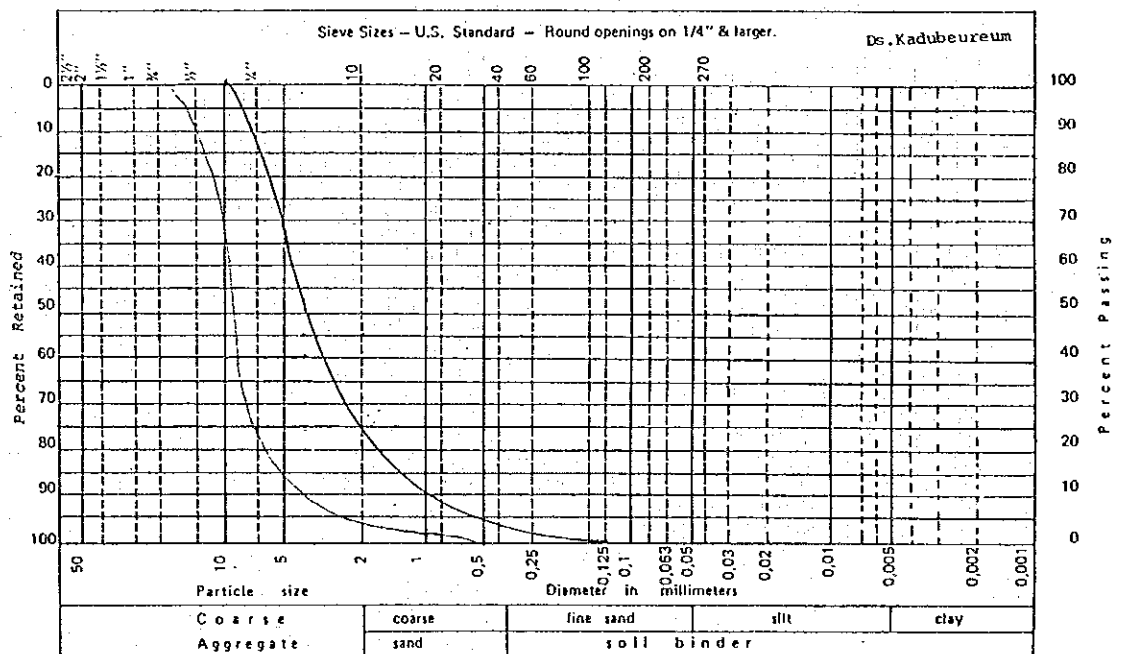
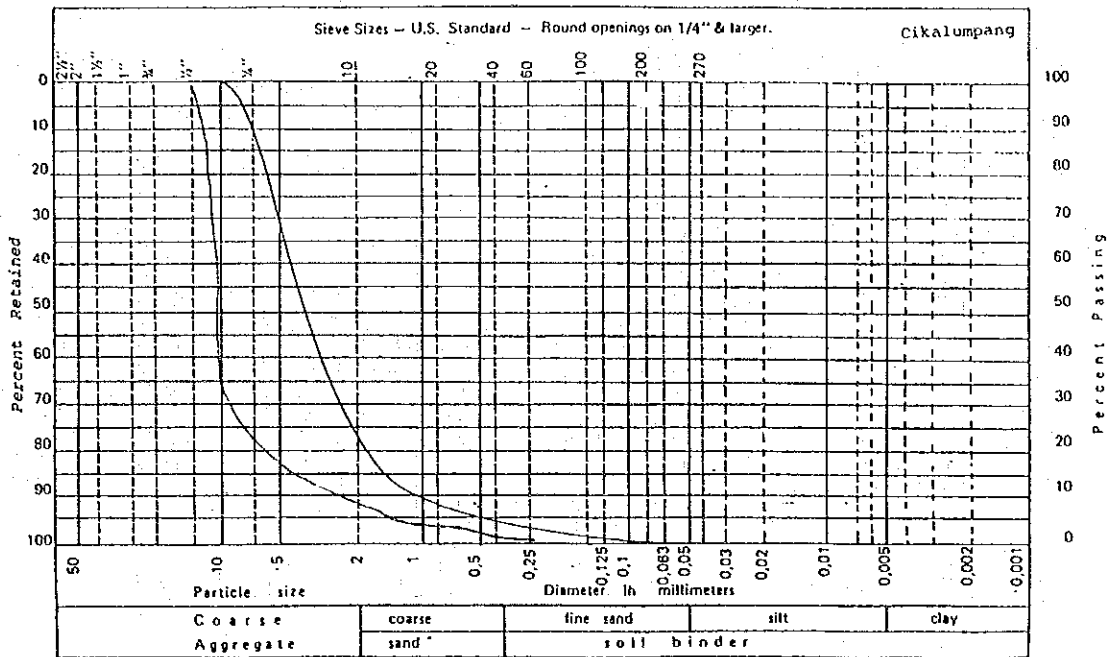


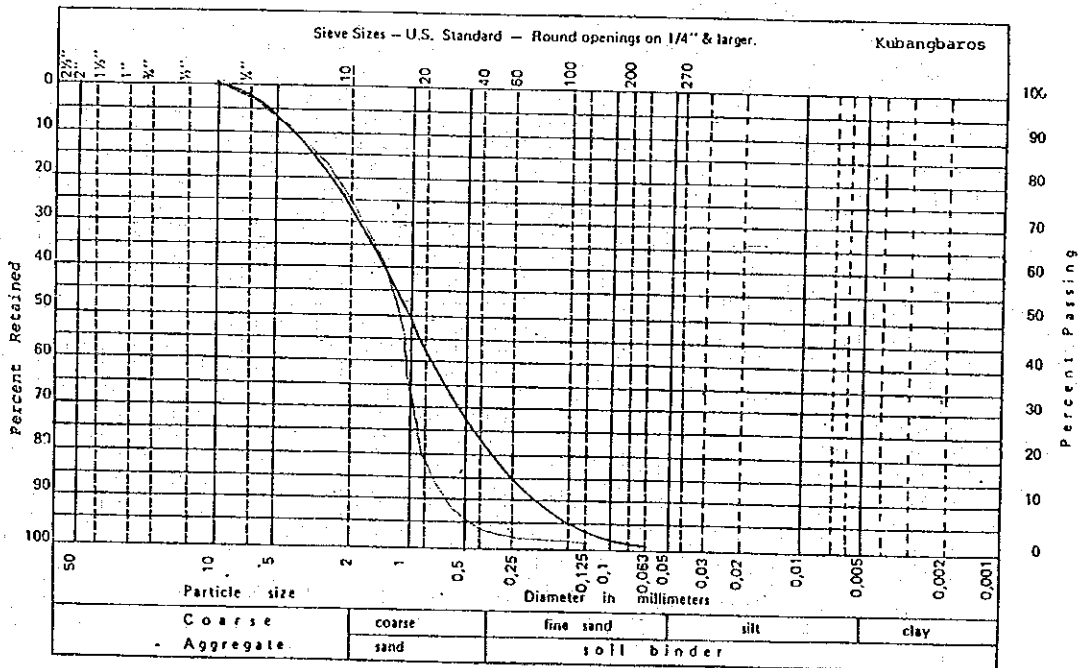
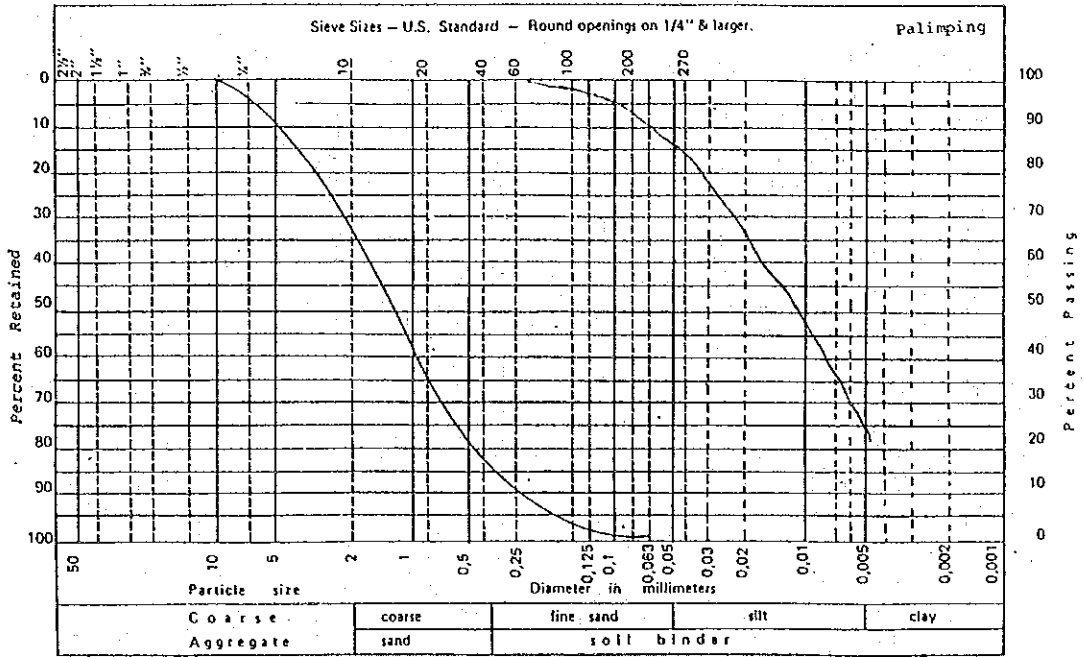


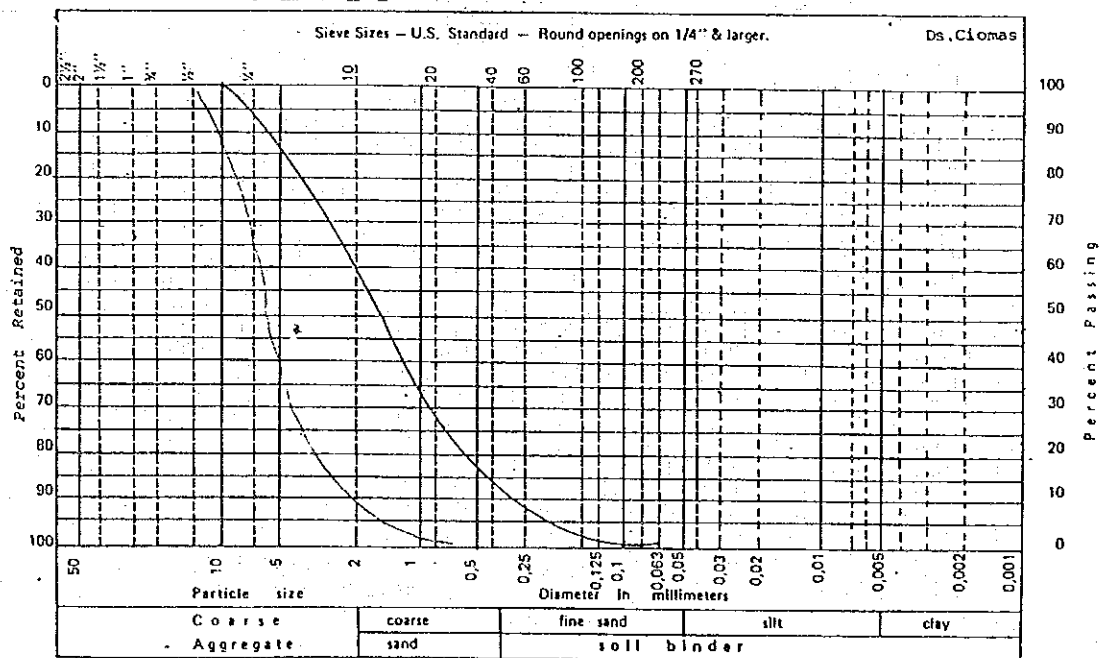
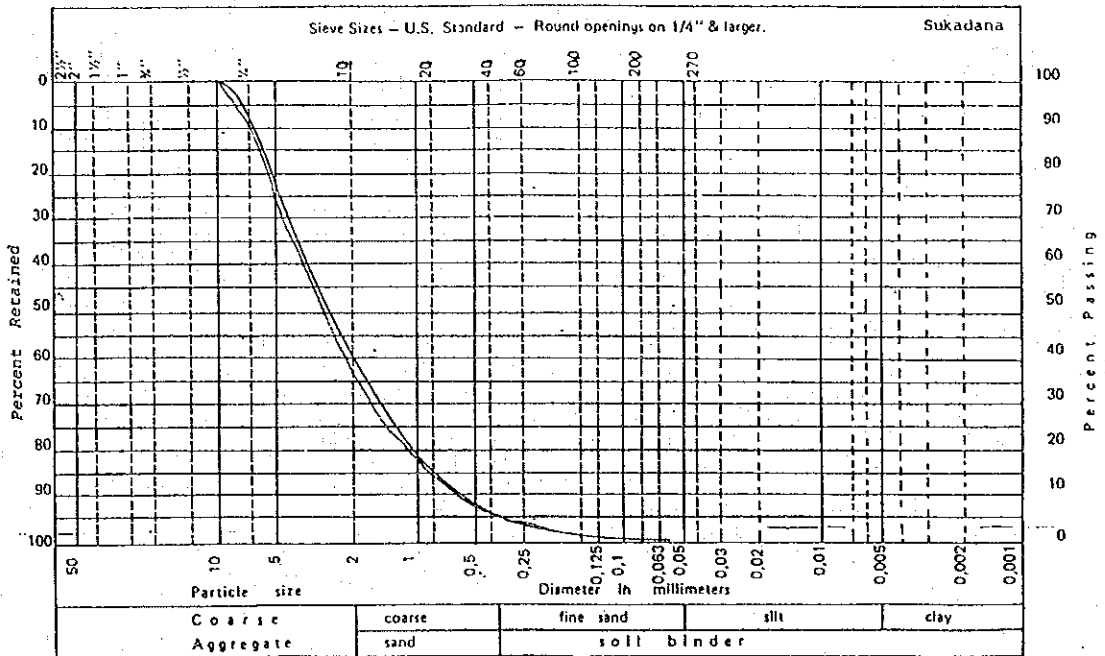


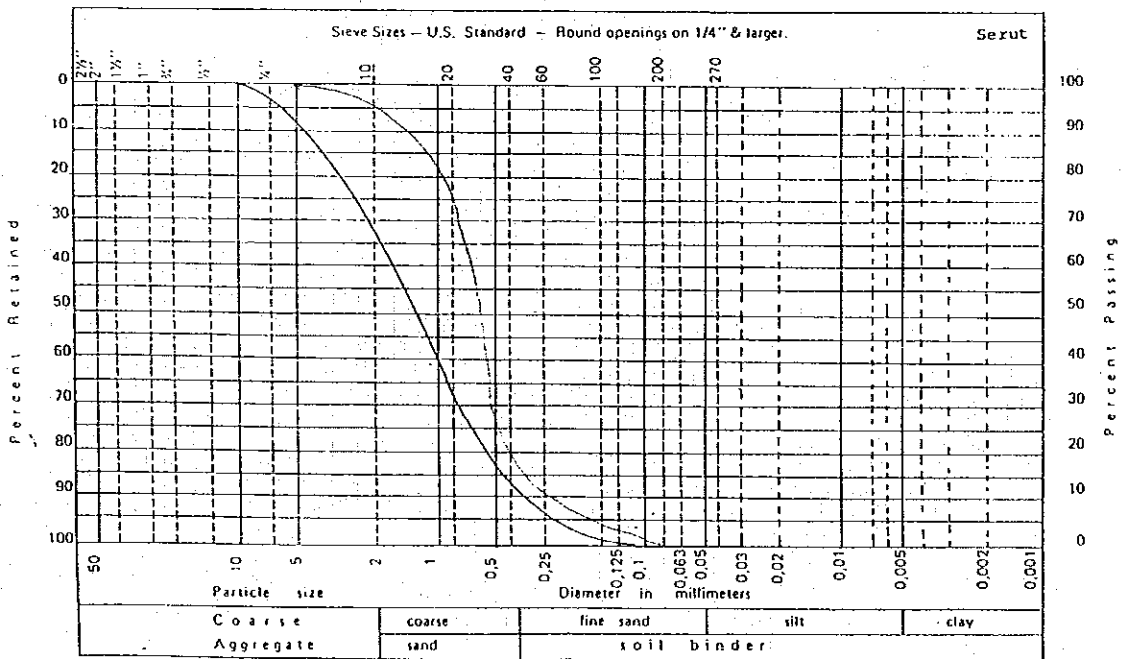
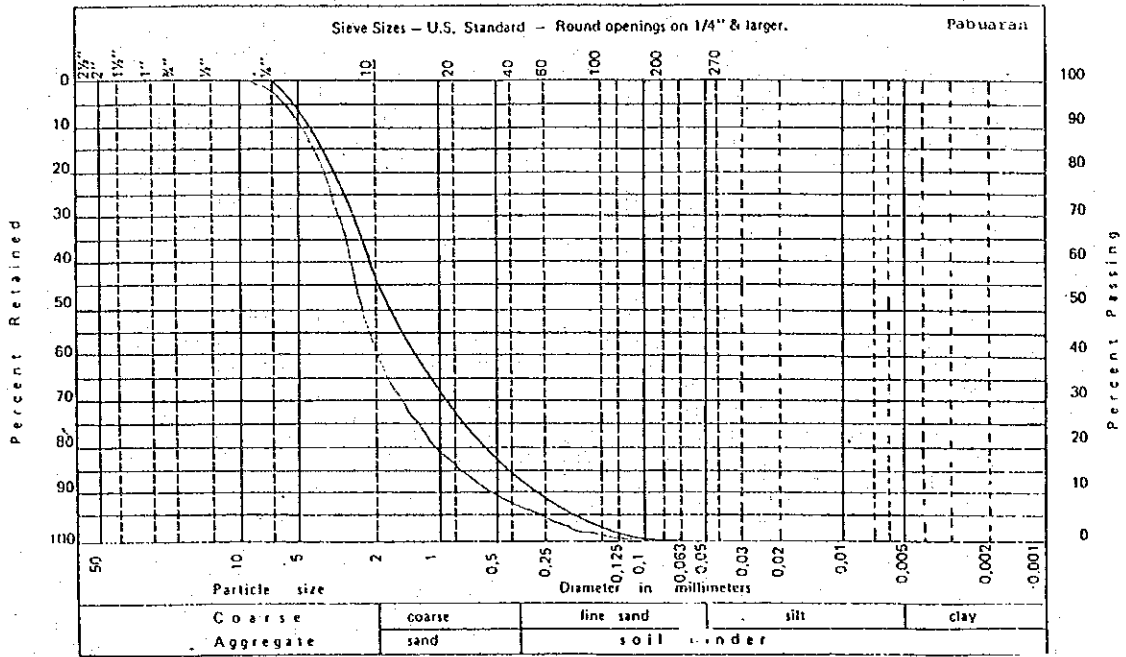


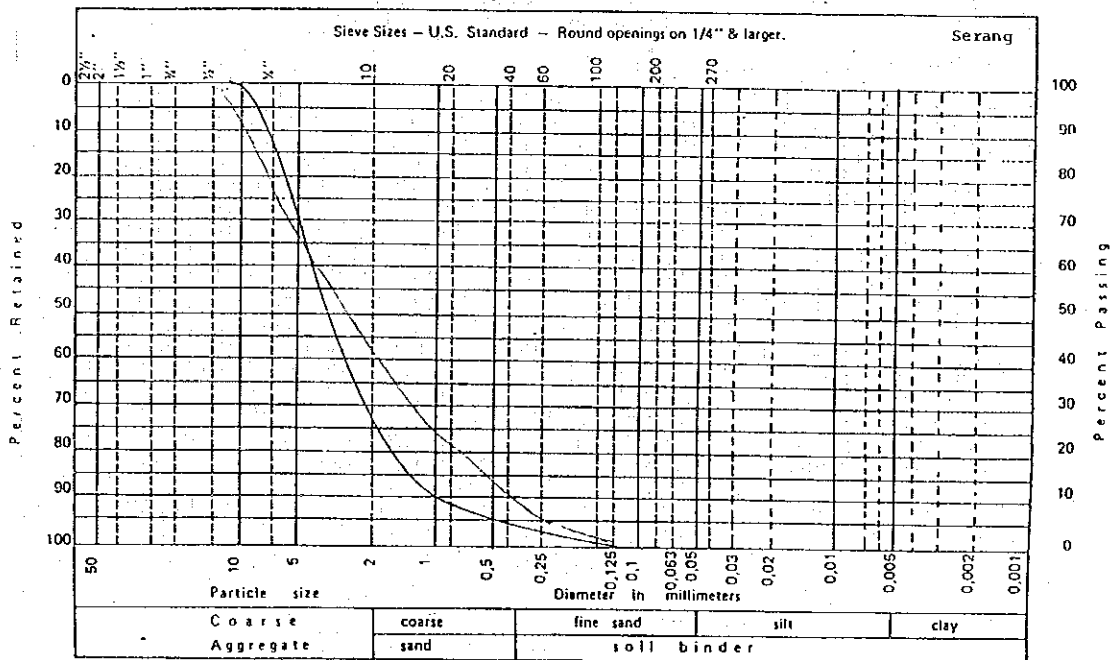
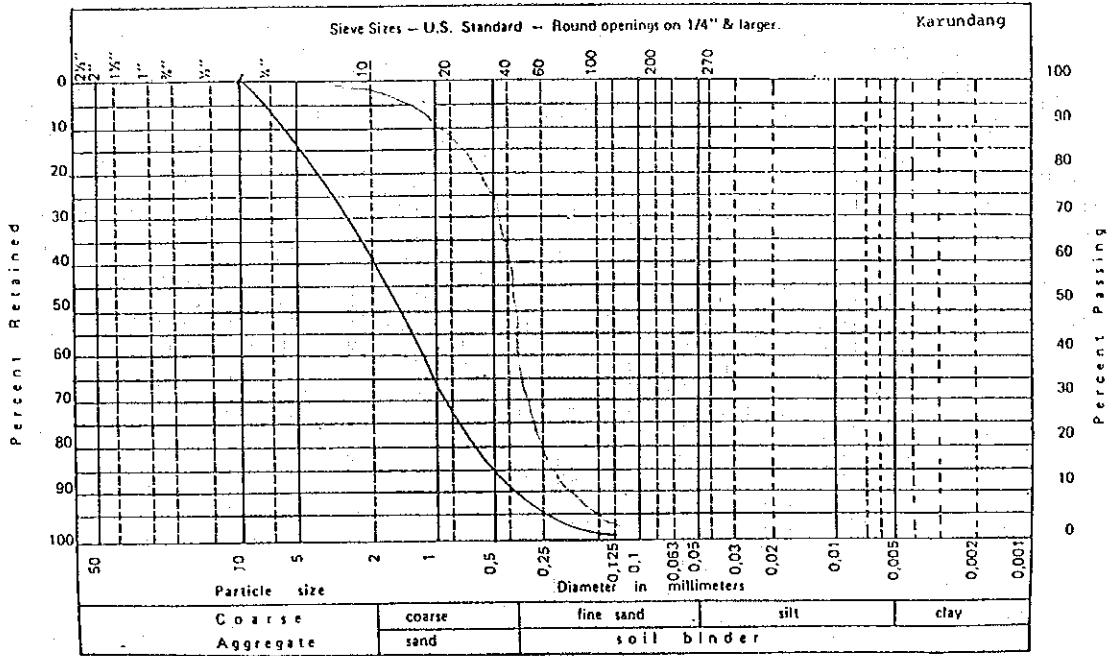


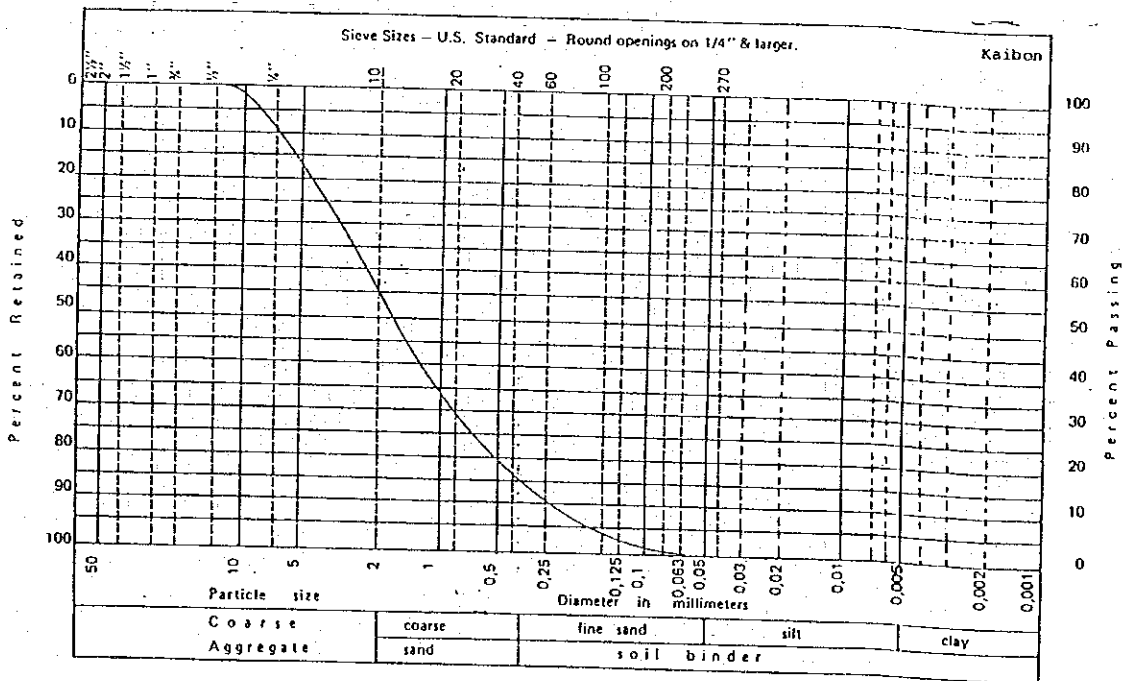
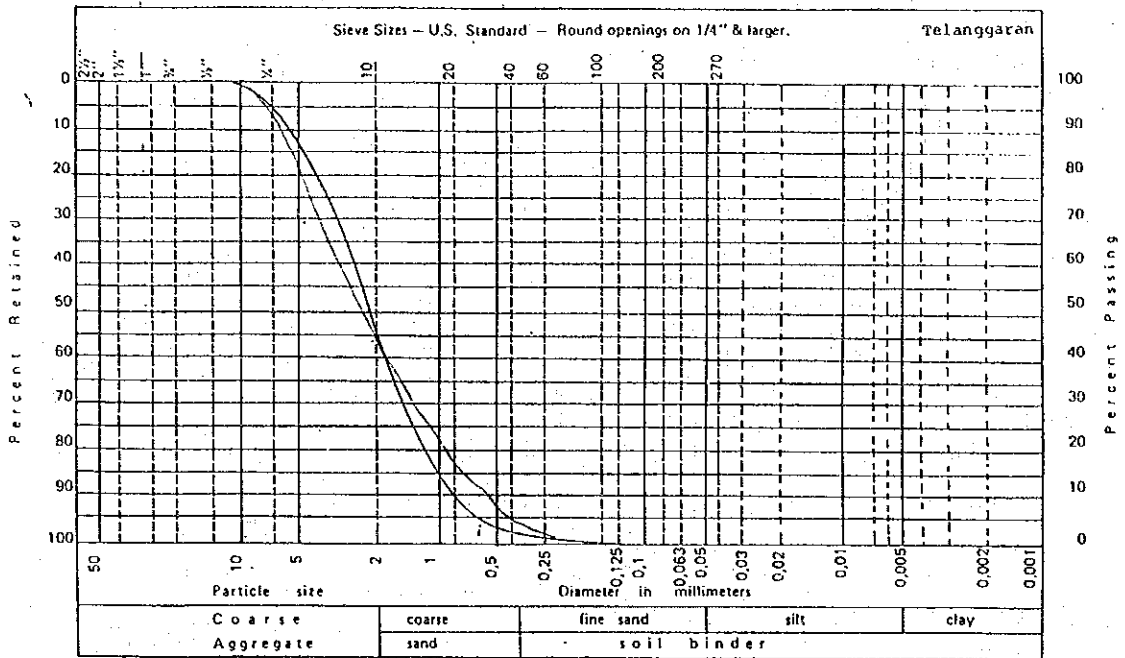












DATA BOOK III.

GEOLOGY

III.1 Lugeon Test

LUGEON TEST CB-1 No. 1
 DEPTH: FROM 2.50 m HOLE RAD. 3.80 cm
 TO 5.00 m
 G. HEIGHT 1.90 m Lu' = 4.24
 G.W. LEVEL 15.40 m Pc = 4.73 kgf/cm2

TEST LENGTH m	GAUGE PRESSURE kgf/cm2	INJECTION QUANTITY l/min	P kgf/cm2	Q l/min/m	Lu	K cm/sec
2.50	1.00	1.42	2.73	0.57	2.08	2.31E-05
2.50	2.00	3.42	3.73	1.37	3.67	4.07E-05
2.50	3.00	3.94	4.73	1.58	3.33	3.70E-05
2.50	4.00	6.40	5.73	2.56	4.47	4.96E-05
2.50	5.00	13.50	6.73	5.40	8.03	8.91E-05
2.50	4.00	9.12	5.73	3.65	6.37	7.07E-05
2.50	3.00	4.42	4.73	1.77	3.74	4.15E-05
2.50	3.00	3.07	4.73	1.23	2.60	2.88E-05
2.50	1.00	2.04	2.73	0.82	2.99	3.32E-05

CONSTANT HEAD TEST CB-1 No. 2
 DEPTH: FROM 0.80 m HOLE RAD. 3.80 cm
 TO 7.50 m
 C. HEIGHT 0.20 m
 G.W. LEVEL 15.40 m

TEST LENGTH m	GAUGE PRESSURE kgf/cm2	INJECTION QUANTITY l/min	P kgf/cm2	Q l/min/m	Lu	K cm/sec
6.70	0.00	1.40	1.56	0.21	1.34	1.84E-05
6.70	0.00	1.40	1.56	0.21	1.34	1.84E-05
6.70	0.00	1.40	1.56	0.21	1.34	1.84E-05
AVERAGE						1.84E-05

CONSTANT HEAD TEST CB-1 No. 3
 DEPTH: FROM 7.50 m HOLE RAD. 3.80 cm
 TO 10.00 m
 C. HEIGHT 0.20 m
 G.W. LEVEL 15.40 m

TEST LENGTH m	GAUGE PRESSURE kgf/cm ²	INJECTION QUANTITY l/min	P kgf/cm ²	Q l/min/m	Lu	K cm/sec
2.50	0.00	4.25	1.56	1.70	10.90	1.21E-04
2.50	0.00	4.25	1.56	1.70	10.90	1.21E-04
2.50	0.00	4.25	1.56	1.70	10.90	1.21E-04
AVERAGE						1.21E-04

LUGEON TEST CB-1 no. 4
 DEPTH: FROM 10.00 m HOLE RAD. 3.80 cm
 TO 15.00 m
 G. HEIGHT 1.90 m Lu' = 10.99
 G.W. LEVEL 15.40 m Pc = 9.55 kgf/cm²

TEST LENGTH m	GAUGE PRESSURE kgf/cm ²	INJECTION QUANTITY l/min	P kgf/cm ²	Q l/min/m	Lu	K cm/sec
5.00	2.00	4.42	3.73	0.88	2.37	3.07E-05
5.00	4.00	15.70	5.71	3.14	5.50	7.11E-05
5.00	6.00	30.70	7.66	6.14	8.01	1.04E-04
5.00	8.00	50.30	9.55	10.06	10.53	1.36E-04
5.00	10.00	87.50	11.19	17.50	15.63	2.02E-04
5.00	9.00	71.10	10.38	14.22	13.70	1.77E-04
5.00	7.00	46.40	8.58	9.28	10.82	1.40E-04
5.00	5.00	22.50	6.69	4.50	6.72	8.70E-05
5.00	3.00	11.40	4.72	2.28	4.83	6.25E-05
5.00	1.00	2.04	2.73	0.41	1.49	1.93E-05

LUGEON TEST CB-1 No. 5
 DEPTH: FROM 15.00 m HOLE RAD. 3.80 cm
 TO 20.00 m
 G. HEIGHT 1.90 m Lu' = 8.04
 G.W. LEVEL 15.40 m Pc = 7.65 kgf/cm²

TEST LENGTH m	GAUGE PRESSURE kgf/cm ²	INJECTION QUANTITY l/min	P kgf/cm ²	Q l/min/m	Lu	K cm/sec
5.00	2.00	3.77	3.73	0.75	2.02	2.62E-05
5.00	4.00	16.60	5.70	3.32	5.82	7.54E-05
5.00	6.00	27.30	7.65	5.46	7.14	9.24E-05
5.00	8.00	57.30	9.39	11.46	12.21	1.58E-04
5.00	10.00	85.00	10.97	17.00	15.49	2.01E-04
5.00	9.00	67.20	10.26	13.44	13.10	1.70E-04
5.00	7.00	36.50	8.59	7.30	8.50	1.10E-04
5.00	5.00	28.10	6.65	5.62	8.45	1.09E-04
5.00	3.00	7.30	4.72	1.46	3.09	4.00E-05
5.00	1.00	1.81	2.73	0.36	1.33	1.72E-05

LUGEON TEST CB-1 No. 6
 DEPTH: FROM 20.00 m HOLE RAD. 3.80 cm
 TO 25.00 m
 G. HEIGHT 1.90 m Lu' = 2.67
 G.W. LEVEL 15.40 m Pc = 5.72 kgf/cm²

TEST LENGTH m	GAUGE PRESSURE kgf/cm ²	INJECTION QUANTITY l/min	P kgf/cm ²	Q l/min/m	Lu	K cm/sec
5.00	2.00	3.59	3.73	0.72	1.93	2.49E-05
5.00	4.00	6.71	5.72	1.34	2.34	3.03E-05
5.00	6.00	14.30	7.70	2.86	3.71	4.81E-05
5.00	8.00	17.10	9.69	3.42	3.53	4.57E-05
5.00	10.00	31.80	11.59	6.36	5.49	7.10E-05
5.00	9.00	21.50	10.67	4.30	4.03	5.22E-05
5.00	7.00	10.80	8.71	2.16	2.48	3.21E-05
5.00	5.00	7.40	6.72	1.48	2.20	2.85E-05
5.00	3.00	3.96	4.73	0.79	1.68	2.17E-05
5.00	1.00	1.26	2.73	0.25	0.92	1.19E-05

LUGEON TEST CB-1 No.7
 DEPTH:FROM 25.00 m HOLE RAD. 3.80 cm
 TO 30.00 m
 G.HEIGHT 1.90 m Lu'= 3.71
 G.W.LEVEL 17.10 m Pc= 9.84 kgf/cm2

TEST LENGTH m	GAUGE PRESSURE kgf/cm2	INJECTION QUANTITY l/min	P kgf/cm2	Q l/min/m	Lu	K cm/sec
5.00	2.00	3.46	3.90	0.69	1.78	2.30E-05
5.00	4.00	7.38	5.89	1.48	2.51	3.24E-05
5.00	6.00	12.40	7.87	2.48	3.15	4.08E-05
5.00	8.00	18.10	9.84	3.62	3.68	4.76E-05
5.00	10.00	33.40	11.70	6.68	5.71	7.39E-05
5.00	9.00	22.60	10.81	4.52	4.18	5.41E-05
5.00	7.00	18.50	8.84	3.70	4.19	5.42E-05
5.00	5.00	13.00	6.87	2.60	3.78	4.90E-05
5.00	3.00	7.60	4.89	1.52	3.11	4.02E-05
5.00	1.00	2.62	2.90	0.52	1.81	2.34E-05

LUGEON TEST CB-1 No.8
 DEPTH:FROM 30.00 m HOLE RAD. 3.80 cm
 TO 35.00 m
 G.HEIGHT 1.90 m Lu'= 6.19
 G.W.LEVEL 17.10 m Pc= 5.86 kgf/cm2

TEST LENGTH m	GAUGE PRESSURE kgf/cm2	INJECTION QUANTITY l/min	P kgf/cm2	Q l/min/m	Lu	K cm/sec
5.00	2.00	5.65	3.89	1.13	2.90	3.76E-05
5.00	4.00	13.80	5.86	2.76	4.71	6.10E-05
5.00	6.00	30.90	7.70	6.18	8.03	1.04E-04
5.00	8.00	61.30	9.11	12.26	13.46	1.74E-04
5.00	10.00	86.80	10.32	17.36	16.83	2.18E-04
5.00	9.00	71.10	9.84	14.22	14.45	1.87E-04
5.00	7.00	57.50	8.21	11.50	14.01	1.81E-04
5.00	5.00	21.20	6.81	4.24	6.23	8.06E-05
5.00	3.00	14.10	4.86	2.82	5.80	7.51E-05
5.00	1.00	4.34	2.90	0.87	3.00	3.88E-05

LUGEON TEST CB-1 No. 9
 DEPTH: FROM 35.00 m HOLE RAD. 3.80 cm
 TO 40.00 m
 G. HEIGHT 1.90 m Lu' = 3.79
 G.W. LEVEL 17.10 m Pc = 5.89 kgf/cm²

TEST LENGTH m	GAUGE PRESSURE kgf/cm ²	INJECTION QUANTITY l/min	P kgf/cm ²	Q l/min/m	Lu	K cm/sec
5.00	2.00	2.39	3.90	0.48	1.23	1.59E-05
5.00	4.00	7.79	5.89	1.56	2.65	3.43E-05
5.00	6.00	25.80	7.74	5.16	6.67	8.63E-05
5.00	8.00	56.90	9.11	11.38	12.50	1.62E-04
5.00	10.00	86.40	10.07	17.28	17.16	2.22E-04
5.00	9.00	58.60	10.06	11.72	11.65	1.51E-04
5.00	7.00	31.00	8.66	6.20	7.16	9.26E-05
5.00	5.00	6.68	6.89	1.34	1.94	2.51E-05
5.00	3.00	3.15	4.90	0.63	1.29	1.66E-05
5.00	1.00	1.21	2.90	0.24	0.83	1.08E-05

LUGEON TEST CB-1 No. 10
 DEPTH: FROM 40.00 m HOLE RAD. 3.80 cm
 TO 43.00 m
 G. HEIGHT 1.90 m Lu = 5.72
 G.W. LEVEL 17.10 m

TEST LENGTH m	GAUGE PRESSURE kgf/cm ²	INJECTION QUANTITY l/min	P kgf/cm ²	Q l/min/m	Lu	K cm/sec
3.00	2.00	1.53	3.90	0.51	1.31	1.52E-05
3.00	4.00	3.48	5.90	1.16	1.97	2.28E-05
3.00	6.00	8.00	7.88	2.67	3.38	3.92E-05
3.00	8.00	16.30	9.83	5.43	5.53	6.41E-05
3.00	10.00	25.80	11.71	8.60	7.34	8.51E-05
3.00	9.00	18.20	10.81	6.07	5.61	6.51E-05
3.00	7.00	12.70	8.85	4.23	4.78	5.54E-05
3.00	5.00	4.59	6.89	1.53	2.22	2.57E-05
3.00	3.00	2.60	4.90	0.87	1.77	2.05E-05
3.00	1.00	1.10	2.90	0.37	1.26	1.47E-05

LUGEON TEST CB-2 No. 1
 DEPTH: FROM 4.00 m HOLE RAD. 3.80 cm
 TO 10.00 m
 G. HEIGHT 2.25 m Lu' = 5.07
 G.W. LEVEL -1.50 m Pc = 4.07 kgf/cm²

TEST LENGTH m	GAUGE PRESSURE kgf/cm ²	INJECTION QUANTITY l/min	P kgf/cm ²	Q l/min/m	Lu	K cm/sec
6.00	0.00	-2.50	0.07	-0.42	-55.69	-7.48E-04
6.00	2.00	3.78	2.07	0.63	3.04	4.08E-05
6.00	4.00	10.50	4.07	1.75	4.30	5.77E-05
6.00	6.00	50.30	6.00	8.38	13.96	1.87E-04
6.00	7.00	100.00	6.80	16.67	24.53	3.29E-04

LUGEON TEST CB-2 No. 2
 DEPTH: FROM 10.00 m HOLE RAD. 3.80 cm
 TO 15.00 m
 G. HEIGHT 2.25 m Lu = 25.92
 G.W. LEVEL -1.50 m

TEST LENGTH m	GAUGE PRESSURE kgf/cm ²	INJECTION QUANTITY l/min	P kgf/cm ²	Q l/min/m	Lu	K cm/sec
5.00	0.00	-2.50	0.07	-0.50	-67.06	-8.68E-04
5.00	2.00	9.20	2.07	1.84	8.89	1.15E-04
5.00	4.00	36.60	3.98	7.32	18.39	2.38E-04
5.00	6.00	55.90	5.86	11.18	19.09	2.47E-04
5.00	8.00	84.90	7.57	16.98	22.43	2.90E-04
5.00	9.00	99.80	8.38	19.96	23.82	3.08E-04
5.00	7.00	72.30	6.71	14.46	21.55	2.79E-04
5.00	5.00	44.10	4.94	8.82	17.86	2.31E-04
5.00	3.00	34.90	2.99	6.98	23.35	3.02E-04

LUGEON TEST CB-2 No. 3
 DEPTH: FROM 15.00 m HOLE RAD. 3.80 cm
 TO 20.00 m
 G. HEIGHT 2.25 m Lu' = 17.87
 G.W. LEVEL -1.50 m Pc = 5.72 kgf/cm²

TEST LENGTH m	GAUGE PRESSURE kgf/cm ²	INJECTION QUANTITY l/min	P kgf/cm ²	Q l/min/m	Lu	K cm/sec
5.00	0.00	-2.50	0.07	-0.50	-67.26	-8.71E-04
5.00	2.00	27.20	2.00	5.44	27.24	3.53E-04
5.00	4.00	44.30	3.87	8.86	22.90	2.96E-04
5.00	6.00	57.90	5.72	11.58	20.23	2.62E-04
5.00	8.00	86.60	7.29	17.32	23.77	3.08E-04
5.00	9.00	100.00	8.03	20.00	24.92	3.23E-04
5.00	7.00	89.10	6.24	17.82	28.55	3.70E-04
5.00	5.00	66.60	4.61	13.32	28.90	3.74E-04
5.00	3.00	45.20	2.86	9.04	31.60	4.09E-04

LUGEON TEST CB-2 No. 4
 DEPTH: FROM 20.00 m HOLE RAD. 3.80 cm
 TO 25.00 m
 G. HEIGHT 2.25 m Lu = 40.38
 G.W. LEVEL -4.50 m

TEST LENGTH m	GAUGE PRESSURE kgf/cm ²	INJECTION QUANTITY l/min	P kgf/cm ²	Q l/min/m	Lu	K cm/sec
5.00	0.00	-120.00	-2.24	-24.00	107.10	1.39E-03
5.00	2.00	46.90	1.47	9.38	63.94	8.28E-04
5.00	4.00	74.80	2.99	14.96	50.01	6.47E-04
5.00	6.00	100.00	4.38	20.00	45.71	5.92E-04
5.00	5.00	84.70	3.77	16.94	44.93	5.82E-04
5.00	3.00	66.70	2.15	13.34	61.98	8.02E-04

LUGEON TEST CB-2 No. 5
 DEPTH:FROM 25.00 m HOLE RAD. 3.80 cm
 TO 30.00 m
 G.HEIGHT 2.25 m Lu'= 19.02
 G.W.LEVEL -4.50 m Pc= 3.51 kgf/cm2

TEST LENGTH m	GAUGE PRESSURE kgf/cm2	INJECTION QUANTITY l/min	P kgf/cm2	Q l/min/m	Lu	K cm/sec
5.00	0.00	-120.00	-2.75	-24.00	87.43	1.13E-03
5.00	2.00	22.80	1.68	4.56	27.08	3.50E-04
5.00	4.00	38.70	3.51	7.74	22.03	2.85E-04
5.00	6.00	70.30	4.91	14.06	28.63	3.71E-04
5.00	8.00	97.50	6.11	19.50	31.91	4.13E-04
5.00	7.00	93.90	5.23	18.78	35.89	4.65E-04
5.00	5.00	74.00	3.82	14.80	38.78	5.02E-04
5.00	3.00	45.20	2.42	9.04	37.39	4.84E-04

LUGEON TEST CB-2 No. 6
 DEPTH:FROM 30.00 m HOLE RAD. 3.80 cm
 TO 35.00 m
 G.HEIGHT 2.25 m Lu= 17.45
 G.W.LEVEL -4.50 m Pc= 3.49 kgf/cm2

TEST LENGTH m	GAUGE PRESSURE kgf/cm2	INJECTION QUANTITY l/min	P kgf/cm2	Q l/min/m	Lu	K cm/sec
5.00	0.00	-120.00	-3.25	-24.00	73.87	9.56E-04
5.00	2.00	22.70	1.67	4.54	27.24	3.53E-04
5.00	4.00	36.80	3.49	7.36	21.09	2.73E-04
5.00	6.00	71.20	4.71	14.24	30.23	3.91E-04
5.00	8.00	86.60	6.20	17.32	27.94	3.62E-04
5.00	10.00	99.30	7.70	19.86	25.78	3.34E-04
5.00	9.00	90.20	7.07	18.04	25.53	3.30E-04
5.00	7.00	78.90	5.47	15.78	28.86	3.74E-04
5.00	5.00	67.40	3.82	13.48	35.28	4.57E-04
5.00	3.00	47.00	2.31	9.40	40.67	5.26E-04

LUGEON TEST CB-2 No. 7
 DEPTH: FROM 35.00 m HOLE RAD. 3.80 cm
 TO 40.00 m
 G. HEIGHT 2.25 m Lu' = 14.43
 G.W. LEVEL -4.50 m Pc = 8.86 kgf/cm²

TEST LENGTH m	GAUGE PRESSURE kgf/cm ²	INJECTION QUANTITY l/min	P kgf/cm ²	Q l/min/m	Lu	K cm/sec
5.00	0.00	-120.00	-3.75	-24.00	63.95	8.28E-04
5.00	2.00	1.62	1.77	0.32	1.83	2.36E-05
5.00	4.00	17.50	3.70	3.50	9.46	1.22E-04
5.00	6.00	23.80	5.64	4.76	8.45	1.09E-04
5.00	8.00	45.80	7.26	9.16	12.62	1.63E-04
5.00	10.00	61.20	8.86	12.24	13.82	1.79E-04
5.00	9.00	53.50	8.07	10.70	13.25	1.72E-04
5.00	7.00	37.90	6.42	7.58	11.80	1.53E-04
5.00	5.00	21.70	4.66	4.34	9.31	1.21E-04
5.00	3.00	2.51	2.77	0.50	1.81	2.34E-05

LUGEON TEST CB-2 No. 8
 DEPTH: FROM 40.00 m HOLE RAD. 3.80 cm
 TO 45.00 m
 G. HEIGHT 2.25 m Lu = 13.52
 G.W. LEVEL -4.50 m

TEST LENGTH m	GAUGE PRESSURE kgf/cm ²	INJECTION QUANTITY l/min	P kgf/cm ²	Q l/min/m	Lu	K cm/sec
5.00	0.00	-120.00	-4.26	-24.00	56.38	7.30E-04
5.00	2.00	2.48	1.77	0.50	2.80	3.62E-05
5.00	4.00	18.70	3.68	3.74	10.17	1.32E-04
5.00	6.00	28.50	5.55	5.70	10.27	1.33E-04
5.00	8.00	40.30	7.32	8.06	11.01	1.43E-04
5.00	10.00	56.30	8.89	11.26	12.67	1.64E-04
5.00	9.00	37.90	8.37	7.58	9.05	1.17E-04
5.00	7.00	28.80	6.54	5.76	8.80	1.14E-04
5.00	5.00	25.30	4.60	5.06	11.01	1.43E-04
5.00	3.00	8.72	2.75	1.74	6.33	8.20E-05

LUGEON TEST CB-2 No. 9
 DEPTH:FROM 45.00 m HOLE RAD. 3.80 cm
 TO 50.00 m
 G.HEIGHT 2.25 m Lu'= 58.15
 G.W.LEVEL -4.50 m Pc= 1.37 kgf/cm2

TEST LENGTH m	GAUGE PRESSURE kgf/cm2	INJECTION QUANTITY l/min	P kgf/cm2	Q l/min/m	Lu	K cm/sec
5.00	0.00	-120.00	-4.76	-24.00	50.41	6.52E-04
5.00	1.00	15.90	0.70	3.18	45.73	5.92E-04
5.00	2.00	35.70	1.37	7.14	51.98	6.73E-04
5.00	3.00	57.10	1.75	11.42	65.33	8.46E-04
5.00	4.00	97.60	0.77	19.52	252.07	3.26E-03
5.00	3.50	71.00	1.69	14.20	84.17	1.09E-03
5.00	2.50	52.10	1.42	10.42	73.38	9.50E-04
5.00	1.50	23.80	1.10	4.76	43.41	5.62E-04

LUGEON TEST CB-3 No.1
 DEPTH:FROM 3.00 m HOLE RAD. 3.80 cm
 TO 10.00 m
 G.HEIGHT 2.50 m Lu'= 1.35
 G.W.LEVEL 6.55 m Pc= 6.90 kgf/cm2

TEST LENGTH m	GAUGE PRESSURE kgf/cm2	INJECTION QUANTITY l/min	P kgf/cm2	Q l/min/m	Lu	K cm/sec
7.00	2.00	2.72	2.90	0.39	1.34	1.85E-05
7.00	4.00	4.82	4.90	0.69	1.40	1.94E-05
7.00	6.00	6.63	6.90	0.95	1.37	1.90E-05
7.00	8.00	16.77	8.90	2.40	2.69	3.72E-05
7.00	10.00	40.20	10.87	5.74	5.28	7.31E-05
7.00	9.00	27.20	9.89	3.89	3.93	5.44E-05
7.00	7.00	18.67	7.90	2.67	3.38	4.67E-05
7.00	5.00	7.76	5.90	1.11	1.88	2.60E-05
7.00	3.00	3.63	3.90	0.52	1.33	1.84E-05
7.00	1.00	0.72	1.90	0.10	0.54	7.47E-06

LUGEON TEST CB-3 No.2
 DEPTH:FROM 5.00 m HOLE RAD. 3.80 cm
 TO 10.00 m
 G.HEIGHT 2.50 m Lu= 3.29
 G.W.LEVEL 6.55 m

TEST LENGTH m	GAUGE PRESSURE kgf/cm2	INJECTION QUANTITY l/min	P kgf/cm2	Q l/min/m	Lu	K cm/sec
5.00	2.00	0.56	2.90	0.11	0.39	4.99E-06
5.00	4.00	4.39	4.90	0.88	1.79	2.32E-05
5.00	6.00	6.31	6.90	1.26	1.83	2.37E-05
5.00	8.00	11.94	8.90	2.39	2.68	3.47E-05
5.00	10.00	20.08	10.89	4.02	3.69	4.77E-05
5.00	9.00	14.88	9.90	2.98	3.01	3.89E-05
5.00	7.00	8.96	7.90	1.79	2.27	2.94E-05
5.00	5.00	4.46	5.90	0.89	1.51	1.96E-05
5.00	3.00	1.65	3.90	0.33	0.85	1.09E-05
5.00	1.00	0.00	1.91	0.00	0.00	0.00E+00

LUGEON TEST CB-3 No. 3
 DEPTH:FROM 10.00 m HOLE RAD. 3.80 cm
 TO 15.00 m
 G.HEIGHT 2.50 m Lu= 22.00
 G.W.LEVEL 7.00 m

TEST LENGTH m	GAUGE PRESSURE kgf/cm2	INJECTION QUANTITY l/min	P kgf/cm2	Q l/min/m	Lu	K cm/sec
5.00	2.00	21.30	2.92	4.26	14.60	1.89E-04
5.00	4.00	45.40	4.81	9.08	18.89	2.45E-04
5.00	6.00	68.50	6.62	13.70	20.69	2.68E-04
5.00	8.00	90.10	8.38	18.02	21.50	2.78E-04
5.00	7.00	74.30	7.56	14.86	19.65	2.54E-04
5.00	5.00	55.30	5.74	11.06	19.28	2.50E-04
5.00	3.00	38.10	3.85	7.62	19.80	2.56E-04
5.00	1.00	15.10	1.93	3.02	15.61	2.02E-04

LUGEON TEST CB-3 No. 4
 DEPTH:FROM 15.00 m HOLE RAD. 3.80 cm
 TO 20.00 m
 G.HEIGHT 2.50 m Lu'= 37.31
 G.W.LEVEL 7.00 m Pc= 3.65 kgf/cm2

TEST LENGTH m	GAUGE PRESSURE kgf/cm2	INJECTION QUANTITY l/min	P kgf/cm2	Q l/min/m	Lu	K cm/sec
5.00	2.00	35.90	2.81	7.18	25.51	3.30E-04
5.00	3.00	53.50	3.65	10.70	29.32	3.79E-04
5.00	4.00	77.40	4.32	15.48	35.83	4.64E-04
5.00	4.50	90.70	4.59	18.14	39.55	5.12E-04
5.00	3.50	62.60	4.04	12.52	31.00	4.01E-04
5.00	1.00	26.40	1.88	5.28	28.13	3.64E-04

LUGEON TEST CB-3 No. 5
 DEPTH: FROM 20.00 m HOLE RAD. 3.80 cm
 TO 25.00 m
 G. HEIGHT 2.50 m Lu= 131.08
 G.W. LEVEL 7.20 m

TEST LENGTH m	GAUGE PRESSURE kgf/cm ²	INJECTION QUANTITY l/min	P kgf/cm ²	Q l/min/m	Lu	K cm/sec
5.00	2.00	40.80	2.74	8.16	29.81	3.86E-04
5.00	3.00	76.00	3.16	15.20	48.08	6.22E-04
5.00	3.50	90.40	3.33	18.08	54.36	7.04E-04
5.00	2.00	44.40	2.69	8.88	32.96	4.27E-04
5.00	1.00	31.10	1.83	6.22	33.90	4.39E-04

LUGEON TEST CB-3 No. 6
 DEPTH: FROM 25.00 m HOLE RAD. 3.80 cm
 TO 30.00 m
 G. HEIGHT 2.50 m Lu= 4.66
 G.W. LEVEL 7.20 m

TEST LENGTH m	GAUGE PRESSURE kgf/cm ²	INJECTION QUANTITY l/min	P kgf/cm ²	Q l/min/m	Lu	K cm/sec
5.00	2.00	2.68	2.97	0.54	1.81	2.34E-05
5.00	4.00	5.56	4.96	1.11	2.24	2.90E-05
5.00	6.00	10.11	6.95	2.02	2.91	3.76E-05
5.00	8.00	17.28	8.92	3.46	3.88	5.02E-05
5.00	10.00	27.90	10.83	5.58	5.15	6.67E-05
5.00	9.00	21.56	9.89	4.31	4.36	5.64E-05
5.00	7.00	14.30	7.93	2.86	3.60	4.67E-05
5.00	5.00	7.26	5.96	1.45	2.44	3.15E-05
5.00	3.00	3.17	3.97	0.63	1.60	2.07E-05
5.00	1.00	0.28	1.97	0.06	0.28	3.68E-06

LUGEON TEST CB-3 No. 7
 DEPTH:FROM 30.00 m HOLE RAD. 3.80 cm
 TO 35.00 m
 G.HEIGHT 2.50 m Lu= 8.07
 G.W.LEVEL 7.10 m

TEST LENGTH m	GAUGE PRESSURE kgf/cm2	INJECTION QUANTITY l/min	P kgf/cm2	Q l/min/m	Lu	K cm/sec
5.00	2.00	3.89	2.96	0.78	2.63	3.41E-05
5.00	4.00	9.92	4.94	1.98	4.02	5.20E-05
5.00	6.00	18.02	6.89	3.60	5.23	6.77E-05
5.00	8.00	29.23	8.78	5.85	6.66	8.62E-05
5.00	10.00	45.20	10.53	9.04	8.58	1.11E-04
5.00	9.00	34.62	9.71	6.92	7.13	9.23E-05
5.00	7.00	22.88	7.85	4.58	5.83	7.55E-05
5.00	5.00	13.37	5.92	2.67	4.52	5.84E-05
5.00	3.00	6.09	3.95	1.22	3.08	3.99E-05
5.00	1.00	1.88	1.96	0.38	1.92	2.48E-05

LUGEON TEST CB-3 No. 8
 DEPTH:FROM 35.00 m HOLE RAD. 3.80 cm
 TO 40.00 m
 G.HEIGHT 2.50 m Lu= 3.07
 G.W.LEVEL 7.15 m

TEST LENGTH m	GAUGE PRESSURE kgf/cm2	INJECTION QUANTITY l/min	P kgf/cm2	Q l/min/m	Lu	K cm/sec
5.00	2.00	0.64	2.96	0.13	0.43	5.59E-06
5.00	4.00	4.12	4.96	0.82	1.66	2.15E-05
5.00	6.00	7.08	6.95	1.42	2.04	2.64E-05
5.00	8.00	11.67	8.93	2.33	2.61	3.38E-05
5.00	10.00	18.37	10.88	3.67	3.38	4.37E-05
5.00	9.00	15.04	9.91	3.01	3.04	3.93E-05
5.00	7.00	8.82	7.95	1.76	2.22	2.87E-05
5.00	5.00	5.17	5.96	1.03	1.74	2.25E-05
5.00	3.00	1.91	3.96	0.38	0.96	1.25E-05

LUGEON TEST CB-3 No. 9
 DEPTH: FROM 40.00 m HOLE RAD. 3.80 cm
 TO 43.00 m
 G. HEIGHT 2.50 m Lu= 4.56
 G.W. LEVEL 7.10 m

TEST LENGTH m	GAUGE PRESSURE kgf/cm ²	INJECTION QUANTITY l/min	P kgf/cm ²	Q l/min/m	Lu	K cm/sec
3.00	2.00	0.26	2.96	0.09	0.29	3.39E-06
3.00	4.00	2.65	4.96	0.88	1.78	2.06E-05
3.00	6.00	6.07	6.95	2.02	2.91	3.37E-05
3.00	8.00	10.25	8.93	3.42	3.83	4.43E-05
3.00	10.00	16.49	10.88	5.50	5.05	5.85E-05
3.00	9.00	13.00	9.91	4.33	4.37	5.07E-05
3.00	7.00	7.98	7.94	2.66	3.35	3.88E-05
3.00	5.00	4.06	5.96	1.35	2.27	2.63E-05
3.00	3.00	0.55	3.96	0.18	0.46	5.37E-06

CONSTANT HEAD TEST CD-1 No. 1
 DEPTH: FROM 4.00 m HOLE RAD. 5.70 cm
 TO 5.00 m
 C. HEIGHT 0.50 m
 G.W. LEVEL 4.85 m

TEST LENGTH m	GAUGE PRESSURE kgf/cm ²	INJECTION QUANTITY l/min	P kgf/cm ²	Q l/min/m	Lu	K cm/sec
1.00	0.00	3.54	0.53	3.54	66.21	5.03E-04

LUGEON TEST CD-1 No. 2
 DEPTH: FROM 5.00 m HOLE RAD. 3.80 cm
 TO 10.00 m
 G. HEIGHT 2.10 m Lu= 22.31
 G.W. LEVEL 4.85 m

TEST LENGTH m	GAUGE PRESSURE kgf/cm ²	INJECTION QUANTITY l/min	P kgf/cm ²	Q l/min/m	Lu	K cm/sec
5.00	2.00	21.40	2.68	4.28	15.98	2.07E-04
5.00	4.00	35.50	4.65	7.10	15.27	1.98E-04
5.00	6.00	65.40	6.55	13.08	19.98	2.59E-04
5.00	8.00	90.20	8.41	18.04	21.45	2.78E-04
5.00	7.00	70.90	7.52	14.18	18.86	2.44E-04
5.00	5.00	53.70	5.59	10.74	19.20	2.49E-04
5.00	3.00	31.40	3.66	6.28	17.16	2.22E-04
5.00	1.00	15.40	1.69	3.08	18.26	2.36E-04

LUGEON TEST CD-1 No.3
 DEPTH: FROM 10.00 m HOLE RAD. 3.80 cm
 TO 14.00 m
 G. HEIGHT 2.10 m Lu= 14.25
 G.W. LEVEL 4.85 m

TEST LENGTH m	GAUGE PRESSURE kgf/cm2	INJECTION QUANTITY l/min	P kgf/cm2	Q l/min/m	Lu	K cm/sec
4.00	2.00	5.60	2.69	1.40	5.20	6.42E-05
4.00	4.00	10.61	4.69	2.65	5.66	6.99E-05
4.00	6.00	25.20	6.65	6.30	9.47	1.17E-04
4.00	8.00	45.30	8.55	11.33	13.24	1.64E-04
4.00	10.00	60.50	10.44	15.13	14.49	1.79E-04
4.00	9.00	53.60	9.49	13.40	14.11	1.74E-04
4.00	7.00	30.40	7.63	7.60	9.96	1.23E-04
4.00	5.00	20.30	5.67	5.08	8.96	1.11E-04
4.00	3.00	8.52	3.69	2.13	5.77	7.13E-05
4.00	1.00	3.46	1.69	0.87	5.11	6.31E-05

CONSTANT HEAD TEST CD-2 No. 1
 DEPTH: FROM 1.00 m HOLE RAD. 3.80 cm
 TO 5.00 m
 C. HEIGHT 0.50 m
 G.W. LEVEL 9.80 m

TEST LENGTH m	GAUGE PRESSURE kgf/cm ²	INJECTION QUANTITY l/min	P kgf/cm ²	Q l/min/m	Lu	K cm/sec
4.00	0.00	3.34	1.03	0.84	8.11	1.00E-04
4.00	0.00	3.46	1.03	0.87	8.40	1.04E-04
4.00	0.00	3.30	1.03	0.83	8.01	9.89E-05
4.00	0.00	3.39	1.03	0.85	8.23	1.02E-04
4.00	0.00	3.37	1.03	0.84	8.18	1.01E-04
AVERAGE						1.01E-04

CONSTANT HEAD TEST CD-2 No. 2
 DEPTH: FROM 5.00 m HOLE RAD. 3.80 cm
 TO 10.00 m
 C. HEIGHT 1.00 m
 G.W. LEVEL 9.80 m

TEST LENGTH m	GAUGE PRESSURE kgf/cm ²	INJECTION QUANTITY l/min	P kgf/cm ²	Q l/min/m	Lu	K cm/sec
5.00	0.00	3.98	1.08	0.80	7.37	9.54E-05
5.00	0.00	3.55	1.08	0.71	6.58	8.51E-05
5.00	0.00	3.40	1.08	0.68	6.30	8.15E-05
5.00	0.00	3.42	1.08	0.68	6.34	8.20E-05
5.00	0.00	3.23	1.08	0.65	5.98	7.74E-05
AVERAGE						8.43E-05

CONSTANT HEAD TEST CD-2 No. 3
 DEPTH: FROM 10.00 m HOLE RAD. 3.80 cm
 TO 15.00 m
 C. HEIGHT 0.50 m
 G.W. LEVEL 13.45 m

TEST LENGTH m	GAUGE PRESSURE kgf/cm ²	INJECTION QUANTITY l/min	P kgf/cm ²	Q l/min/m	Lu	K cm/sec
5.00	0.00	2.41	1.39	0.48	3.46	4.47E-05
5.00	0.00	2.62	1.39	0.52	3.76	4.86E-05
5.00	0.00	2.61	1.39	0.52	3.74	4.85E-05
5.00	0.00	2.53	1.39	0.51	3.63	4.70E-05
5.00	0.00	2.56	1.39	0.51	3.67	4.75E-05
AVERAGE						4.73E-05

CONSTANT HEAD TEST CD-2 No. 4
 DEPTH: FROM 15.00 m HOLE RAD. 3.80 cm
 TO 20.00 m
 C. HEIGHT 1.50 m
 G.W. LEVEL 16.15 m

TEST LENGTH m	GAUGE PRESSURE kgf/cm ²	INJECTION QUANTITY l/min	P kgf/cm ²	Q l/min/m	Lu	K cm/sec
5.00	0.00	1.44	1.76	0.29	1.63	2.11E-05
5.00	0.00	1.50	1.76	0.30	1.70	2.20E-05
5.00	0.00	1.35	1.76	0.27	1.53	1.98E-05
5.00	0.00	1.24	1.76	0.25	1.41	1.82E-05
5.00	0.00	1.29	1.76	0.26	1.46	1.89E-05
AVERAGE						2.00E-05

CONSTANT HEAD TEST CD-2 No. 5
 DEPTH: FROM 20.00 m HOLE RAD. 3.80 cm
 TO 25.00 m
 C. HEIGHT 1.00 m
 G.W. LEVEL 16.35 m

TEST LENGTH m	GAUGE PRESSURE kgf/cm2	INJECTION QUANTITY l/min	P kgf/cm2	Q l/min/m	Lu	K cm/sec
5.00	0.00	1.62	1.73	0.32	1.87	2.42E-05
5.00	0.00	1.56	1.73	0.31	1.80	2.33E-05
5.00	0.00	1.43	1.73	0.29	1.65	2.13E-05
5.00	0.00	1.37	1.73	0.27	1.58	2.04E-05
5.00	0.00	1.39	1.73	0.28	1.60	2.07E-05
AVERAGE						2.20E-05

CONSTANT HEAD TEST CD-2 No. 6
 DEPTH: FROM 25.00 m HOLE RAD. 3.80 cm
 TO 30.00 m
 C. HEIGHT 0.50 m
 G.W. LEVEL 16.50 m

TEST LENGTH m	GAUGE PRESSURE kgf/cm2	INJECTION QUANTITY l/min	P kgf/cm2	Q l/min/m	Lu	K cm/sec
5.00	0.00	1.34	1.70	0.27	1.58	2.04E-05
5.00	0.00	1.43	1.70	0.29	1.68	2.18E-05
5.00	0.00	1.27	1.70	0.25	1.49	1.93E-05
5.00	0.00	1.24	1.70	0.25	1.46	1.89E-05
5.00	0.00	1.28	1.70	0.26	1.51	1.95E-05
AVERAGE						2.00E-05

CONSTANT HEAD TEST CD-2 No. 7
 DEPTH: FROM 30.00 m HOLE RAD. 3.80 cm
 TO 35.00 m
 C. HEIGHT 1.50 m
 G.W. LEVEL 19.55 m

TEST LENGTH m	GAUGE PRESSURE kgf/cm2	INJECTION QUANTITY l/min	P kgf/cm2	Q l/min/m	Lu	K cm/sec
5.00	0.00	2.55	2.10	0.51	2.42	3.14E-05
5.00	0.00	2.43	2.10	0.49	2.31	2.99E-05
5.00	0.00	2.48	2.10	0.50	2.36	3.05E-05
5.00	0.00	2.32	2.10	0.46	2.21	2.85E-05
5.00	0.00	2.28	2.10	0.46	2.17	2.81E-05
AVERAGE						2.97E-05

LUGEON TEST CD-2 No. 8
 DEPTH: FROM 35.00 m HOLE RAD. 3.80 cm
 TO 40.00 m
 G. HEIGHT 2.50 m Lu= 1.26
 G.W. LEVEL 20.10 m

TEST LENGTH m	GAUGE PRESSURE kgf/cm2	INJECTION QUANTITY l/min	P kgf/cm2	Q l/min/m	Lu	K cm/sec
5.00	2.00	3.23	4.26	0.65	1.52	1.96E-05
5.00	4.00	4.39	6.26	0.88	1.40	1.82E-05
5.00	6.00	5.38	8.25	1.08	1.30	1.69E-05
5.00	8.00	6.38	10.25	1.28	1.24	1.61E-05
5.00	10.00	7.40	12.25	1.48	1.21	1.56E-05
5.00	9.00	7.31	11.25	1.46	1.30	1.68E-05
5.00	7.00	5.41	9.25	1.08	1.17	1.51E-05
5.00	5.00	4.24	7.26	0.85	1.17	1.51E-05
5.00	3.00	3.32	5.26	0.66	1.26	1.63E-05
5.00	1.00	0.00	3.26	0.00	0.00	0.00E+00

LUGEON TEST CD-2 No. 9
 DEPTH:FROM 40.00 m HOLE RAD. 3.80 cm
 TO 45.00 m
 G.HEIGHT 2.50 m Lu= 1.30
 G.W.LEVEL 20.10 m

TEST LENGTH m	GAUGE PRESSURE kgf/cm ²	INJECTION QUANTITY l/min	P kgf/cm ²	Q l/min/m	Lu	K cm/sec
5.00	2.00	2.26	4.26	0.45	1.06	1.37E-05
5.00	4.00	3.47	6.26	0.69	1.11	1.44E-05
5.00	6.00	5.40	8.25	1.08	1.31	1.69E-05
5.00	8.00	6.63	10.25	1.33	1.29	1.67E-05
5.00	10.00	7.54	12.24	1.51	1.23	1.59E-05
5.00	9.00	6.46	11.25	1.29	1.15	1.49E-05
5.00	7.00	6.30	9.25	1.26	1.36	1.76E-05
5.00	5.00	4.32	7.25	0.86	1.19	1.54E-05
5.00	3.00	3.20	5.26	0.64	1.22	1.58E-05
5.00	1.00	1.20	3.26	0.24	0.74	9.53E-06

CONSTANT HEAD TEST CD-3 No. 1
 DEPTH: FROM 1.00 m HOLE RAD. 3.80 cm
 TO 5.00 m
 G.W. LEVEL 13.60 m

TEST LENGTH m	CASING HEIGHT m	INJECTION QUANTITY l/min	P kgf/cm ²	Q l/min/m	Lu	K cm/sec
4.00	0.50	0.26	0.35	0.07	1.86	2.29E-05
4.00	0.50	0.26	0.35	0.07	1.86	2.29E-05
			0.35	0.07	1.86	2.29E-05
4.00	2.00	0.22	0.50	0.06	1.10	1.36E-05
AVERAGE						1.83E-05

CONSTANT HEAD TEST CD-3 No. 2
 DEPTH: FROM 5.00 m HOLE RAD. 3.80 cm
 TO 10.00 m
 G.W. LEVEL 13.60 m

TEST LENGTH m	CASING HEIGHT m	INJECTION QUANTITY l/min	P kgf/cm ²	Q l/min/m	Lu	K cm/sec
5.00	1.00	0.30	0.85	0.06	0.71	9.14E-06
5.00	1.00	0.30	0.85	0.06	0.71	9.14E-06
			0.85	0.06	0.71	9.14E-06
5.00	2.50	0.20	1.00	0.04	0.40	5.18E-06
AVERAGE						7.16E-06

LUGEON TEST CD-3 No. 3
 DEPTH: FROM 10.00 m HOLE RAD. 3.80 cm
 TO 15.00 m
 G. HEIGHT 1.60 m Lu = 0.36
 G.W. LEVEL 13.10 m

TEST LENGTH m	GAUGE PRESSURE kgf/cm ²	INJECTION QUANTITY l/min	P kgf/cm ²	Q l/min/m	Lu	K cm/sec
5.00	1.00	0.40	2.47	0.08	0.32	4.19E-06
5.00	3.00	0.43	4.47	0.09	0.19	2.49E-06
5.00	5.00	0.82	6.47	0.16	0.25	3.28E-06
5.00	7.00	1.32	8.47	0.26	0.31	4.03E-06
5.00	9.00	1.94	10.47	0.39	0.37	4.80E-06
5.00	10.00	2.86	11.47	0.57	0.50	6.46E-06
5.00	8.00	2.46	9.47	0.49	0.52	6.72E-06
5.00	6.00	1.64	7.47	0.33	0.44	5.68E-06
5.00	4.00	0.92	5.47	0.18	0.34	4.35E-06
5.00	2.00	0.70	3.47	0.14	0.40	5.22E-06

LUGEON TEST CD-3 No. 4
 DEPTH: FROM 15.00 m HOLE RAD. 3.80 cm
 TO 20.00 m
 G. HEIGHT 1.60 m Lu = 0.37
 G.W. LEVEL 13.60 m

TEST LENGTH m	GAUGE PRESSURE kgf/cm ²	INJECTION QUANTITY l/min	P kgf/cm ²	Q l/min/m	Lu	K cm/sec
5.00	1.00	0.38	2.52	0.08	0.30	3.90E-06
5.00	3.00	0.62	4.52	0.12	0.27	3.55E-06
5.00	5.00	0.98	6.52	0.20	0.30	3.89E-06
5.00	7.00	1.52	8.52	0.30	0.36	4.62E-06
5.00	9.00	1.96	10.52	0.39	0.37	4.82E-06
5.00	10.00	2.56	11.52	0.51	0.44	5.75E-06
5.00	8.00	1.84	9.52	0.37	0.39	5.00E-06
5.00	6.00	1.38	7.52	0.28	0.37	4.75E-06
5.00	4.00	0.94	5.52	0.19	0.34	4.41E-06
5.00	2.00	0.68	3.52	0.14	0.39	5.00E-06

LUGEON TEST CD-3 No. 5
 DEPTH: FROM 20.00 m HOLE RAD. 3.80 cm
 TO 25.00 m
 G. HEIGHT 1.60 m Lu = 0.52
 G.W. LEVEL 13.60 m

TEST LENGTH m	GAUGE PRESSURE kgf/cm2	INJECTION QUANTITY l/min	P kgf/cm2	Q l/min/m	Lu	K cm/sec
5.00	1.00	0.54	2.52	0.11	0.43	5.55E-06
5.00	3.00	0.82	4.52	0.16	0.36	4.70E-06
5.00	5.00	1.48	6.52	0.30	0.45	5.88E-06
5.00	7.00	2.10	8.52	0.42	0.49	6.38E-06
5.00	9.00	2.80	10.52	0.56	0.53	6.89E-06
5.00	10.00	3.42	11.52	0.68	0.59	7.69E-06
5.00	8.00	2.78	9.52	0.56	0.58	7.56E-06
5.00	6.00	1.82	7.52	0.36	0.48	6.27E-06
5.00	4.00	1.38	5.52	0.28	0.50	6.47E-06
5.00	2.00	0.86	3.52	0.17	0.49	6.32E-06

LUGEON TEST CD-3 No. 6
 DEPTH: FROM 25.00 m HOLE RAD. 3.80 cm
 TO 30.00 m
 G. HEIGHT 1.60 m Lu = 0.30
 G.W. LEVEL 13.60 m

TEST LENGTH m	GAUGE PRESSURE kgf/cm2	INJECTION QUANTITY l/min	P kgf/cm2	Q l/min/m	Lu	K cm/sec
5.00	1.00	0.24	2.52	0.05	0.19	2.47E-06
5.00	3.00	0.42	4.52	0.08	0.19	2.41E-06
5.00	5.00	0.78	6.52	0.16	0.24	3.10E-06
5.00	7.00	1.26	8.52	0.25	0.30	3.83E-06
5.00	9.00	1.62	10.52	0.32	0.31	3.99E-06
5.00	10.00	2.38	11.52	0.48	0.41	5.35E-06
5.00	8.00	1.80	9.52	0.36	0.38	4.89E-06
5.00	6.00	1.10	7.52	0.22	0.29	3.79E-06
5.00	4.00	0.56	5.52	0.11	0.20	2.63E-06
5.00	2.00	0.36	3.52	0.07	0.20	2.65E-06

LUGEON TEST CD-4 No.1
 DEPTH:FROM 1.50 m HOLE RAD. 3.80 cm
 TO 5.00 m
 G.HEIGHT 1.60 m Lu = 2.23
 G.W.LEVEL 0.85 m

TEST LENGTH m	GAUGE PRESSURE kgf/cm2	INJECTION QUANTITY l/min	P kgf/cm2	Q l/min/m	Lu	K cm/sec
3.50	1.00	0.84	1.24	0.24	1.93	2.31E-05
3.50	3.00	1.34	3.24	0.38	1.18	1.42E-05
3.50	5.00	2.42	5.24	0.69	1.32	1.58E-05
3.50	7.00	4.30	7.24	1.23	1.70	2.03E-05
3.50	9.00	6.75	9.24	1.93	2.09	2.50E-05
3.50	10.00	8.13	10.24	2.32	2.27	2.72E-05
3.50	8.00	6.28	8.24	1.79	2.18	2.61E-05
3.50	6.00	3.72	6.24	1.06	1.70	2.04E-05
3.50	4.00	1.57	4.24	0.45	1.06	1.27E-05
3.50	2.00	0.69	2.24	0.20	0.88	1.05E-05

LUGEON TEST CD-4 No.2
 DEPTH:FROM 5.00 m HOLE RAD. 3.80 cm
 TO 10.00 m
 G.HEIGHT 1.60 m Lu³= 110.64
 G.W.LEVEL 0.85 m Pc= 1.97 kgf/cm2

TEST LENGTH m	GAUGE PRESSURE kgf/cm2	INJECTION QUANTITY l/min	P kgf/cm2	Q l/min/m	Lu	K cm/sec
5.00	0.50	20.70	0.73	4.14	56.71	7.34E-04
5.00	1.00	38.50	1.19	7.70	64.54	8.35E-04
5.00	1.50	66.30	1.59	13.26	83.34	1.08E-03
5.00	2.00	88.30	1.97	17.66	89.55	1.16E-03
5.00	1.00	44.60	1.18	8.92	75.89	9.82E-04
5.00	0.50	25.60	0.72	5.12	70.91	9.18E-04

LUGEON TEST CD-4 No.3
 DEPTH:FROM 10.00 m HOLE RAD. 3.80 cm
 TO 15.00 m
 G.HEIGHT 1.60 m Lu = 108.22
 G.W.LEVEL 0.85 m

TEST LENGTH m	GAUGE PRESSURE kgf/cm2	INJECTION QUANTITY l/min	P kgf/cm2	Q l/min/m	Lu	K cm/sec
5.00	1.00	8.28	1.24	1.66	13.35	1.73E-04
5.00	2.00	24.00	2.20	4.80	21.77	2.82E-04
5.00	3.00	48.50	3.08	9.70	31.49	4.08E-04
5.00	4.00	90.50	3.67	18.10	49.30	6.38E-04
5.00	3.00	44.50	3.11	8.90	28.65	3.71E-04
5.00	2.00	23.40	2.21	4.68	21.21	2.75E-04
5.00	1.00	10.26	1.24	2.05	16.58	2.15E-04

LUGEON TEST CD-4 No.4
 DEPTH:FROM 15.00 m HOLE RAD. 3.80 cm
 TO 20.00 m
 G.HEIGHT 1.60 m Lu = 39.21
 G.W.LEVEL 0.85 m

TEST LENGTH m	GAUGE PRESSURE kgf/cm2	INJECTION QUANTITY l/min	P kgf/cm2	Q l/min/m	Lu	K cm/sec
5.00	1.00	16.55	1.22	3.31	27.22	3.52E-04
5.00	2.00	37.10	2.10	7.42	35.33	4.57E-04
5.00	3.00	54.00	2.94	10.80	36.75	4.76E-04
5.00	4.00	85.40	3.48	17.08	49.09	6.35E-04
5.00	3.50	62.40	3.34	12.48	37.41	4.84E-04
5.00	2.50	47.40	2.51	9.48	37.78	4.89E-04
5.00	1.50	20.50	1.70	4.10	24.11	3.12E-04
5.00	0.50	8.53	0.74	1.71	23.14	2.99E-04

LUGEON TEST CD-4 No.5
 DEPTH:FROM 20.00 m HOLE RAD. 3.80 cm
 TO 25.00 m
 G.HEIGHT 1.60 m Lu = 23.82
 G.W.LEVEL 0.85 m

TEST LENGTH m	GAUGE PRESSURE kgf/cm2	INJECTION QUANTITY l/min	P kgf/cm2	Q l/min/m	Lu	K cm/sec
5.00	1.00	20.55	1.19	4.11	34.66	4.49E-04
5.00	2.00	38.80	2.03	7.76	38.15	4.94E-04
5.00	3.00	47.60	2.93	9.52	32.52	4.21E-04
5.00	4.00	56.40	3.80	11.28	29.69	3.84E-04
5.00	5.00	68.30	4.59	13.66	29.75	3.85E-04
5.00	5.50	82.70	4.79	16.54	34.55	4.47E-04
5.00	4.50	60.50	4.23	12.10	28.59	3.70E-04
5.00	3.50	50.70	3.39	10.14	29.95	3.88E-04
5.00	2.50	44.50	2.47	8.90	36.07	4.67E-04
5.00	1.50	24.30	1.66	4.86	29.24	3.78E-04
5.00	0.50	15.70	0.71	3.14	44.19	5.72E-04

LUGEON TEST CD-4 No.6
 DEPTH:FROM 25.00 m HOLE RAD. 3.80 cm
 TO 29.00 m
 G.HEIGHT 1.60 m Lu' = 2.44
 G.W.LEVEL 0.85 m Pc = 7.24 kgf/cm2

TEST LENGTH m	GAUGE PRESSURE kgf/cm2	INJECTION QUANTITY l/min	P kgf/cm2	Q l/min/m	Lu	K cm/sec
4.00	1.00	0.12	1.24	0.03	0.24	3.03E-06
4.00	3.00	2.38	3.24	0.60	1.83	2.27E-05
4.00	5.00	3.95	5.24	0.99	1.88	2.33E-05
4.00	7.00	6.41	7.24	1.60	2.21	2.73E-05
4.00	9.00	90.00	7.83	22.50	28.74	3.55E-04
4.00	6.00	15.54	6.20	3.89	6.26	7.74E-05
4.00	4.00	7.33	4.24	1.83	4.33	5.34E-05
4.00	2.00	2.08	2.24	0.52	2.32	2.86E-05

LUGEON TEST CD-4 No.7
 DEPTH: FROM 29.00 m HOLE RAD. 3.80 cm
 TO 35.00 m
 G.HEIGHT 1.60 m Lu = 2.54
 G.W.LEVEL 0.85 m

TEST LENGTH m	GAUGE PRESSURE kgf/cm2	INJECTION QUANTITY l/min	P kgf/cm2	Q l/min/m	Lu	K cm/sec
6.00	1.00	2.20	1.24	0.37	2.95	3.96E-05
6.00	2.00	1.35	2.24	0.23	1.00	1.35E-05
6.00	3.00	2.62	3.24	0.44	1.35	1.81E-05
6.00	4.00	4.48	4.24	0.75	1.76	2.36E-05
6.00	5.00	6.35	5.24	1.06	2.02	2.71E-05
6.00	4.00	3.44	4.24	0.57	1.35	1.81E-05
6.00	3.00	1.59	3.24	0.27	0.82	1.10E-05
6.00	2.00	0.00	2.25	0.00	0.00	0.00E+00
6.00	1.00	0.00	1.25	0.00	0.00	0.00E+00

LUGEON TEST CD-4 No.8
 DEPTH: FROM 35.00 m HOLE RAD. 3.80 cm
 TO 40.00 m
 G.HEIGHT 1.60 m Lu = 7.68
 G.W.LEVEL -10.00 m

TEST LENGTH m	GAUGE PRESSURE kgf/cm2	INJECTION QUANTITY l/min	P kgf/cm2	Q l/min/m	Lu	K cm/sec
5.00	1.00	0.34	0.16	0.07	4.25	5.50E-05
5.00	3.00	5.14	2.15	1.03	4.77	6.18E-05
5.00	5.00	13.15	4.12	2.63	6.39	8.27E-05
5.00	7.00	15.75	6.10	3.15	5.16	6.68E-05
5.00	9.00	20.50	8.06	4.10	5.09	6.59E-05
5.00	10.00	28.80	8.96	5.76	6.43	8.32E-05
5.00	8.00	18.85	7.07	3.77	5.33	6.90E-05
5.00	6.00	9.54	5.14	1.91	3.71	4.81E-05
5.00	4.00	5.43	3.15	1.09	3.44	4.46E-05
5.00	2.00	2.46	1.16	0.49	4.25	5.50E-05

LUGEON TEST CD-4 No.9
 DEPTH:FROM 40.00 m HOLE RAD. 3.80 cm
 TO 45.00 m
 G.HEIGHT 1.60 m Lu = 45.43
 G.W.LEVEL -10.00 m

TEST LENGTH m	GAUGE PRESSURE kgf/cm2	INJECTION QUANTITY l/min	P kgf/cm2	Q l/min/m	Lu	K cm/sec
5.00	1.00	16.57	0.08	3.31	398.69	5.16E-03
5.00	2.00	37.70	0.76	7.54	98.95	1.28E-03
5.00	3.00	53.90	1.35	10.78	80.06	1.04E-03
5.00	4.00	60.50	2.14	12.10	56.67	7.34E-04
5.00	5.00	76.40	2.53	15.28	60.50	7.83E-04
5.00	4.00	65.10	1.97	13.02	65.98	8.54E-04
5.00	3.00	52.40	1.39	10.48	75.33	9.75E-04
5.00	2.00	39.30	0.73	7.86	108.03	1.40E-03
5.00	1.00	12.26	0.12	2.45	207.95	2.69E-03

LUGEON TEST CD-4 No.10
 DEPTH:FROM 45.00 m HOLE RAD. 3.80 cm
 TO 50.00 m
 G.HEIGHT 1.60 m Lu = -81.71
 G.W.LEVEL -10.00 m

TEST LENGTH m	GAUGE PRESSURE kgf/cm2	INJECTION QUANTITY l/min	P kgf/cm2	Q l/min/m	Lu	K cm/sec
5.00	0.50	16.60	-0.43	3.32	-77.79	-1.01E-03
5.00	1.00	31.00	-0.14	6.20	-434.43	-5.62E-03
5.00	1.50	52.20	-0.20	10.44	-526.41	-6.81E-03
5.00	2.00	78.40	-0.78	15.68	-202.02	-2.61E-03
5.00	1.50	60.80	-0.50	12.16	-241.06	-3.12E-03
5.00	1.00	40.30	-0.35	8.06	-229.25	-2.97E-03
5.00	0.50	26.00	-0.55	5.20	-94.04	-1.22E-03

CONSTANT HEAD TEST CD-5 No. 1
 DEPTH: FROM 0.50 m HOLE RAD. 2.80 cm
 TO 5.00 m
 G.W. LEVEL 4.25 m

TEST LENGTH m	CASING HEIGHT m	INJECTION QUANTITY l/min	P kgf/cm ²	Q l/min/m	Lu	K cm/sec
4.50	3.25	0.28	0.60	0.06	1.04	1.40E-05
4.50	3.25	0.26	0.60	0.06	0.96	1.30E-05
4.50	3.25	0.23	0.60	0.05	0.85	1.15E-05
			0.60	0.06	0.95	1.28E-05
4.50	3.75	0.38	0.65	0.08	1.30	1.75E-05
4.50	3.75	0.43	0.65	0.10	1.47	1.98E-05
4.50	3.75	0.45	0.65	0.10	1.54	2.07E-05
			0.65	0.09	1.44	1.93E-05
AVERAGE						1.61E-05

CONSTANT HEAD TEST CD-5 No. 2
 DEPTH: FROM 5.00 m HOLE RAD. 2.80 cm
 TO 10.00 m
 G.W. LEVEL 4.25 m

TEST LENGTH m	CASING HEIGHT m	INJECTION QUANTITY l/min	P kgf/cm ²	Q l/min/m	Lu	K cm/sec
5.00	5.25	0.29	0.95	0.06	0.61	8.40E-06
5.00	5.25	0.30	0.95	0.06	0.63	8.69E-06
5.00	5.25	0.24	0.95	0.05	0.51	6.95E-06
			0.95	0.06	0.58	8.01E-06
4.50	6.75	0.38	1.10	0.08	0.77	1.03E-05
4.50	6.75	0.43	1.10	0.10	0.87	1.17E-05
4.50	6.75	0.45	1.10	0.10	0.91	1.22E-05
			1.10	0.09	0.85	1.14E-05
AVERAGE						9.72E-06

LUGEON TEST CD-5 No.3
 DEPTH: FROM 10.00 m HOLE RAD. 2.80 cm
 TO 15.00 m
 G. HEIGHT 1.28 m Lu = 0.13
 G.W. LEVEL 4.25 m

TEST LENGTH m	GAUGE PRESSURE kgf/cm2	INJECTION QUANTITY l/min	P kgf/cm2	Q l/min/m	Lu	K cm/sec
5.00	1.00	0.00	1.55	0.00	0.00	0.00E+00
5.00	2.00	0.23	2.55	0.05	0.18	2.48E-06
5.00	3.00	0.35	3.55	0.07	0.20	2.71E-06
5.00	4.00	0.40	4.55	0.08	0.18	2.42E-06
5.00	5.00	0.45	5.55	0.09	0.16	2.23E-06
5.00	4.00	0.41	4.55	0.08	0.18	2.48E-06
5.00	3.00	0.39	3.55	0.08	0.22	3.02E-06
5.00	2.00	0.25	2.55	0.05	0.20	2.69E-06
5.00	1.00	0.00	1.55	0.00	0.00	0.00E+00

LUGEON TEST CD-5 No.4
 DEPTH: FROM 15.00 m HOLE RAD. 2.80 cm
 TO 20.00 m
 G. HEIGHT 1.28 m Lu = 0.16
 G.W. LEVEL 4.25 m

TEST LENGTH m	GAUGE PRESSURE kgf/cm2	INJECTION QUANTITY l/min	P kgf/cm2	Q l/min/m	Lu	K cm/sec
5.00	1.00	0.00	1.55	0.00	0.00	0.00E+00
5.00	2.00	0.17	2.55	0.03	0.13	1.83E-06
5.00	3.00	0.23	3.55	0.05	0.13	1.78E-06
5.00	4.00	0.27	4.55	0.05	0.12	1.63E-06
5.00	5.00	0.36	5.55	0.07	0.13	1.78E-06
5.00	4.00	0.35	4.55	0.07	0.15	2.11E-06
5.00	3.00	0.29	3.55	0.06	0.16	2.25E-06
5.00	2.00	0.21	2.55	0.04	0.16	2.26E-06
5.00	1.00	0.00	1.55	0.00	0.00	0.00E+00

CONSTANT HEAD TEST CD-6 No. 1
 DEPTH: FROM 0.50 m HOLE RAD. 2.80 cm
 TO 5.00 m
 G.W. LEVEL 0.00 m

TEST LENGTH m	CASING HEIGHT m	INJECTION QUANTITY l/min	P kgf/cm ²	Q l/min/m	Lu	K cm/sec
4.50	3.25	0.00	0.33	0.00	0.00	0.00E+00
4.50	3.25	0.00	0.33	0.00	0.00	0.00E+00
4.50	3.25	0.00	0.33	0.00	0.00	0.00E+00
			0.33	0.00	0.00	0.00E+00
4.50	3.75	0.00	0.38	0.00	0.00	0.00E+00
4.50	3.75	0.00	0.38	0.00	0.00	0.00E+00
4.50	3.75	0.00	0.38	0.00	0.00	0.00E+00
			0.38	0.00	0.00	0.00E+00
AVERAGE						0.00E+00

CONSTANT HEAD TEST CD-6 No. 2
 DEPTH: FROM 5.00 m HOLE RAD. 2.80 cm
 TO 10.00 m
 G.W. LEVEL 0.00 m

TEST LENGTH m	CASING HEIGHT m	INJECTION QUANTITY l/min	P kgf/cm ²	Q l/min/m	Lu	K cm/sec
5.00	5.00	0.00	0.50	0.00	0.00	0.00E+00
5.00	5.00	0.00	0.50	0.00	0.00	0.00E+00
5.00	5.00	0.00	0.50	0.00	0.00	0.00E+00
4.50	5.00	0.00	0.50	0.00	0.00	0.00E+00
4.50	5.00	0.00	0.50	0.00	0.00	0.00E+00
			0.50	0.00	0.00	0.00E+00

LUGEON TEST CD-6 No.3
 DEPTH:FROM 10.00 m HOLE RAD. 2.80 cm
 TO 15.00 m
 G.HEIGHT 0.00 m Lu = 0.14
 G.W.LEVEL 0.28 m

TEST LENGTH m	GAUGE PRESSURE kgf/cm2	INJECTION QUANTITY l/min	P kgf/cm2	Q l/min/m	Lu	K cm/sec
5.00	1.00	0.00	1.03	0.00	0.00	0.00E+00
5.00	2.00	0.23	2.03	0.05	0.23	3.12E-06
5.00	3.00	0.35	3.03	0.07	0.23	3.18E-06
5.00	4.00	0.40	4.03	0.08	0.20	2.73E-06
5.00	5.00	0.45	5.03	0.09	0.18	2.46E-06
5.00	4.00	0.41	4.03	0.08	0.20	2.80E-06
5.00	3.00	0.39	3.03	0.08	0.26	3.54E-06
5.00	2.00	0.25	2.03	0.05	0.25	3.39E-06
5.00	1.00	0.00	1.03	0.00	0.00	0.00E+00

LUGEON TEST CD-6 No.4
 DEPTH:FROM 15.00 m HOLE RAD. 2.80 cm
 TO 20.00 m
 G.HEIGHT 0.00 m Lu = 0.16
 G.W.LEVEL 0.28 m

TEST LENGTH m	GAUGE PRESSURE kgf/cm2	INJECTION QUANTITY l/min	P kgf/cm2	Q l/min/m	Lu	K cm/sec
5.00	1.00	0.00	1.03	0.00	0.00	0.00E+00
5.00	2.00	0.17	2.03	0.03	0.17	2.31E-06
5.00	3.00	0.23	3.03	0.05	0.15	2.09E-06
5.00	4.00	0.27	4.03	0.05	0.13	1.84E-06
5.00	5.00	0.36	5.03	0.07	0.14	1.97E-06
5.00	4.00	0.35	4.03	0.07	0.17	2.39E-06
5.00	3.00	0.29	3.03	0.06	0.19	2.63E-06
5.00	2.00	0.21	2.03	0.04	0.21	2.85E-06
5.00	1.00	0.00	1.03	0.00	0.00	0.00E+00

CONSTANT HEAD TEST CD-7 No. 1
 DEPTH: FROM 0.50 m HOLE RAD. 2.80 cm
 TO 5.00 m
 G.W. LEVEL 1.25 m

TEST LENGTH m	CASING HEIGHT m	INJECTION QUANTITY l/min	P kgf/cm ²	Q l/min/m	Lu	K cm/sec
4.50	3.25	1.29	0.45	0.29	6.37	8.58E-05
4.50	3.25	1.41	0.45	0.31	6.96	9.38E-05
4.50	3.25	1.40	0.45	0.31	6.91	9.32E-05
			0.45	0.30	6.75	9.09E-05
4.50	3.75	7.23	0.50	1.61	32.13	4.33E-04
4.50	3.75	7.25	0.50	1.61	32.22	4.34E-04
4.50	3.75	7.18	0.50	1.60	31.91	4.30E-04
			0.50	1.60	32.09	4.32E-04
AVERAGE						2.62E-04

LUGEON TEST CD-7 No.2
 DEPTH:FROM 5.00 m HOLE RAD. 2.80 cm
 TO 10.00 m
 G.HEIGHT 1.20 m Lu = 0.18
 G.W.LEVEL 1.25 m

TEST LENGTH m	GAUGE PRESSURE kgf/cm2	INJECTION QUANTITY l/min	P kgf/cm2	Q l/min/m	Lu	K cm/sec
5.00	1.00	0.00	1.25	0.00	0.00	0.00E+00
5.00	2.00	0.00	2.25	0.00	0.00	0.00E+00
5.00	3.00	0.16	3.24	0.03	0.10	1.36E-06
5.00	4.00	0.30	4.24	0.06	0.14	1.94E-06
5.00	5.00	0.38	5.24	0.08	0.14	1.99E-06
5.00	4.00	0.32	4.24	0.06	0.15	2.07E-06
5.00	3.00	0.24	3.24	0.05	0.15	2.03E-06
5.00	2.00	0.00	2.25	0.00	0.00	0.00E+00
5.00	1.00	0.00	1.25	0.00	0.00	0.00E+00

LUGEON TEST CD-7 No.3
 DEPTH:FROM 10.00 m HOLE RAD. 2.80 cm
 TO 15.00 m
 G.HEIGHT 1.48 m Lu = 0.14
 G.W.LEVEL 1.35 m

TEST LENGTH m	GAUGE PRESSURE kgf/cm2	INJECTION QUANTITY l/min	P kgf/cm2	Q l/min/m	Lu	K cm/sec
5.00	1.00	0.00	1.28	0.00	0.00	0.00E+00
5.00	2.00	0.23	2.28	0.05	0.20	2.77E-06
5.00	3.00	0.35	3.28	0.07	0.21	2.93E-06
5.00	4.00	0.40	4.28	0.08	0.19	2.57E-06
5.00	5.00	0.45	5.28	0.09	0.17	2.34E-06
5.00	4.00	0.41	4.28	0.08	0.19	2.63E-06
5.00	3.00	0.39	3.28	0.08	0.24	3.27E-06
5.00	2.00	0.25	2.28	0.05	0.22	3.01E-06
5.00	1.00	0.00	1.28	0.00	0.00	0.00E+00

LUGEON TEST CD-7 No.4
 DEPTH:FROM 15.00 m HOLE RAD. 2.80 cm
 TO 20.00 m
 G.HEIGHT 1.48 m Lu = 0.18
 G.W.LEVEL 1.35 m

TEST LENGTH m	GAUGE PRESSURE kgf/cm2	INJECTION QUANTITY l/min	P kgf/cm2	Q l/min/m	Lu	K cm/sec
5.00	1.00	0.00	1.28	0.00	0.00	0.00E+00
5.00	2.00	0.00	2.28	0.00	0.00	0.00E+00
5.00	3.00	1.32	3.28	0.26	0.80	1.11E-05
5.00	4.00	2.23	4.28	0.45	1.04	1.43E-05
5.00	5.00	3.27	5.28	0.65	1.24	1.70E-05
5.00	4.00	2.24	4.28	0.45	1.05	1.44E-05
5.00	3.00	1.29	3.28	0.26	0.79	1.08E-05
5.00	2.00	0.00	2.28	0.00	0.00	0.00E+00
5.00	1.00	0.00	1.28	0.00	0.00	0.00E+00

CONSTANT HEAD TEST KR-1 No. 1
 DEPTH: FROM 1.00 m HOLE RAD. 3.80 cm
 TO 5.00 m
 G.W. LEVEL 5.20 m

TEST LENGTH m	CASING HEIGHT m	INJECTION QUANTITY l/min	P kgf/cm ²	Q l/min/m	Lu	K cm/sec
4.00	0.50	0.26	0.35	0.07	1.86	2.29E-05
4.00	0.50	0.26	0.35	0.07	1.86	2.29E-05
			0.35	0.07	1.86	2.29E-05
4.00	2.00	0.24	0.50	0.06	1.20	1.48E-05
AVERAGE						1.89E-05

CONSTANT HEAD TEST KR-1 No. 2
 DEPTH: FROM 5.00 m HOLE RAD. 3.80 cm
 TO 10.00 m
 G.W. LEVEL 5.20 m

TEST LENGTH m	CASING HEIGHT m	INJECTION QUANTITY l/min	P kgf/cm ²	Q l/min/m	Lu	K cm/sec
5.00	1.00	0.30	0.62	0.06	0.97	1.25E-05
5.00	1.00	0.30	0.62	0.06	0.97	1.25E-05
			0.62	0.06	0.97	1.25E-05
5.00	2.50	0.10	0.77	0.02	0.26	3.36E-06
AVERAGE						7.94E-06

CONSTANT HEAD TEST KR-1 No. 3
 DEPTH: FROM 10.00 m HOLE RAD. 3.80 cm
 TO 15.00 m
 G.W. LEVEL 6.50 m

TEST LENGTH m	CASING HEIGHT m	INJECTION QUANTITY l/min	P kgf/cm ²	Q l/min/m	Lu	K cm/sec
5.00	1.00	0.33	0.75	0.07	0.88	1.14E-05
5.00	1.00	0.33	0.75	0.07	0.88	1.14E-05
			0.75	0.07	0.88	1.14E-05
5.00	2.00	0.29	0.85	0.06	0.68	8.83E-06
AVERAGE						1.01E-05

CONSTANT HEAD TEST KR-2 No. 1
 DEPTH: FROM 1.00 m HOLE RAD. 3.80 cm
 TO 5.00 m
 G.W. LEVEL 0.70 m

TEST LENGTH m	CASING HEIGHT m	INJECTION QUANTITY l/min	P kgf/cm ²	Q l/min/m	Lu	K cm/sec
4.00	0.50	0.23	0.12	0.06	4.79	5.92E-05
4.00	0.50	0.23	0.12	0.06	4.79	5.92E-05
			0.12	0.06	4.79	5.92E-05
4.00	2.00	0.21	0.27	0.05	1.94	2.40E-05
AVERAGE						4.16E-05

CONSTANT HEAD TEST KR-2 No. 2
 DEPTH: FROM 5.00 m HOLE RAD. 3.80 cm
 TO 10.00 m
 G.W. LEVEL 0.11 m

TEST LENGTH m	CASING HEIGHT m	INJECTION QUANTITY l/min	P kgf/cm ²	Q l/min/m	Lu	K cm/sec
5.00	1.00	0.10	0.11	0.02	1.80	2.33E-05
5.00	1.00	0.10	0.11	0.02	1.80	2.33E-05
			0.11	0.02	1.80	2.33E-05
5.00	2.50	0.00	0.26	0.00	0.00	0.00E+00
AVERAGE						1.17E-05

LUGEON TEST KR-2 No. 3
 DEPTH: FROM 10.00 m HOLE RAD. 3.80 cm
 TO 15.00 m
 G. HEIGHT 0.10 m Lu = 0.69
 G.W. LEVEL 0.25 m

TEST LENGTH m	GAUGE PRESSURE kgf/cm2	INJECTION QUANTITY l/min	P kgf/cm2	Q l/min/m	Lu	K cm/sec
5.00	1.00	0.52	1.03	0.10	1.00	1.30E-05
5.00	2.00	0.84	2.03	0.17	0.83	1.07E-05
5.00	3.00	1.34	3.03	0.27	0.88	1.14E-05
5.00	4.00	1.64	4.03	0.33	0.81	1.05E-05
5.00	5.00	1.96	5.03	0.39	0.78	1.01E-05
5.00	4.00	1.78	4.03	0.36	0.88	1.14E-05
5.00	3.00	1.22	3.03	0.24	0.80	1.04E-05
5.00	2.00	0.94	2.03	0.19	0.92	1.20E-05
5.00	1.00	0.48	1.03	0.10	0.93	1.20E-05

CONSTANT HEAD TEST KR-3 No. 1
 DEPTH: FROM 1.00 m HOLE RAD. 3.80 cm
 TO 5.00 m
 G.W.LEVEL 1.00 m

TEST LENGTH m	CASING HEIGHT m	INJECTION QUANTITY l/min	P kgf/cm2	Q l/min/m	Lu	K cm/sec
4.00	1.00	0.16	0.20	0.04	2.00	2.47E-05
4.00	1.00	0.16	0.20	0.04	2.00	2.47E-05
			0.20	0.04	2.00	2.47E-05

CONSTANT HEAD TEST KR-3 No. 2
 DEPTH: FROM 5.00 m HOLE RAD. 3.80 cm
 TO 10.00 m
 G.W.LEVEL 1.00 m

TEST LENGTH m	CASING HEIGHT m	INJECTION QUANTITY l/min	P kgf/cm2	Q l/min/m	Lu	K cm/sec
5.00	1.00	0.13	0.20	0.03	1.30	1.68E-05
5.00	1.00	0.13	0.20	0.03	1.30	1.68E-05
			0.20	0.03	1.30	1.68E-05

LUGEON TEST KR-3 No.3
 DEPTH:FROM 10.00 m HOLE RAD. 3.80 cm
 TO 15.00 m
 G.HEIGHT 0.25 m Lu = 2.88
 G.W.LEVEL 1.00 m

TEST LENGTH m	GAUGE PRESSURE kgf/cm2	INJECTION QUANTITY l/min	P kgf/cm2	Q l/min/m	Lu	K cm/sec
5.00	1.00	0.76	1.12	0.15	1.35	1.75E-05
5.00	2.00	1.22	2.12	0.24	1.15	1.49E-05
5.00	3.00	2.28	3.12	0.46	1.46	1.89E-05
5.00	4.00	3.80	4.12	0.76	1.84	2.39E-05
5.00	5.00	5.60	5.12	1.12	2.19	2.83E-05
5.00	4.00	3.90	4.12	0.78	1.89	2.45E-05
5.00	3.00	3.06	3.12	0.61	1.96	2.54E-05
5.00	2.00	1.74	2.12	0.35	1.64	2.12E-05
5.00	1.00	1.06	1.12	0.21	1.88	2.44E-05

CONSTANT HEAD TEST Kr-4 No. 1
 DEPTH: FROM 1.50 m HOLE RAD. 3.80 cm
 TO 5.00 m
 C. HEIGHT 1.50 m
 G.W. LEVEL 7.62 m

TEST LENGTH m	GAUGE PRESSURE kgf/cm ²	INJECTION QUANTITY l/min	P kgf/cm ²	Q l/min/m	Lu	K cm/sec
3.50	0.00	0.18	0.91	0.05	0.56	6.77E-06
3.50	0.00	0.16	0.91	0.05	0.50	6.01E-06
3.50	0.00	0.16	0.91	0.05	0.50	6.01E-06
3.50	0.00	0.18	0.91	0.05	0.56	6.77E-06
3.50	0.00	0.10	0.91	0.03	0.31	3.76E-06
AVERAGE					0.49	5.86E-06

LUGEON TEST Kr-4 No. 2
 DEPTH: FROM 5.00 m HOLE RAD. 3.80 cm
 TO 10.00 m
 G. HEIGHT 0.25 m Lu' = 1.88
 G.W. LEVEL 7.62 m Pc = 5.79

TEST LENGTH m	GAUGE PRESSURE kgf/cm ²	INJECTION QUANTITY l/min	P kgf/cm ²	Q l/min/m	Lu	K cm/sec
5.00	1.00	4.44	1.79	0.89	4.97	6.43E-05
5.00	3.00	5.20	3.79	1.04	2.75	3.56E-05
5.00	5.00	6.54	5.79	1.31	2.26	2.93E-05
5.00	6.00	10.10	6.78	2.02	2.98	3.85E-05

LUGEON TEST Kr-4 No. 3
 DEPTH:FROM 10.00 m HOLE RAD. 3.80 cm
 TO 15.00 m
 G.HEIGHT 0.25 m Lu= 4.29
 G.W.LEVEL 7.62 m

TEST LENGTH m	GAUGE PRESSURE kgf/cm2	INJECTION QUANTITY l/min	P kgf/cm2	Q l/min/m	Lu	K cm/sec
5.00	1.00	5.14	1.79	1.03	5.76	7.45E-05
5.00	3.00	11.70	3.78	2.34	6.19	8.02E-05
5.00	5.00	13.20	5.77	2.64	4.57	5.92E-05
5.00	7.00	14.20	7.77	2.84	3.65	4.73E-05
5.00	10.00	23.90	10.75	4.78	4.45	5.76E-05
5.00	8.00	14.90	8.77	2.98	3.40	4.40E-05
5.00	6.00	9.30	6.78	1.86	2.74	3.55E-05
5.00	4.00	6.18	4.78	1.24	2.58	3.34E-05
5.00	2.00	4.25	2.79	0.85	3.05	3.95E-05

LUGEON TEST Kr-4 No.4
 DEPTH:FROM 15.00 m HOLE RAD. 3.80 cm
 TO 20.00 m
 G.HEIGHT 0.25 m Lu= 0.44
 G.W.LEVEL 7.62 m

TEST LENGTH m	GAUGE PRESSURE kgf/cm2	INJECTION QUANTITY l/min	P kgf/cm2	Q l/min/m	Lu	K cm/sec
5.00	1.00	0.00	1.79	0.00	0.00	0.00E+00
5.00	3.00	0.30	3.79	0.06	0.16	2.05E-06
5.00	5.00	0.46	5.79	0.09	0.16	2.06E-06
5.00	8.00	0.92	8.79	0.18	0.21	2.70E-06
5.00	10.00	3.03	10.79	0.61	0.56	7.27E-06
5.00	9.00	1.60	9.79	0.32	0.33	4.23E-06
5.00	7.00	0.45	7.79	0.09	0.12	1.50E-06
5.00	4.00	0.20	4.79	0.04	0.08	1.08E-06
5.00	3.00	0.00	3.79	0.00	0.00	0.00E+00
5.00	2.00	0.00	2.79	0.00	0.00	0.00E+00

CONSTANT HEAD TEST Kr-5 No. 1
 DEPTH: FROM 1.00 m HOLE RAD. 3.80 cm
 TO 5.00 m
 C. HEIGHT 0.50 m
 G.W. LEVEL 0.10 m

TEST LENGTH m	GAUGE PRESSURE kgf/cm ²	INJECTION QUANTITY l/min	P kgf/cm ²	Q l/min/m	Lu	K cm/sec
4.00	0.00	0.68	0.06	0.17	28.33	3.50E-04
AVERAGE					28.33	3.50E-04

CONSTANT HEAD TEST Kr-5 No. 2
 DEPTH: FROM 5.00 m HOLE RAD. 3.80 cm
 TO 10.00 m
 C. HEIGHT 1.00 m
 G.W. LEVEL 0.10 m

TEST LENGTH m	GAUGE PRESSURE kgf/cm ²	INJECTION QUANTITY l/min	P kgf/cm ²	Q l/min/m	Lu	K cm/sec
5.00	0.00	0.26	0.11	0.05	4.73	6.12E-05
AVERAGE					4.73	6.12E-05

LUGEON TEST Kr-6 No.1
 DEPTH:FROM 5.00 m HOLE RAD. 3.80 cm
 TO 10.00 m
 G.HEIGHT 0.25 m Lu= 0.85
 G.W.LEVEL 0.00 m

TEST LENGTH m	GAUGE PRESSURE kgf/cm2	INJECTION QUANTITY l/min	P kgf/cm2	Q l/min/m	Lu	K cm/sec
5.00	1.00	1.08	1.02	0.22	2.11	2.73E-05
5.00	3.00	1.50	3.02	0.30	0.99	1.28E-05
5.00	5.00	2.24	5.02	0.45	0.89	1.15E-05
5.00	7.00	2.80	7.02	0.56	0.80	1.03E-05
5.00	9.00	3.54	9.02	0.71	0.78	1.02E-05
5.00	10.00	4.27	10.02	0.85	0.85	1.10E-05
5.00	8.00	3.57	8.02	0.71	0.89	1.15E-05
5.00	6.00	2.78	6.02	0.56	0.92	1.19E-05
5.00	4.00	2.24	4.02	0.45	1.11	1.44E-05
5.00	2.00	1.34	2.02	0.27	1.32	1.71E-05

LUGEON TEST Kr-6 No. 2
 DEPTH:FROM 10.00 m HOLE RAD. 3.80 cm
 TO 15.00 m
 G.HEIGHT 0.25 m Lu= 0.45
 G.W.LEVEL 0.00 m

TEST LENGTH m	GAUGE PRESSURE kgf/cm2	INJECTION QUANTITY l/min	P kgf/cm2	Q l/min/m	Lu	K cm/sec
5.00	1.00	0.73	1.02	0.15	1.42	1.84E-05
5.00	3.00	1.21	3.02	0.24	0.80	1.04E-05
5.00	5.00	1.40	5.02	0.28	0.56	7.21E-06
5.00	7.00	1.74	7.02	0.35	0.50	6.41E-06
5.00	5.00	1.63	5.02	0.33	0.65	8.40E-06
5.00	3.00	1.45	3.02	0.29	0.96	1.24E-05
5.00	1.00	1.21	1.02	0.24	2.36	3.06E-05

LUGEON TEST Kr-6 No. 3
 DEPTH: FROM 15.00 m HOLE RAD. 3.80 cm
 TO 20.00 m
 G. HEIGHT 0.25 m Lu= 13.52
 G.W. LEVEL 0.00 m

TEST LENGTH m	GAUGE PRESSURE kgf/cm2	INJECTION QUANTITY l/min.	P kgf/cm2	Q l/min/m	Lu	K cm/sec
5.00	1.00	0.45	1.02	0.09	0.88	1.14E-05
5.00	3.00	0.63	3.02	0.13	0.42	5.39E-06
5.00	4.00	0.83	4.02	0.17	0.41	5.34E-06
5.00	7.00	1.19	7.02	0.24	0.34	4.39E-06
5.00	9.00	1.73	9.02	0.35	0.38	4.96E-06
5.00	7.00	1.66	7.02	0.33	0.47	6.12E-06
5.00	5.00	1.17	5.02	0.23	0.47	6.03E-06
5.00	3.00	0.76	3.02	0.15	0.50	6.50E-06
5.00	1.00	0.53	1.02	0.11	1.03	1.34E-05

LUGEON TEST Kr-6 No. 4
 DEPTH: FROM 20.00 m HOLE RAD. 3.80 cm
 TO 25.00 m
 G. HEIGHT 0.25 m Lu= 0.34
 G.W. LEVEL 0.00 m

TEST LENGTH m	GAUGE PRESSURE kgf/cm2	INJECTION QUANTITY l/min	P kgf/cm2	Q l/min/m	Lu	K cm/sec
5.00	1.00	0.24	1.02	0.05	0.47	6.06E-06
5.00	3.00	0.62	3.02	0.12	0.41	5.31E-06
5.00	7.00	1.19	7.02	0.24	0.34	4.39E-06
5.00	9.00	1.42	9.02	0.28	0.31	4.07E-06
5.00	10.00	1.69	10.02	0.34	0.34	4.36E-06
5.00	9.00	1.62	9.02	0.32	0.36	4.65E-06
5.00	7.00	1.34	7.02	0.27	0.38	4.94E-06
5.00	5.00	0.82	5.02	0.16	0.33	4.22E-06
5.00	3.00	0.57	3.02	0.11	0.38	4.88E-06
5.00	1.00	0.35	1.02	0.07	0.68	8.84E-06

CONSTANT HEAD TEST Kr-7 No. 1
 DEPTH:FROM 1.00 m HOLE RAD. 3.80 cm
 TO 5.00 m
 C.HEIGHT 0.50 m
 G.W.LEVEL 4.80 m

TEST LENGTH m	GAUGE PRESSURE kgf/cm2	INJECTION QUANTITY l/min	P kgf/cm2	Q l/min/m	Lu	K cm/sec
4.00	0.00	1.48	0.53	0.37	7.00	8.64E-05
4.00	0.15	1.40	0.68	0.35	5.15	6.36E-05
AVERAGE					6.07	7.50E-05

CONSTANT HEAD TEST Kr-7 No.2
 DEPTH:FROM 5.00 m HOLE RAD. 3.80 cm
 TO 10.00 m
 C.HEIGHT 1.00 m
 G.W.LEVEL 4.80 m

TEST LENGTH m	GAUGE PRESSURE kgf/cm2	INJECTION QUANTITY l/min	P kgf/cm2	Q l/min/m	Lu	K cm/sec
5.00	0.00	1.00	0.58	0.20	3.45	4.46E-05
AVERAGE					3.45	4.46E-05

LUGEON TEST Kr-7 No. 3
 DEPTH:FROM 10.00 m HOLE RAD. 3.80 cm
 TO 15.00 m
 G.HEIGHT 0.35 m Lu= 0.43
 G.W.LEVEL 4.80 m

TEST LENGTH m	GAUGE PRESSURE kgf/cm2	INJECTION QUANTITY l/min	P kgf/cm2	Q l/min/m	Lu	K cm/sec
5.00	1.00	0.49	1.51	0.10	0.64	8.30E-06
5.00	3.00	0.77	3.51	0.15	0.44	5.68E-06
5.00	5.00	1.14	5.51	0.23	0.41	5.35E-06
5.00	7.00	1.57	7.51	0.31	0.42	5.41E-06
5.00	9.00	2.00	9.51	0.40	0.42	5.44E-06
5.00	10.00	2.30	10.51	0.46	0.44	5.66E-06
5.00	8.00	1.90	8.51	0.38	0.45	5.78E-06
5.00	6.00	1.60	6.51	0.32	0.49	6.36E-06
5.00	4.00	1.20	4.51	0.24	0.53	6.88E-06
5.00	2.00	0.60	2.51	0.12	0.48	6.18E-06

CONSTANT HEAD TEST Kr-8 No. 1
 DEPTH: FROM 1.50 m HOLE RAD. 3.80 cm
 TO 5.00 m
 C. HEIGHT 0.00 m
 G.W. LEVEL 8.58 m

TEST LENGTH m	GAUGE PRESSURE kgf/cm2	INJECTION QUANTITY l/min	P kgf/cm2	Q l/min/m	Lu	K cm/sec
3.50	0.00	0.70	0.86	0.20	2.33	2.80E-05
3.50	0.15	0.80	1.01	0.23	2.27	2.72E-05
AVERAGE					2.30	2.76E-05

CONSTANT HEAD TEST Kr-8 No. 2
 DEPTH: FROM 5.00 m HOLE RAD. 3.80 cm
 TO 10.00 m
 C. HEIGHT 1.00 m
 G.W. LEVEL 8.58 m

TEST LENGTH m	GAUGE PRESSURE kgf/cm2	INJECTION QUANTITY l/min	P kgf/cm2	Q l/min/m	Lu	K cm/sec
5.00	0.00	0.80	0.96	0.16	1.67	2.16E-05
5.00	0.15	0.90	1.11	0.18	1.63	2.10E-05
AVERAGE					1.65	2.13E-05

CONSTANT HEAD TEST Kr-8 No. 3
 DEPTH: FROM 13.50 m HOLE RAD. 3.80 cm
 TO 15.00 m
 C. HEIGHT 0.00 m
 G.W. LEVEL 8.58 m

TEST LENGTH m	GAUGE PRESSURE kgf/cm ²	INJECTION QUANTITY l/min	P kgf/cm ²	Q l/min/m	Lu	K cm/sec
1.50	0.00	0.40	0.86	0.27	3.11	3.03E-05
AVERAGE					3.11	3.03E-05

CONSTANT HEAD TEST Kr-8 No. 4
 DEPTH: FROM 15.00 m HOLE RAD. 3.80 cm
 TO 20.00 m
 C. HEIGHT 0.00 m
 G.W. LEVEL 8.58 m

TEST LENGTH m	GAUGE PRESSURE kgf/cm ²	INJECTION QUANTITY l/min	P kgf/cm ²	Q l/min/m	Lu	K cm/sec
5.00	0.00	4.87	0.86	0.97	11.39	1.47E-04
5.00	0.15	5.32	1.00	1.06	10.59	1.37E-04
AVERAGE					10.99	1.42E-04

CONSTANT HEAD TEST Dt-1 No. 1
 DEPTH: FROM 1.50 m HOLE RAD. 3.80 cm
 TO 5.00 m
 C. HEIGHT 1.50 m
 G.W. LEVEL 25.00 m

TEST LENGTH m	GAUGE PRESSURE kgf/cm ²	INJECTION QUANTITY l/min	P kgf/cm ²	Q l/min/m	Lu	K cm/sec
3.50	0.00	0.82	2.65	0.23	0.88	1.06E-05
3.50	0.00	0.83	2.65	0.24	0.89	1.07E-05
3.50	0.00	0.83	2.65	0.24	0.89	1.07E-05
AVERAGE					0.89	1.07E-05

LUGEON TEST Dt-2 No. 2
 DEPTH: FROM 5.00 m HOLE RAD. 3.80 cm
 TO 10.00 m
 G. HEIGHT 0.25 m Lu= 0.21
 G.W. LEVEL 25.00 m

TEST LENGTH m	GAUGE PRESSURE kgf/cm ²	INJECTION QUANTITY l/min	P kgf/cm ²	Q l/min/m	Lu	K cm/sec
5.00	1.00	0.00	3.53	0.00	0.00	0.00E+00
5.00	3.00	0.30	5.52	0.06	0.11	1.41E-06
5.00	5.00	0.40	7.52	0.08	0.11	1.38E-06
5.00	7.00	0.86	9.52	0.17	0.18	2.34E-06
5.00	10.00	2.08	12.52	0.42	0.33	4.30E-06
5.00	8.00	1.22	10.52	0.24	0.23	3.00E-06
5.00	6.00	0.24	8.52	0.05	0.06	7.29E-07
5.00	4.00	0.00	6.53	0.00	0.00	0.00E+00

LUGEON TEST Dt-1 No. 3
 DEPTH: FROM 10.00 m HOLE RAD. 3.80 cm
 TO 15.00 m
 G. HEIGHT 0.25 m Lu= 0.27
 G.W. LEVEL 25.00 m

TEST LENGTH m	GAUGE PRESSURE kgf/cm ²	INJECTION QUANTITY l/min	P kgf/cm ²	Q l/min/m	Lu	K cm/sec
5.00	1.00	0.00	3.53	0.00	0.00	0.00E+00
5.00	3.00	0.54	5.52	0.11	0.20	2.53E-06
5.00	5.00	0.90	7.52	0.18	0.24	3.10E-06
5.00	7.00	1.24	9.52	0.25	0.26	3.37E-06
5.00	10.00	1.88	12.52	0.38	0.30	3.89E-06
5.00	8.00	0.98	10.52	0.20	0.19	2.41E-06
5.00	6.00	0.32	8.52	0.06	0.08	9.72E-07
5.00	4.00	0.10	6.52	0.02	0.03	3.97E-07
5.00	2.00	0.00	4.53	0.00	0.00	0.00E+00

LUGEON TEST Dt-1 No. 4
 DEPTH: FROM 15.00 m HOLE RAD. 3.80 cm
 TO 20.00 m
 G. HEIGHT 0.25 m Lu= 0.19
 G.W. LEVEL 25.00 m

TEST LENGTH m	GAUGE PRESSURE kgf/cm ²	INJECTION QUANTITY l/min	P kgf/cm ²	Q l/min/m	Lu	K cm/sec
5.00	1.00	0.00	3.53	0.00	0.00	0.00E+00
5.00	3.00	0.18	5.52	0.04	0.07	8.43E-07
5.00	5.00	0.46	7.52	0.09	0.12	1.58E-06
5.00	7.00	0.88	9.52	0.18	0.18	2.39E-06
5.00	10.00	1.36	12.52	0.27	0.22	2.81E-06
5.00	8.00	0.72	10.52	0.14	0.14	1.77E-06
5.00	6.00	0.40	8.52	0.08	0.09	1.21E-06
5.00	4.00	0.14	6.52	0.03	0.04	5.55E-07
5.00	2.00	0.00	4.53	0.00	0.00	0.00E+00

CONSTANT HEAD TEST Dt-2 No. 1
 DEPTH: FROM 1.50 m HOLE RAD. 3.80 cm
 TO 5.00 m
 G. HEIGHT 1.50 m
 G.W. LEVEL 25.00 m

TEST LENGTH m	GAUGE PRESSURE kgf/cm ²	INJECTION QUANTITY l/min	P kgf/cm ²	Q l/min/m	Lu	K cm/sec
3.50	0.00	0.38	2.65	0.11	0.41	4.92E-06
3.50	0.00	0.42	2.65	0.12	0.45	5.43E-06
3.50	0.00	0.48	2.65	0.14	0.52	6.21E-06
3.50	0.00	0.45	2.65	0.13	0.49	5.82E-06
3.50	0.00	0.50	2.65	0.14	0.54	6.47E-06
AVERAGE					0.48	5.77E-06

LUGEON TEST Dt-2 No. 2
 DEPTH: FROM 5.00 m HOLE RAD. 3.80 cm
 TO 10.00 m
 G. HEIGHT 1.80 m Lu= 0.63
 G.W. LEVEL 25.00 m

TEST LENGTH m	GAUGE PRESSURE kgf/cm ²	INJECTION QUANTITY l/min	P kgf/cm ²	Q l/min/m	Lu	K cm/sec
5.00	1.00	0.63	3.68	0.13	0.34	4.42E-06
5.00	3.00	1.38	5.68	0.28	0.49	6.30E-06
5.00	5.00	2.12	7.68	0.42	0.55	7.14E-06
5.00	7.00	2.86	9.68	0.57	0.59	7.65E-06
5.00	10.00	5.36	12.68	1.07	0.85	1.09E-05
5.00	8.00	3.10	10.68	0.62	0.58	7.51E-06
5.00	6.00	1.88	8.68	0.38	0.43	5.61E-06
5.00	4.00	1.02	6.68	0.20	0.31	3.95E-06
5.00	2.00	0.14	4.68	0.03	0.06	7.74E-07

LUGEON TEST Dt-2 No. 3
 DEPTH: FROM 10.00 m HOLE RAD. 3.80 cm
 TO 15.00 m
 G. HEIGHT 1.80 m Lu= 0.33
 G.W. LEVEL 25.00 m

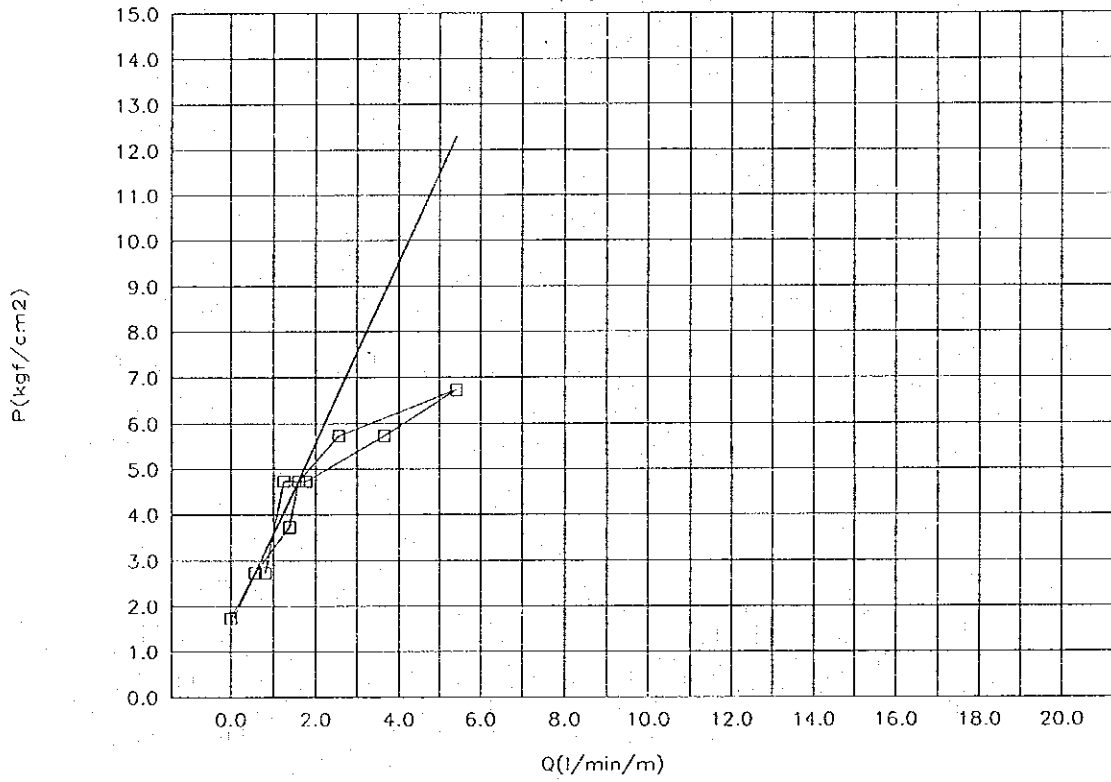
TEST LENGTH m	GAUGE PRESSURE kgf/cm2	INJECTION QUANTITY l/min	P kgf/cm2	Q l/min/m	Lu	K cm/sec
5.00	1.00	0.00	3.68	0.00	0.00	0.00E+00
5.00	3.00	0.13	5.68	0.03	0.04	5.70E-07
5.00	5.00	0.35	7.68	0.07	0.09	1.18E-06
5.00	7.00	1.48	9.68	0.30	0.31	3.96E-06
5.00	10.00	2.98	12.68	0.60	0.47	6.08E-06
5.00	8.00	1.70	10.68	0.34	0.32	4.12E-06
5.00	6.00	0.64	8.68	0.13	0.15	1.91E-06
5.00	4.00	0.24	6.68	0.05	0.07	9.30E-07
5.00	2.00	0.00	4.68	0.00	0.00	0.00E+00

LUGEON TEST Dt-2 No. 4
 DEPTH: FROM 15.00 m HOLE RAD. 3.80 cm
 TO 20.00 m
 G. HEIGHT 1.80 m Lu= 0.14
 G.W. LEVEL 25.00 m

TEST LENGTH m	GAUGE PRESSURE kgf/cm2	INJECTION QUANTITY l/min	P kgf/cm2	Q l/min/m	Lu	K cm/sec
5.00	1.00	0.00	3.68	0.00	0.00	0.00E+00
5.00	3.00	0.00	5.68	0.00	0.00	0.00E+00
5.00	5.00	0.42	7.68	0.08	0.11	1.42E-06
5.00	7.00	0.58	9.68	0.12	0.12	1.55E-06
5.00	10.00	1.64	12.68	0.33	0.26	3.35E-06
5.00	8.00	0.84	10.68	0.17	0.16	2.04E-06
5.00	6.00	0.03	8.68	0.01	0.01	8.95E-08
5.00	4.00	0.00	6.68	0.00	0.00	0.00E+00
5.00	2.00	0.00	4.68	0.00	0.00	0.00E+00

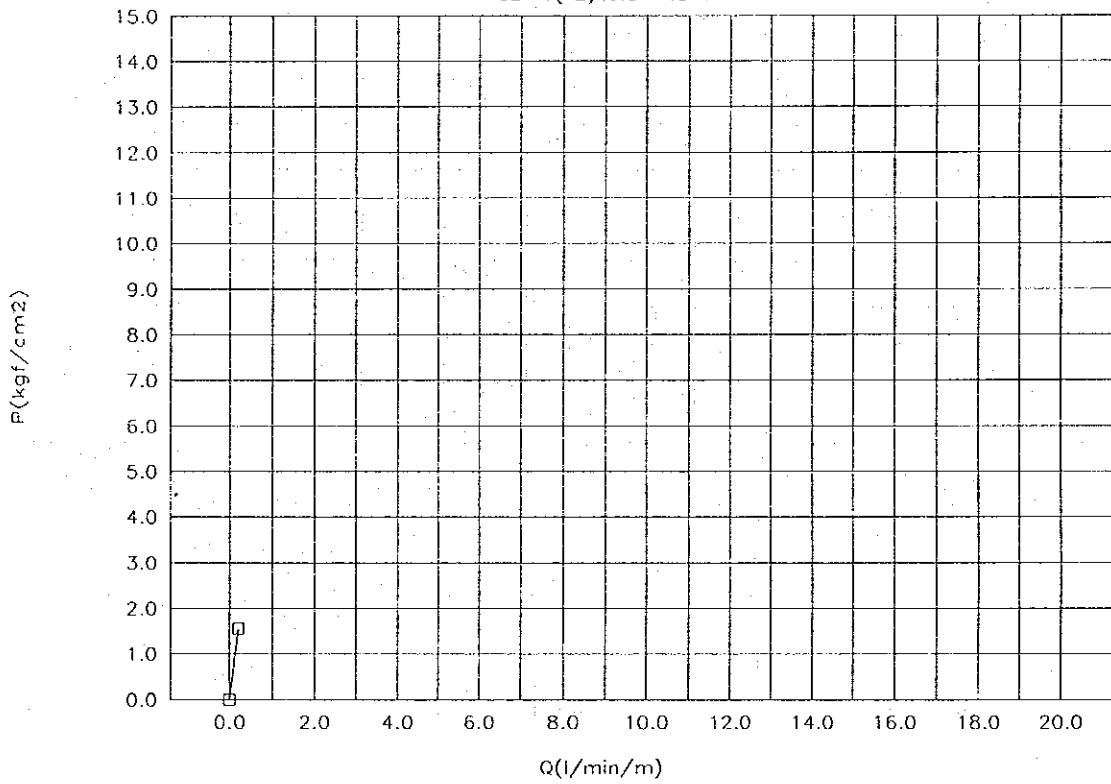
LUGEON TEST

CB-1(1) 2.5-5.0m



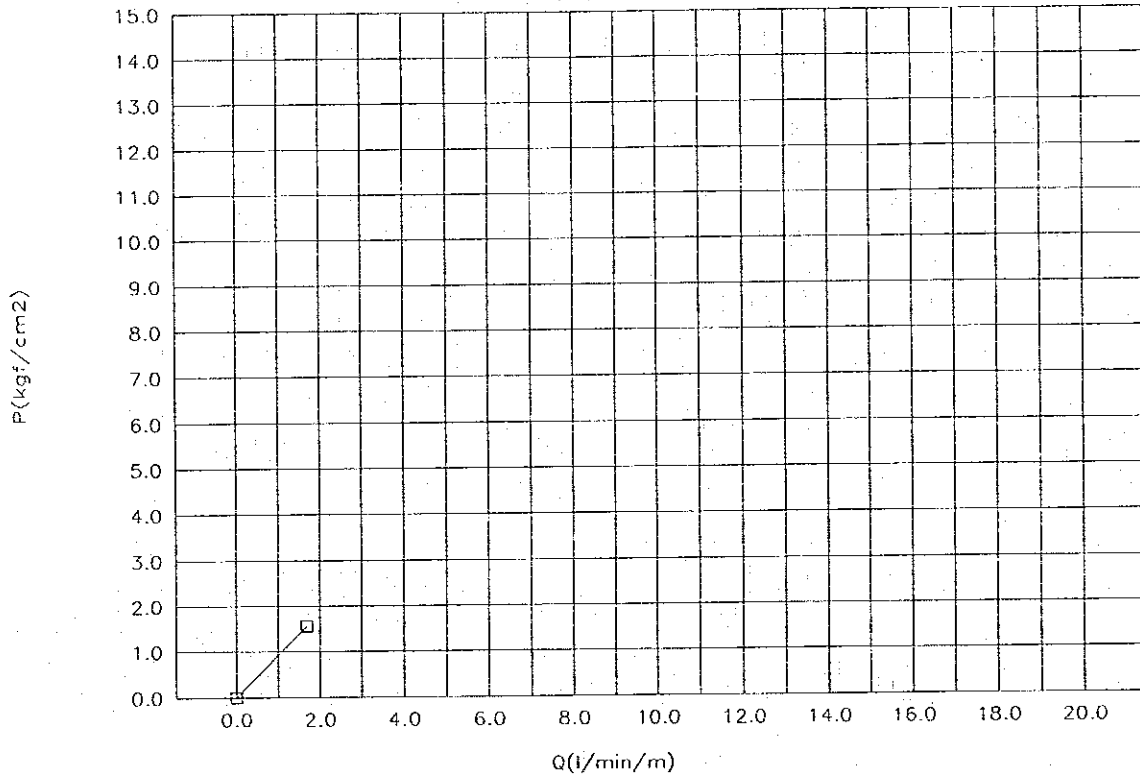
CONSTANT HEAD TEST

CB-1(2) 0.8-7.5m



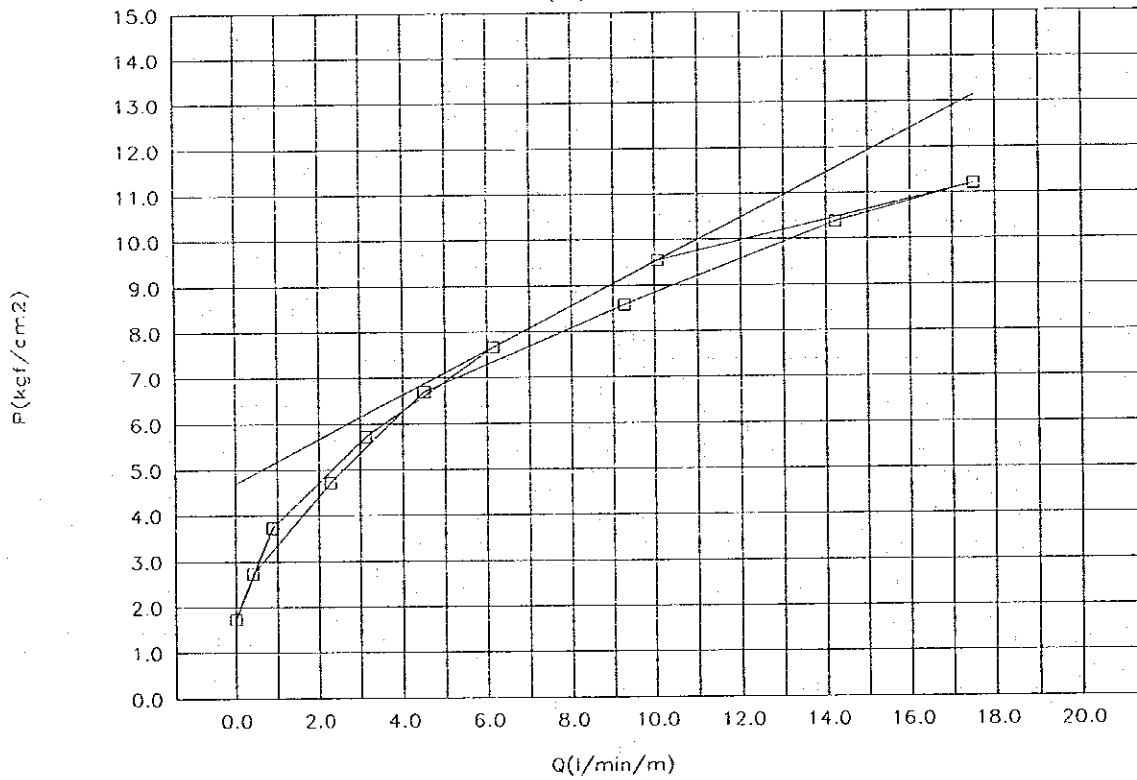
CONSTANT HEAD TEST

CB-1(3) 7.5-10.0m



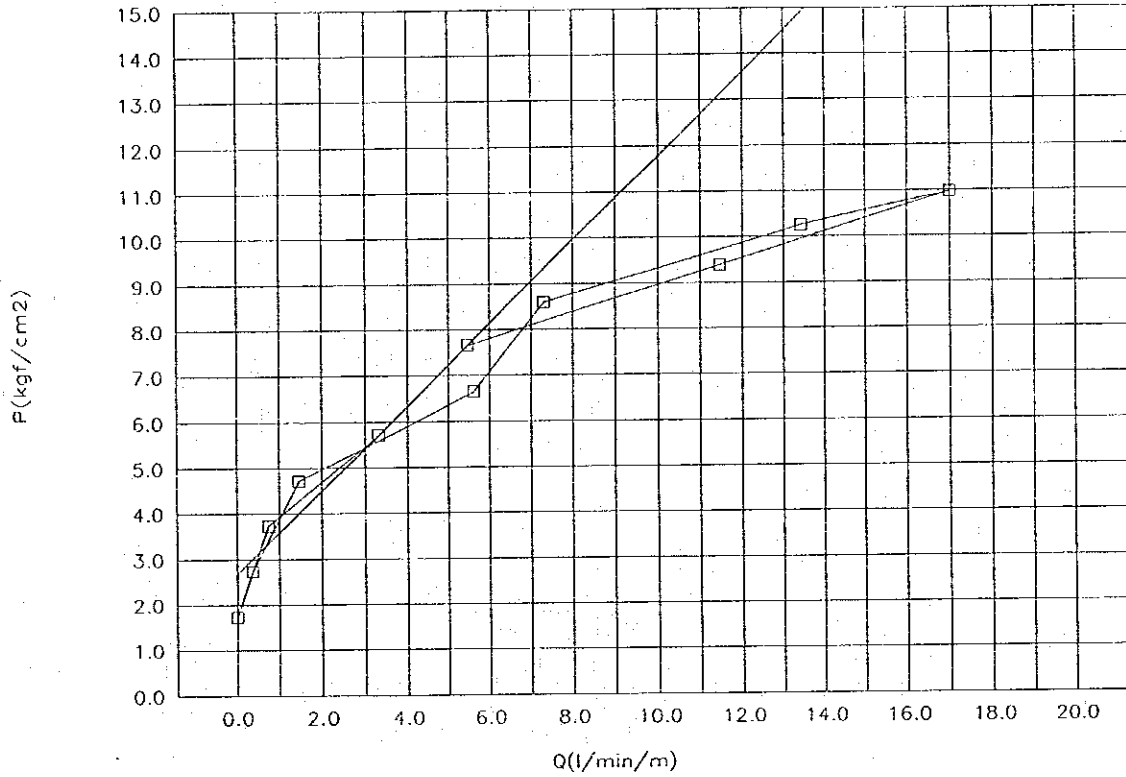
LUGEON TEST

CB-1(4) 10.0-15.0m



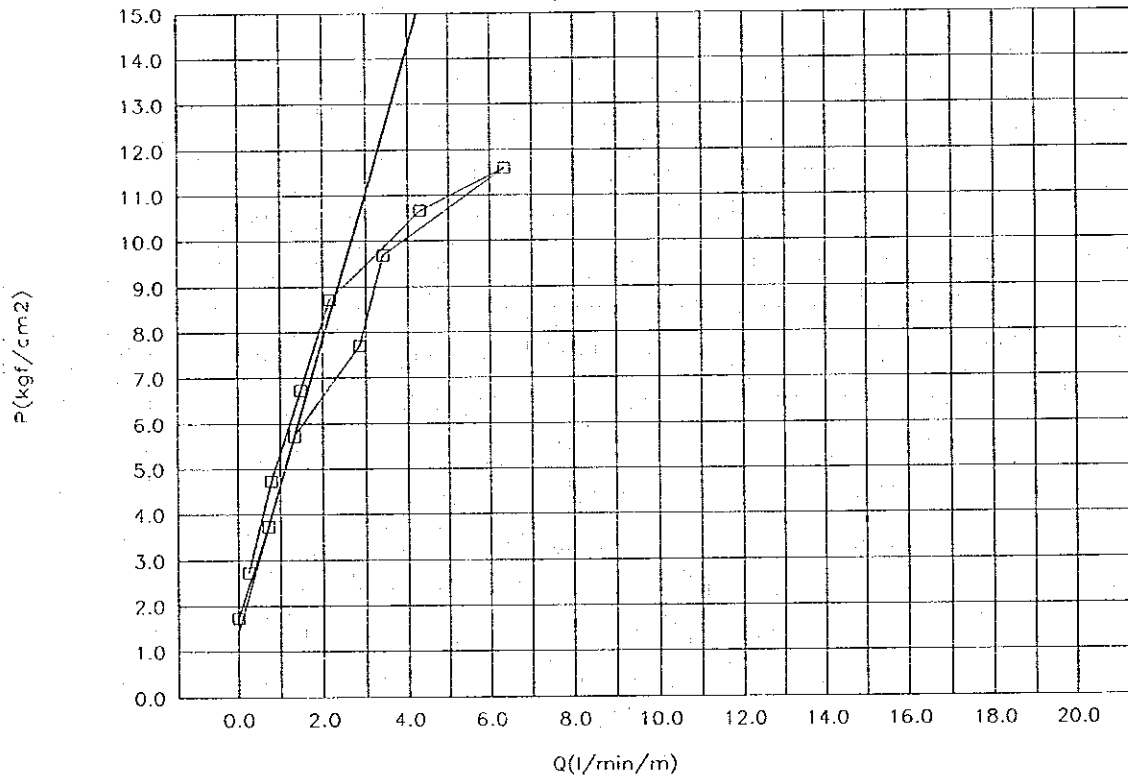
LUGEON TEST

CB-1(5) 15.0-20.0m



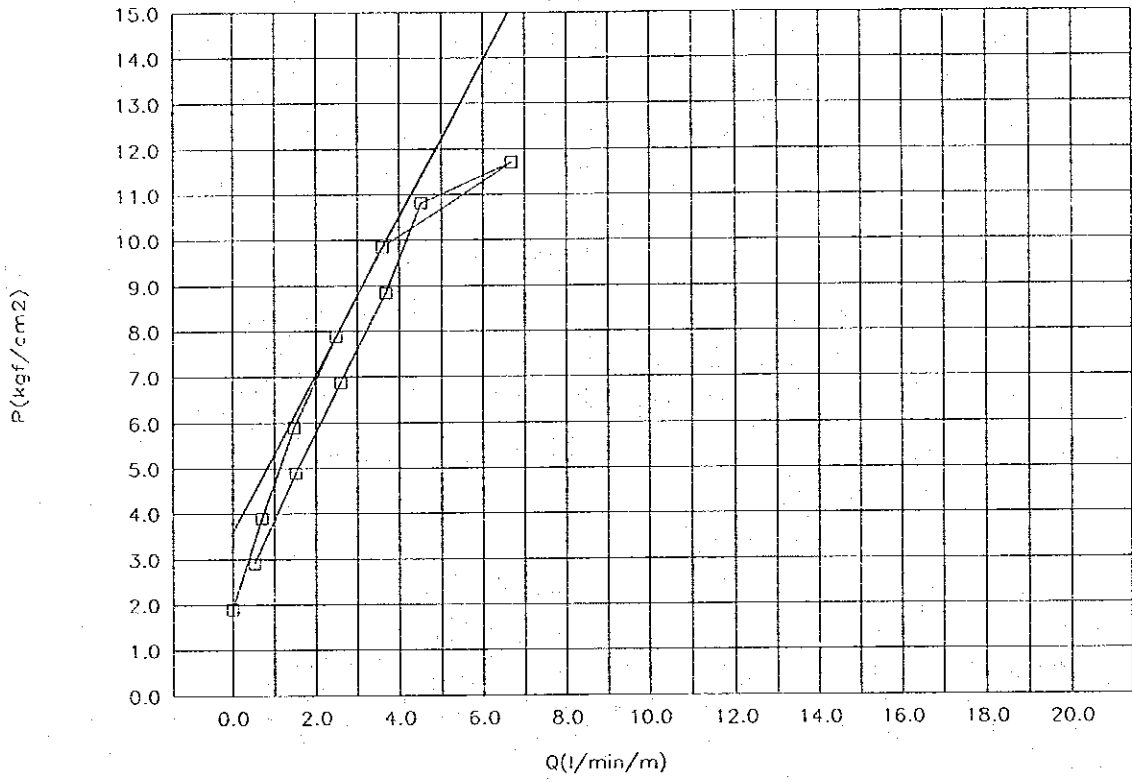
LUGEON TEST

CB-1(6) 20.0-25.0m



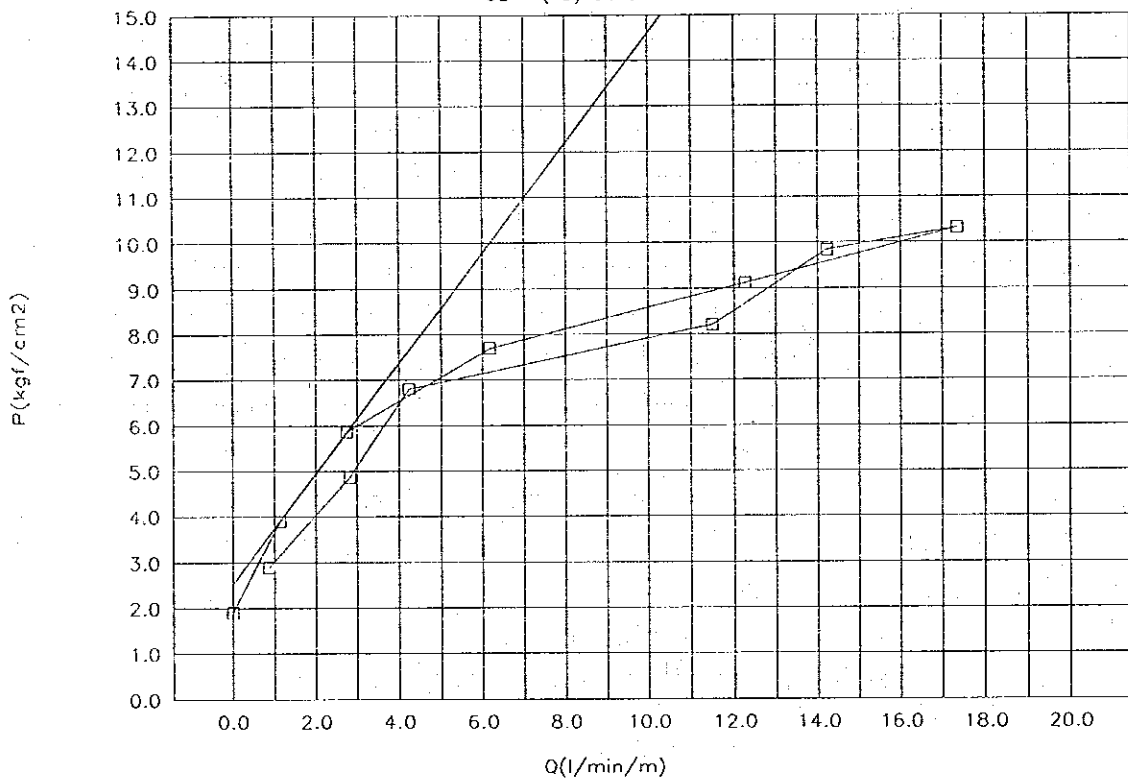
LUGEON TEST

CB-1(7) 25.0-30.0m



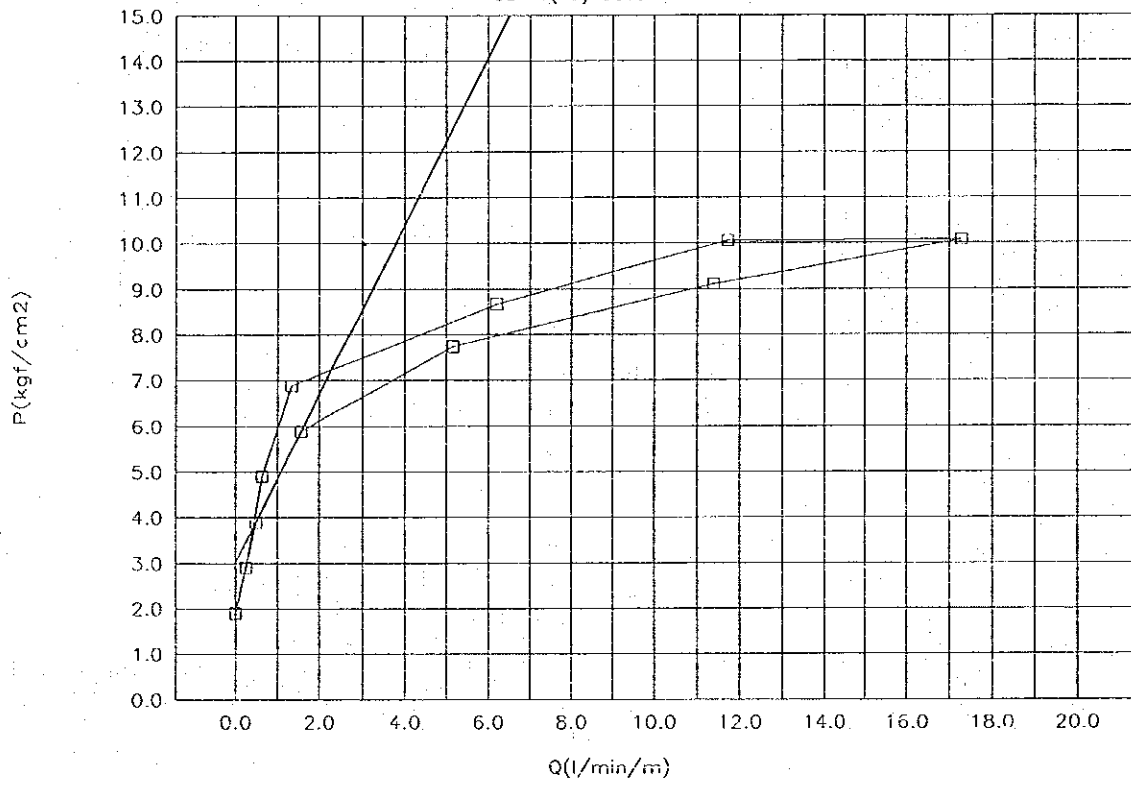
LUGEON TEST

CB-1(8) 30.0-35.0m



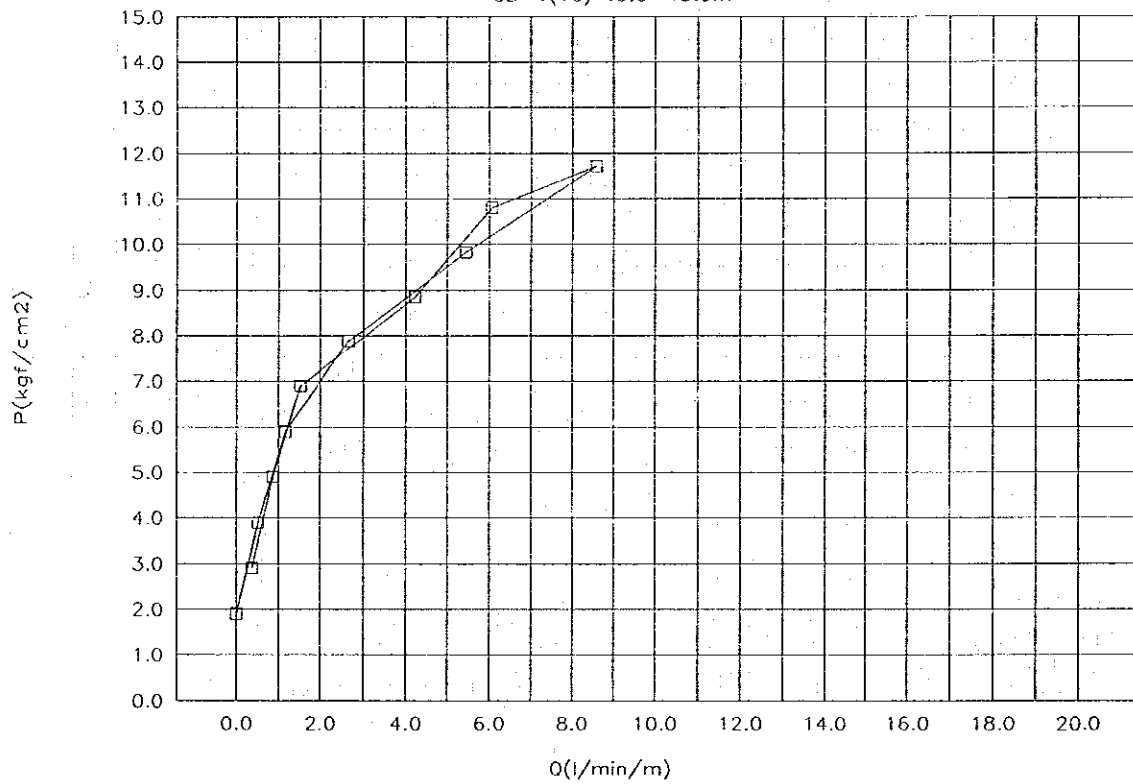
LUGEON TEST

CB-1(9) 35.0-40.0m



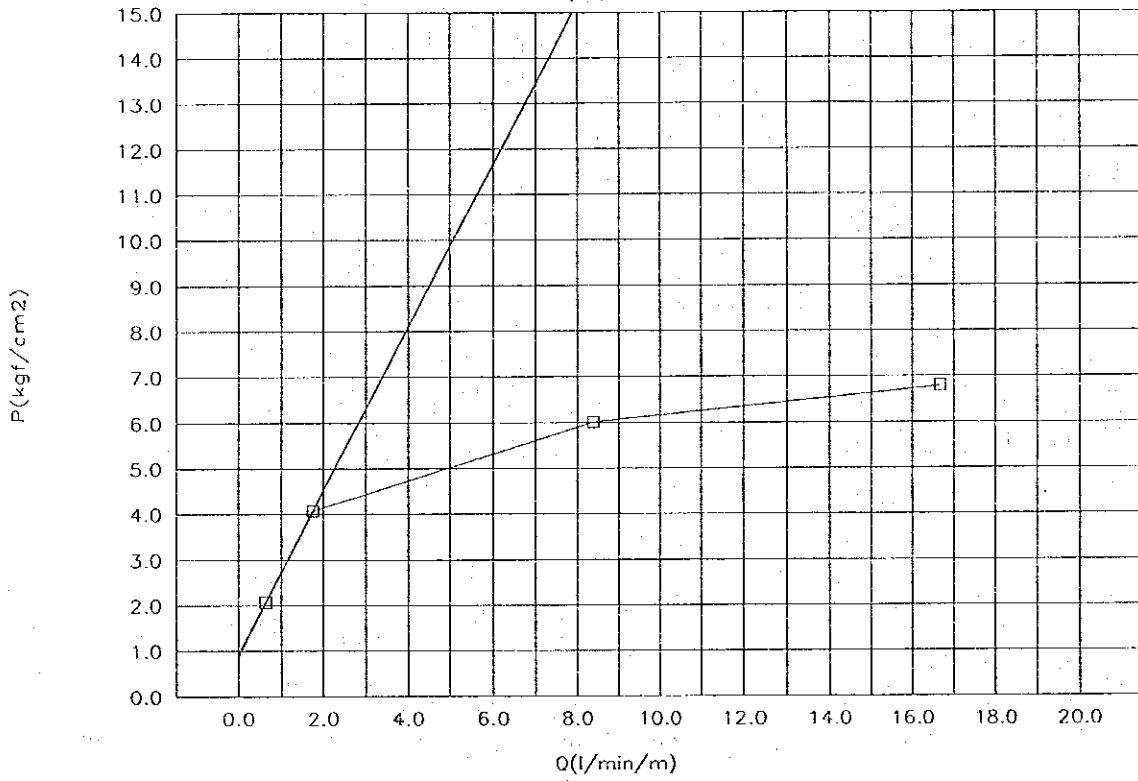
LUGEON TEST

CB-1(10) 40.0-43.0m



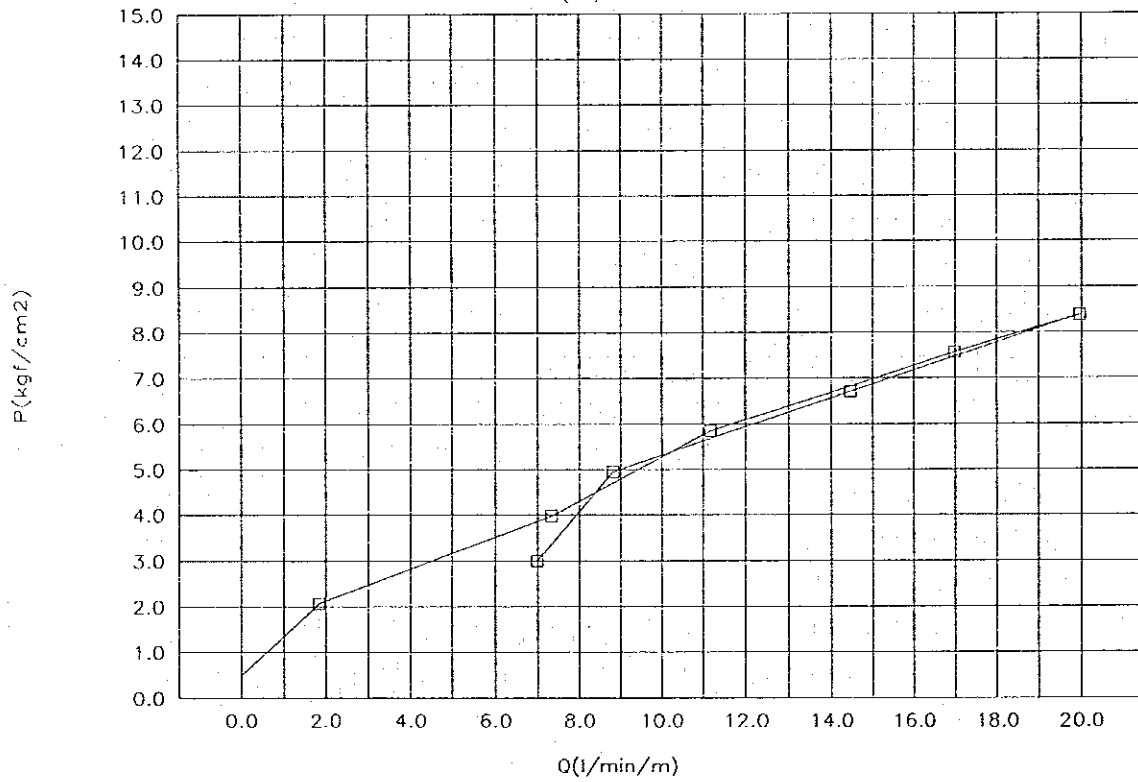
LUGEON TEST

CB-2(1)4.0-10.0m



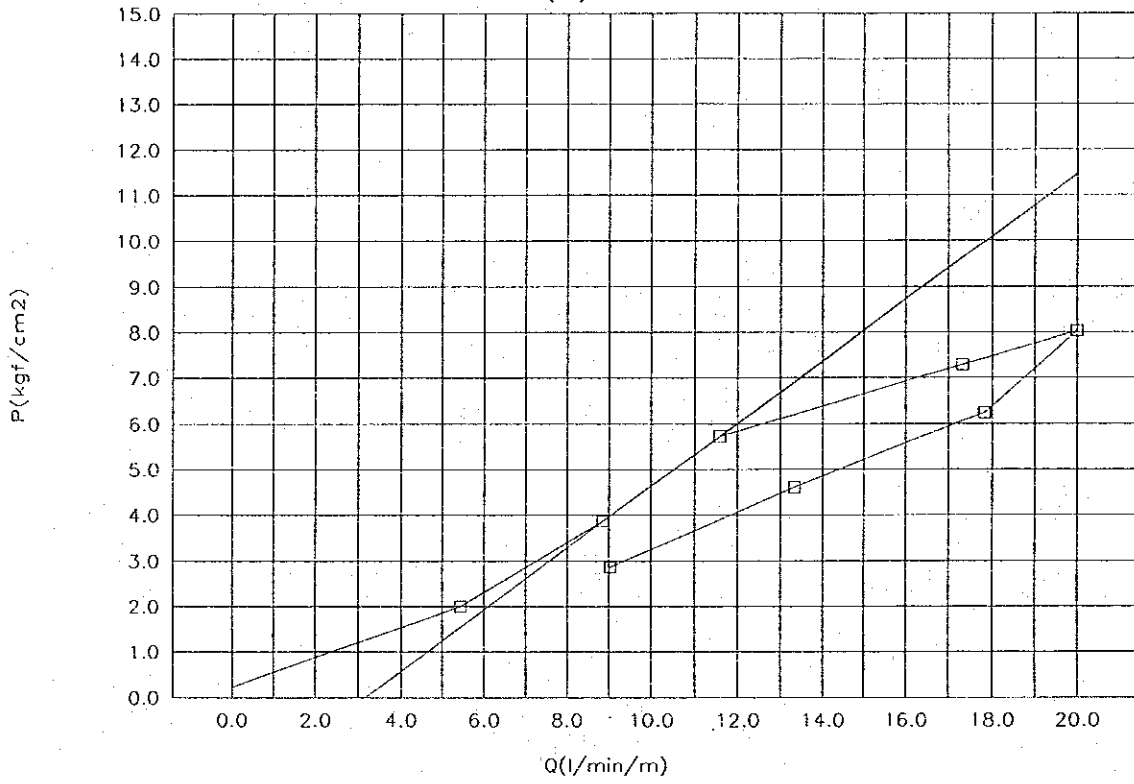
LUGEON TEST

CB-2(2)10.0-15.0m



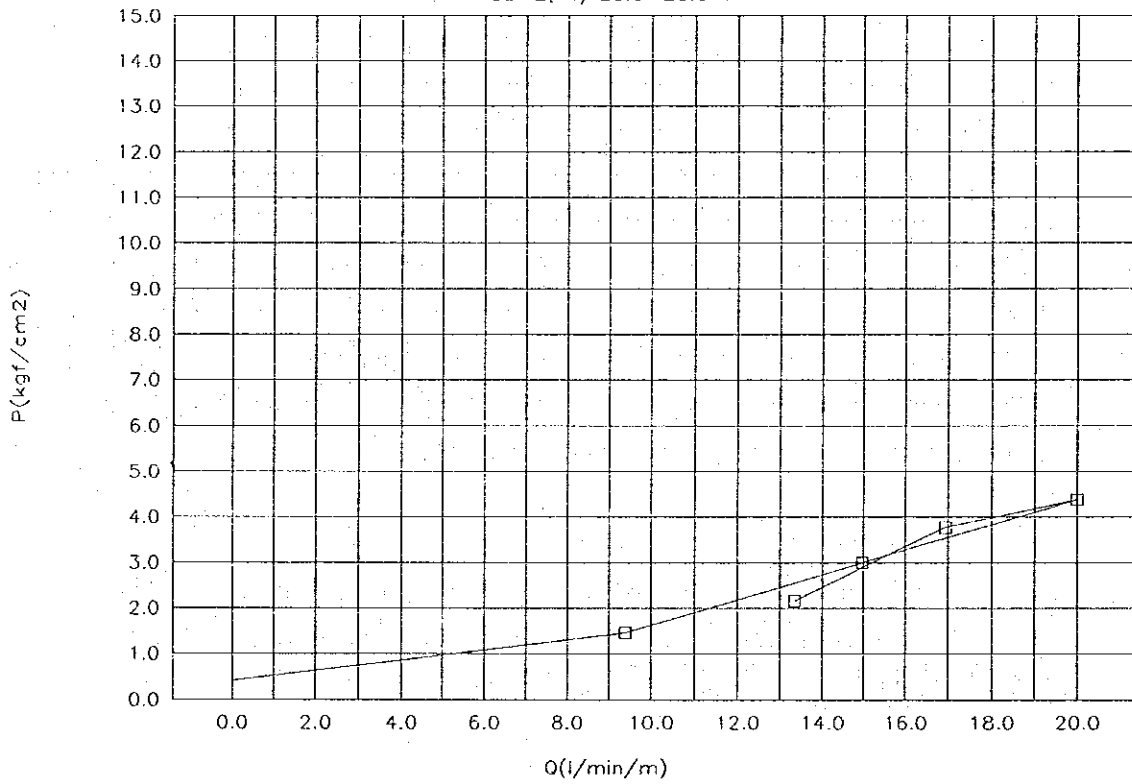
LUGEON TEST

CB-2(3) 15.0-20.0m



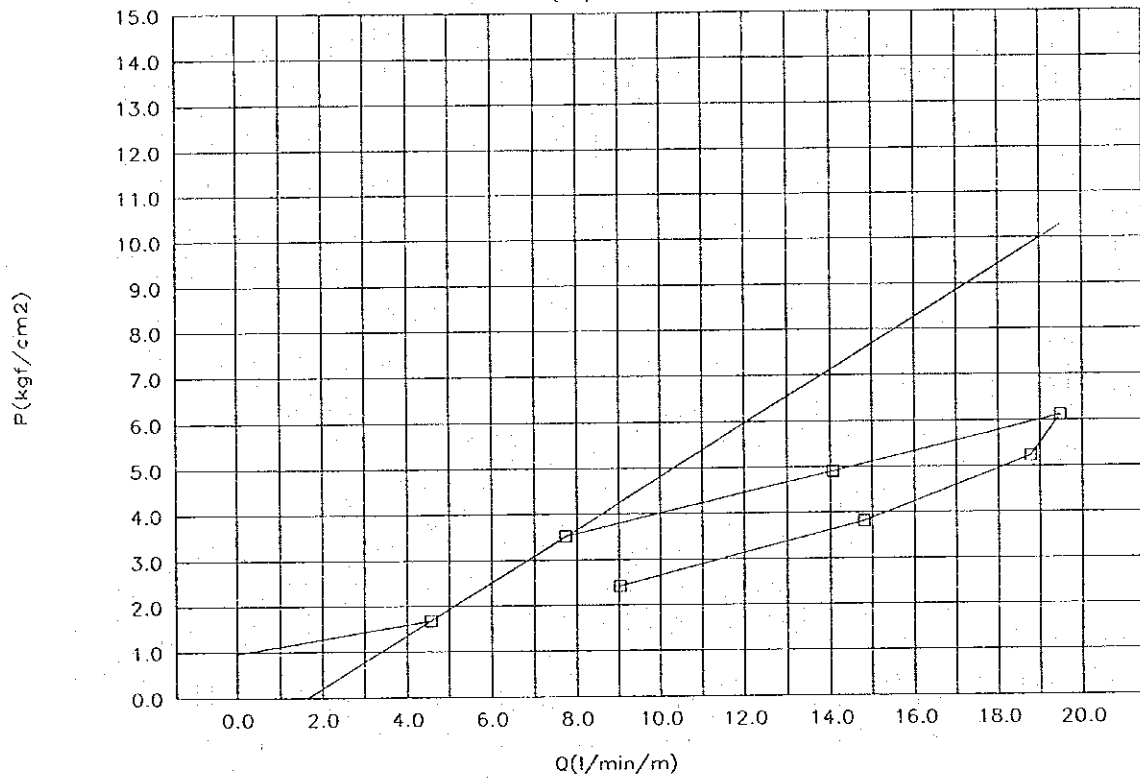
LUGEON TEST

CB-2(4) 20.0-25.0m



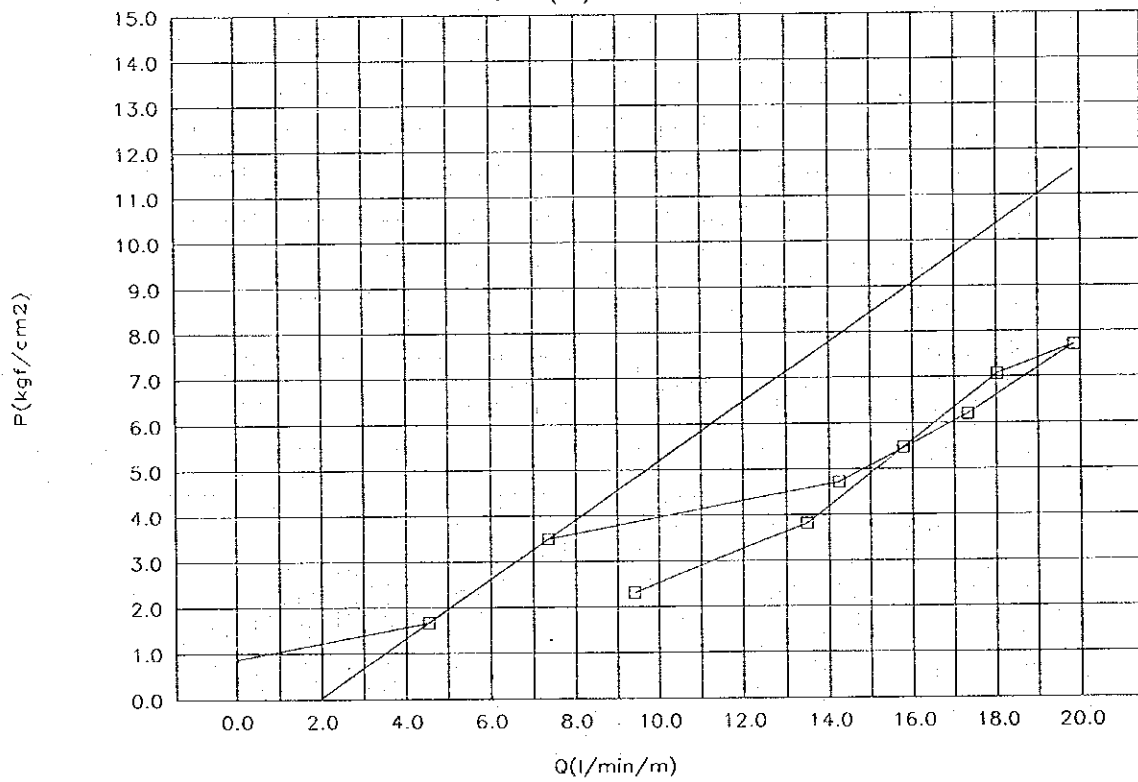
LUGEON TEST

CB-2(5) 25.0-30.0m



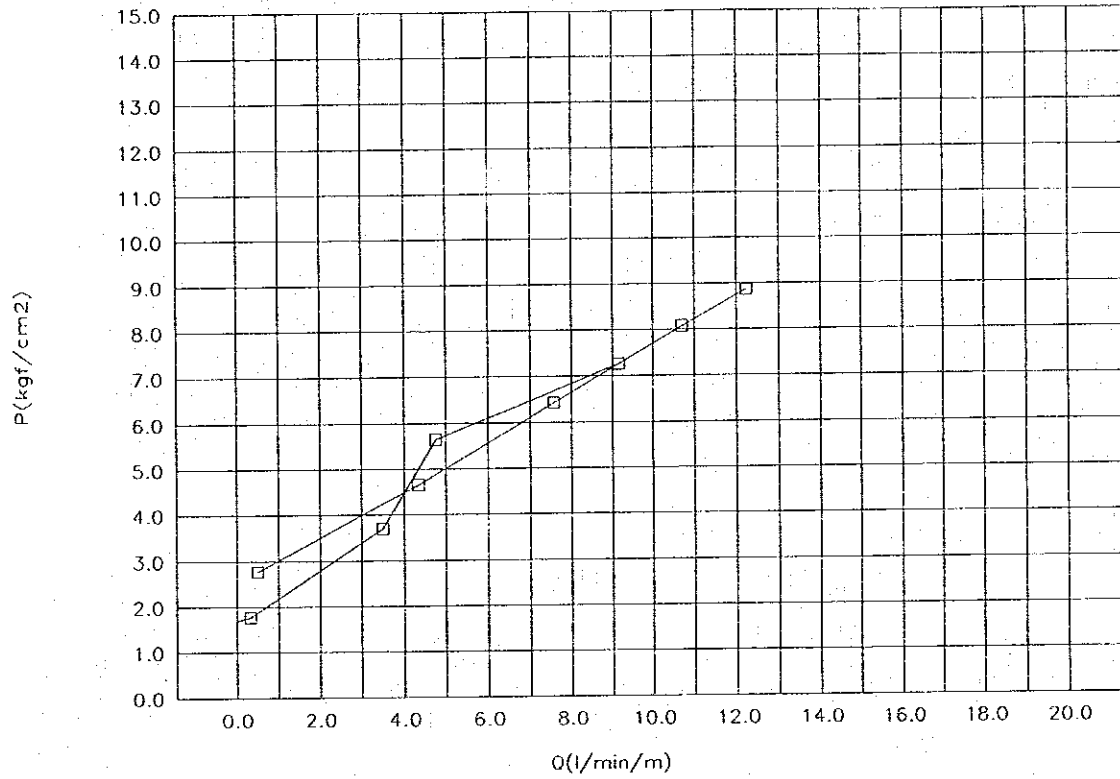
LUGEON TEST

CB-2(6) 30.0-35.0m



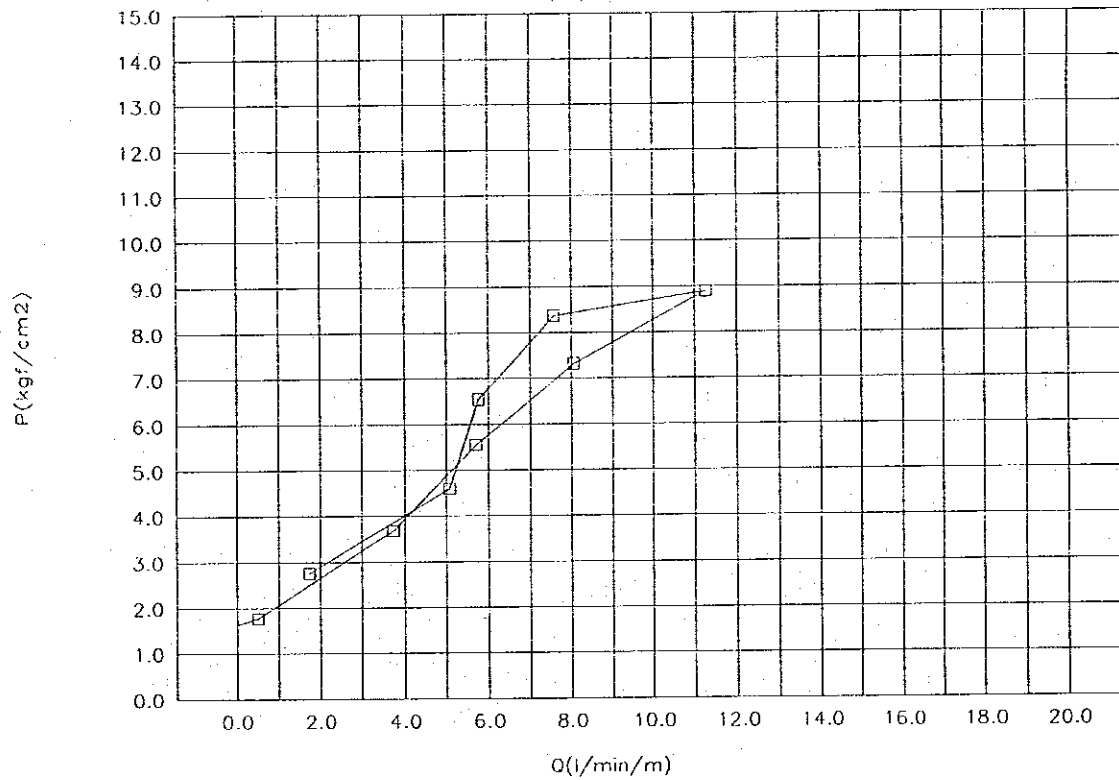
LUGEON TEST

CB-2(7) 35.0-40.0m



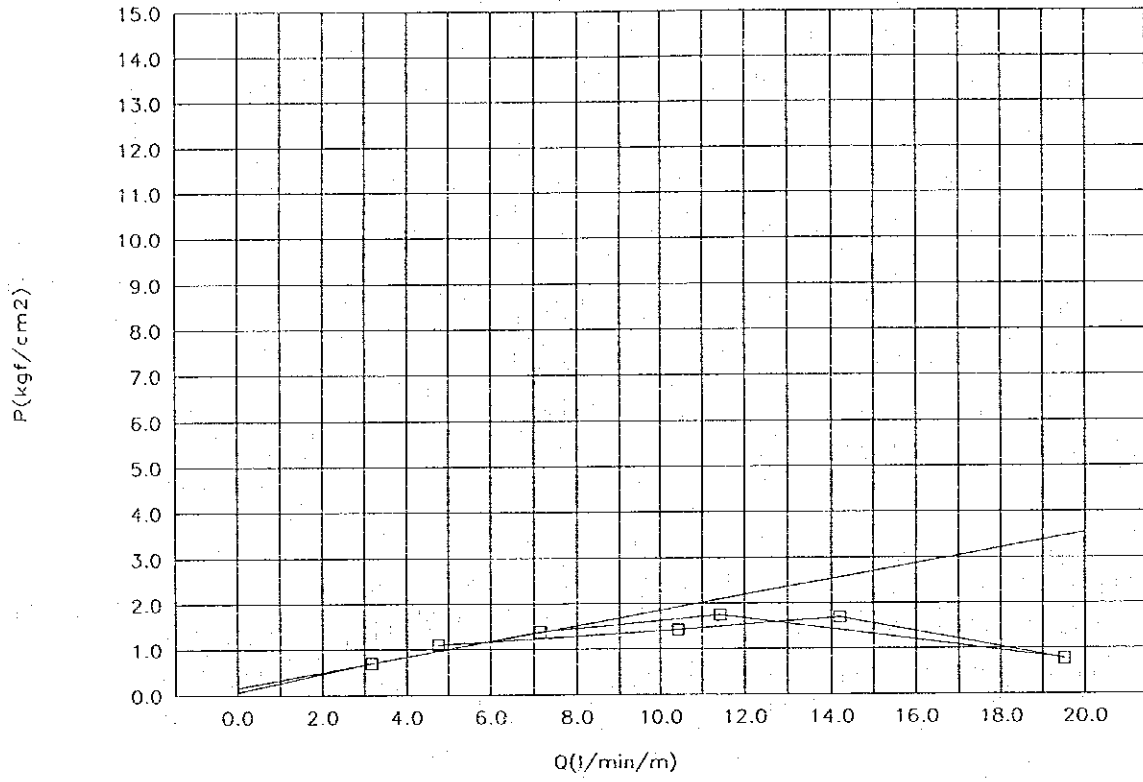
LUGEON TEST

CB-2(8) 45.0-50.0m



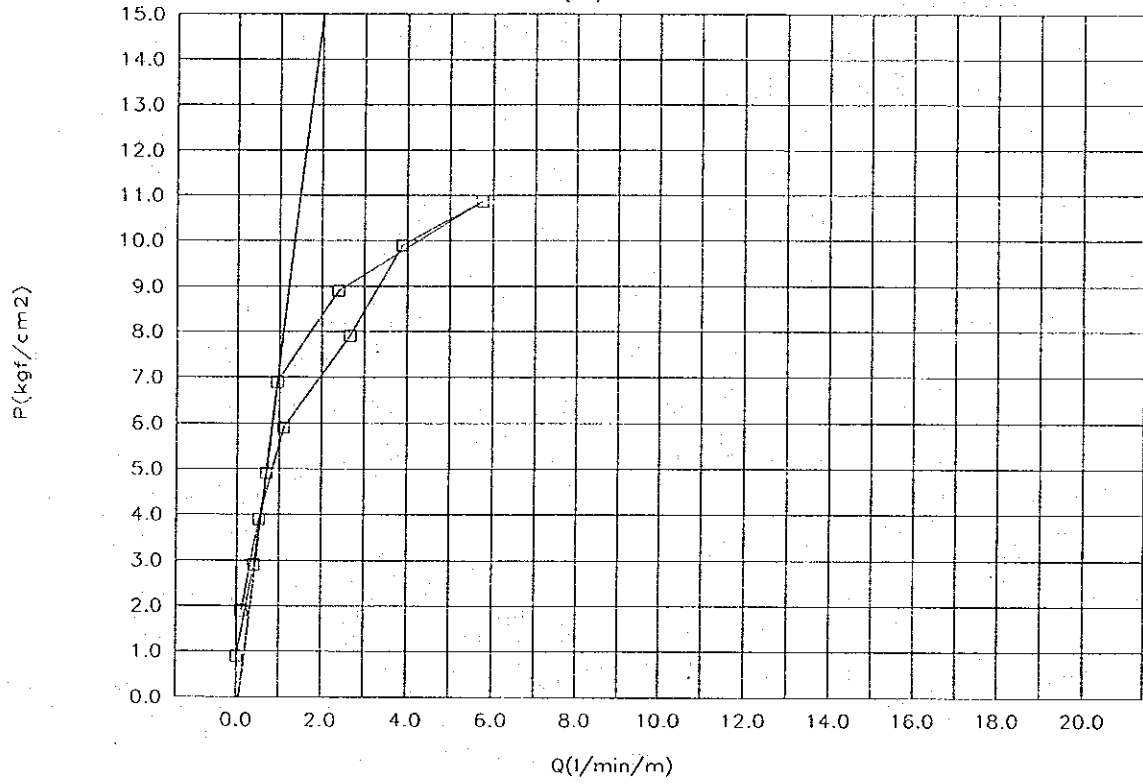
LUGEON TEST

CB-2(9) 45.0-50.0m



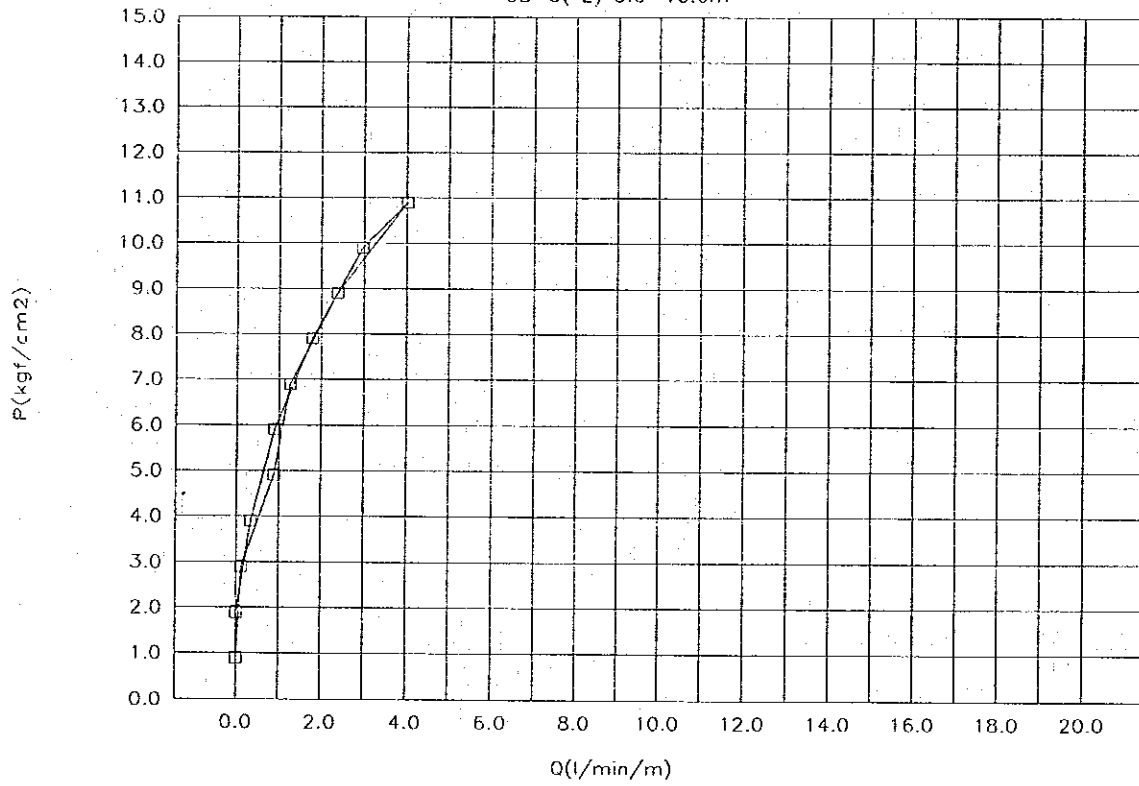
LUGEON TEST

CB-3(1) 3.0-10.0m



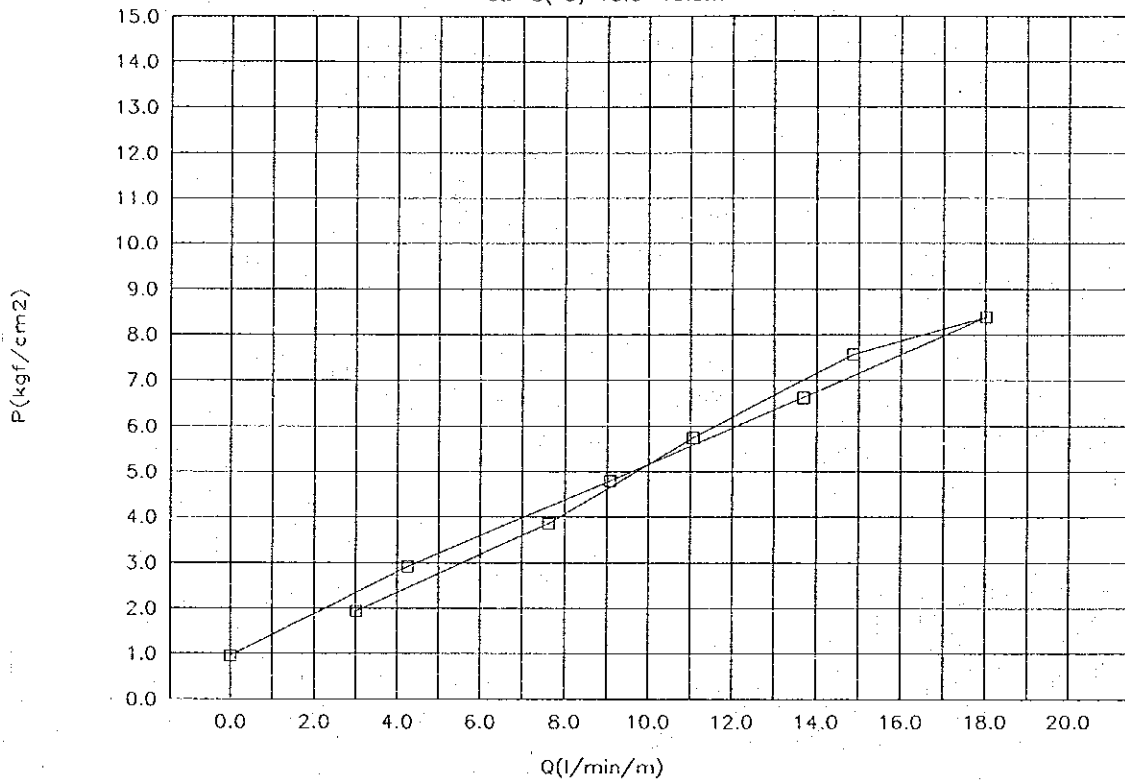
LUGEON TEST

CB-3(2) 5.0-10.0m



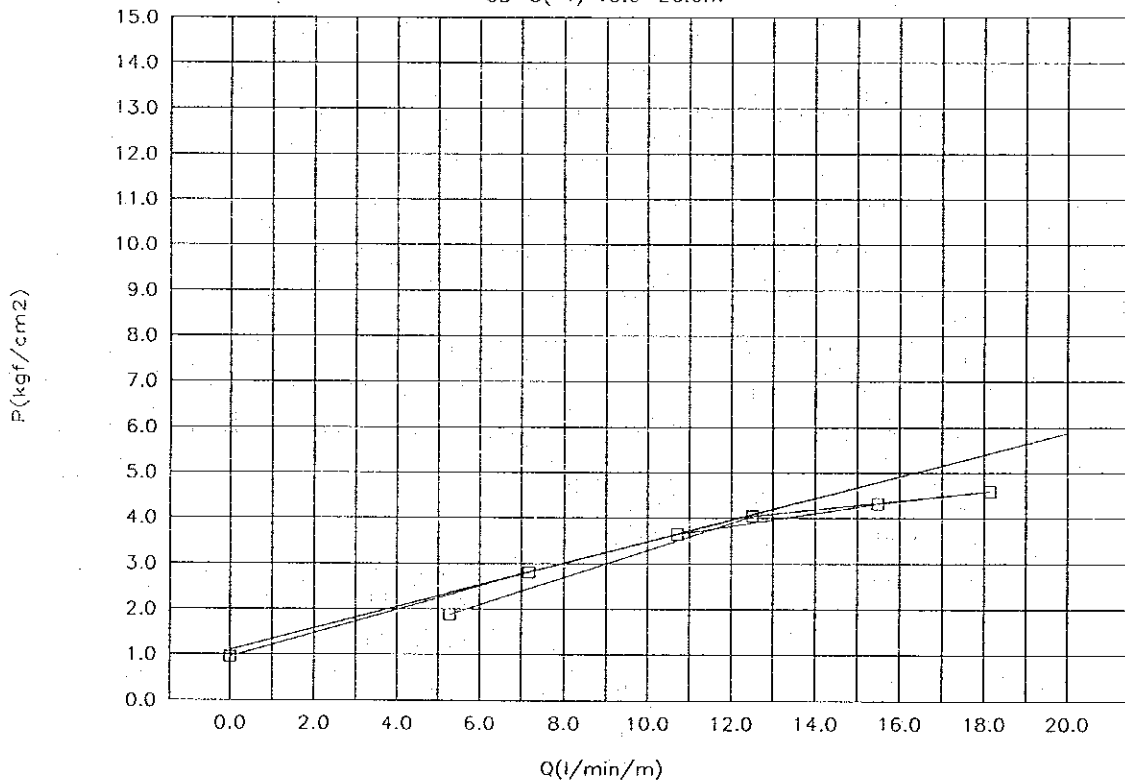
LUGEON TEST

CB-3(3) 10.0-15.0m



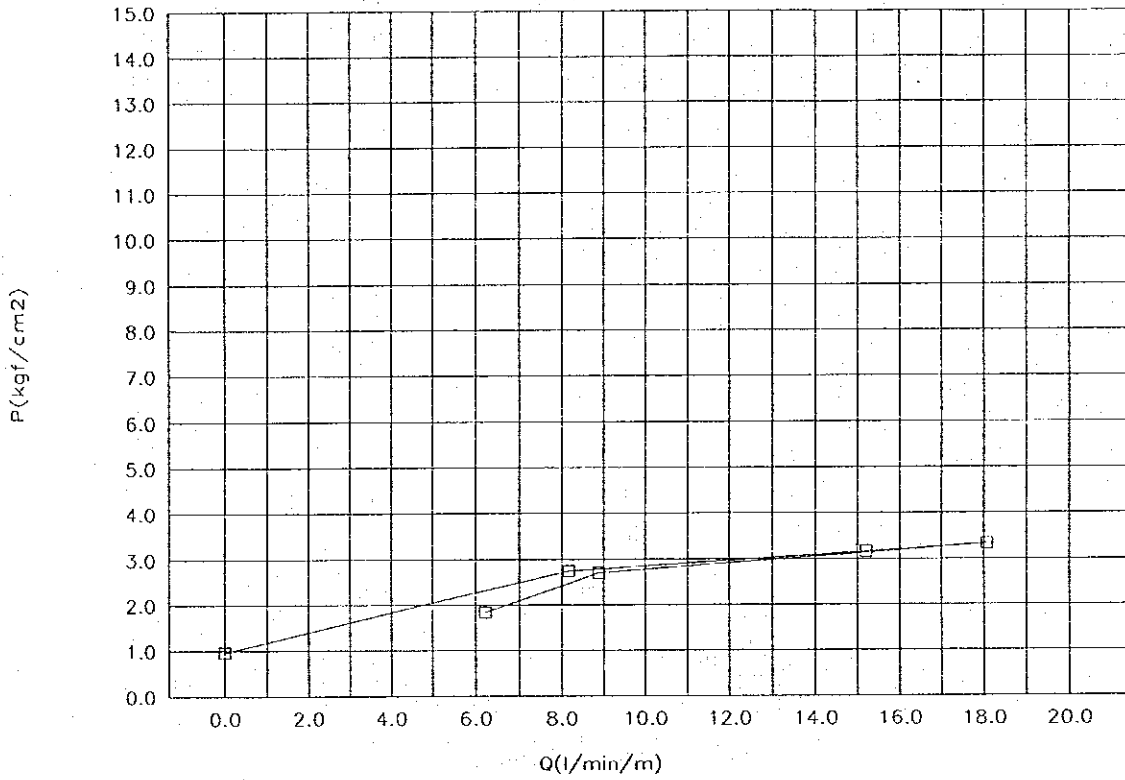
LUGEON TEST

CB-3(4) 15.0-20.0m



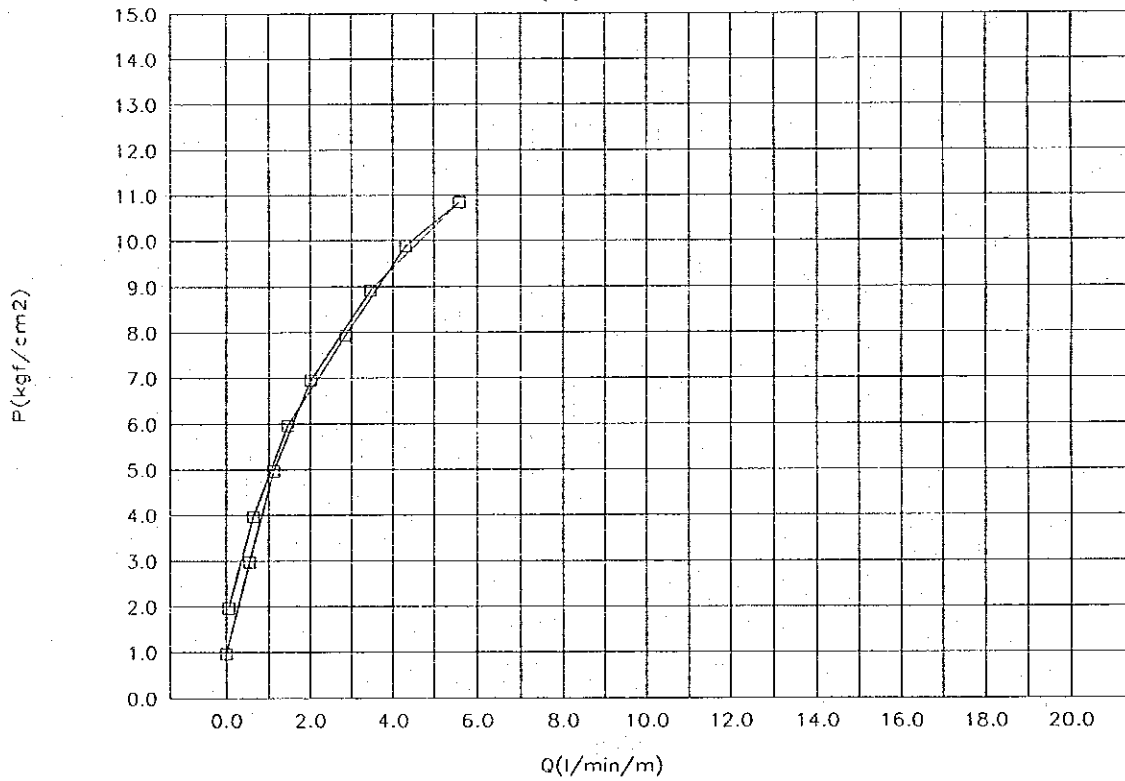
LUGEON TEST

CB-3(5) 20.0-25.0m



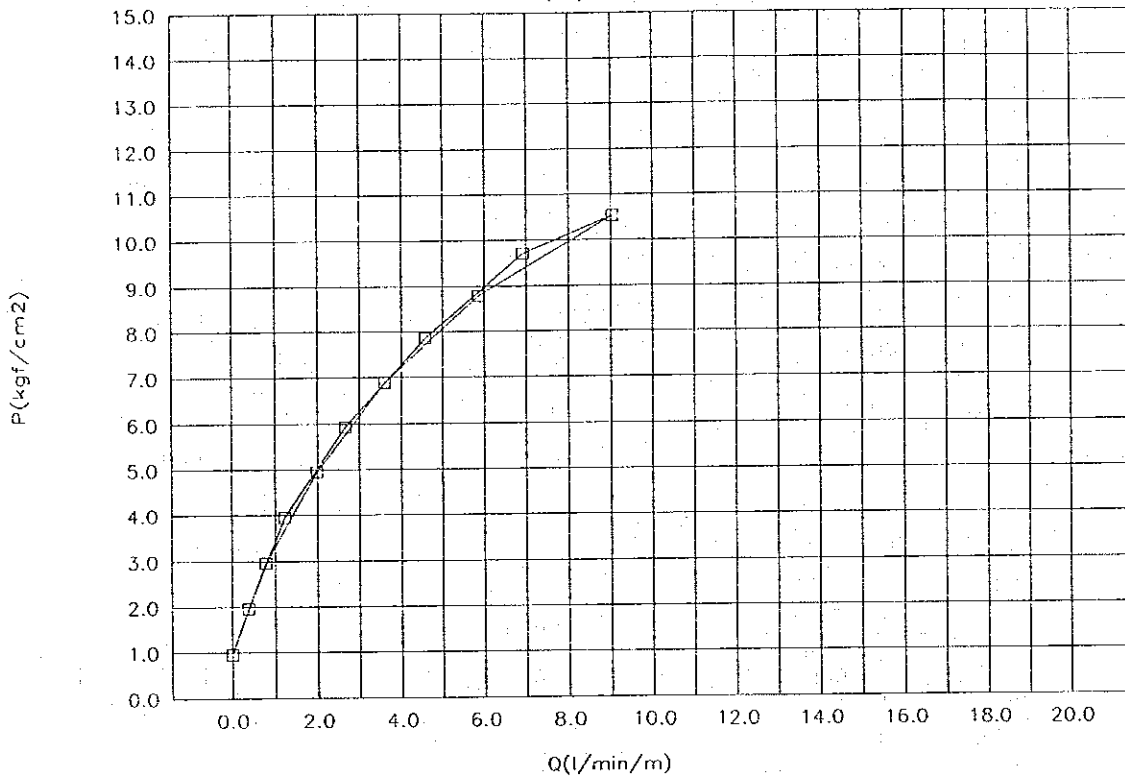
LUGEON TEST

CB-3(6) 25.0-30.0m



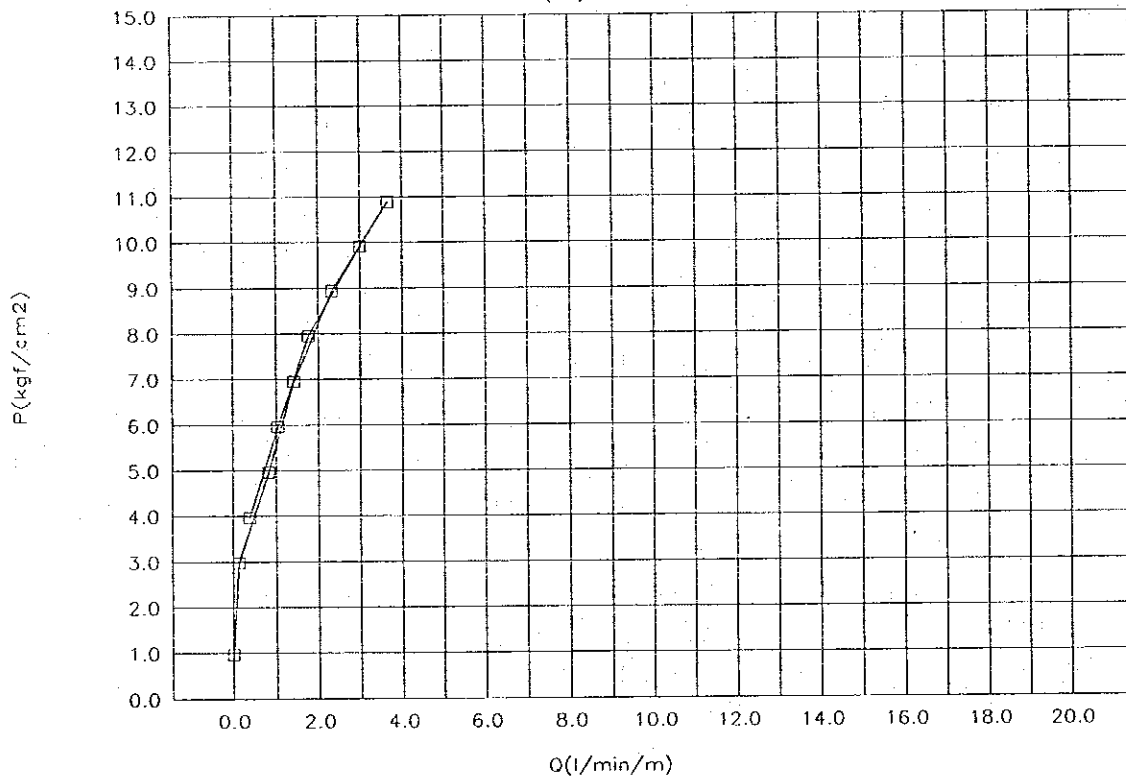
LUGEON TEST

CB-3(7) 30.0-35.0m



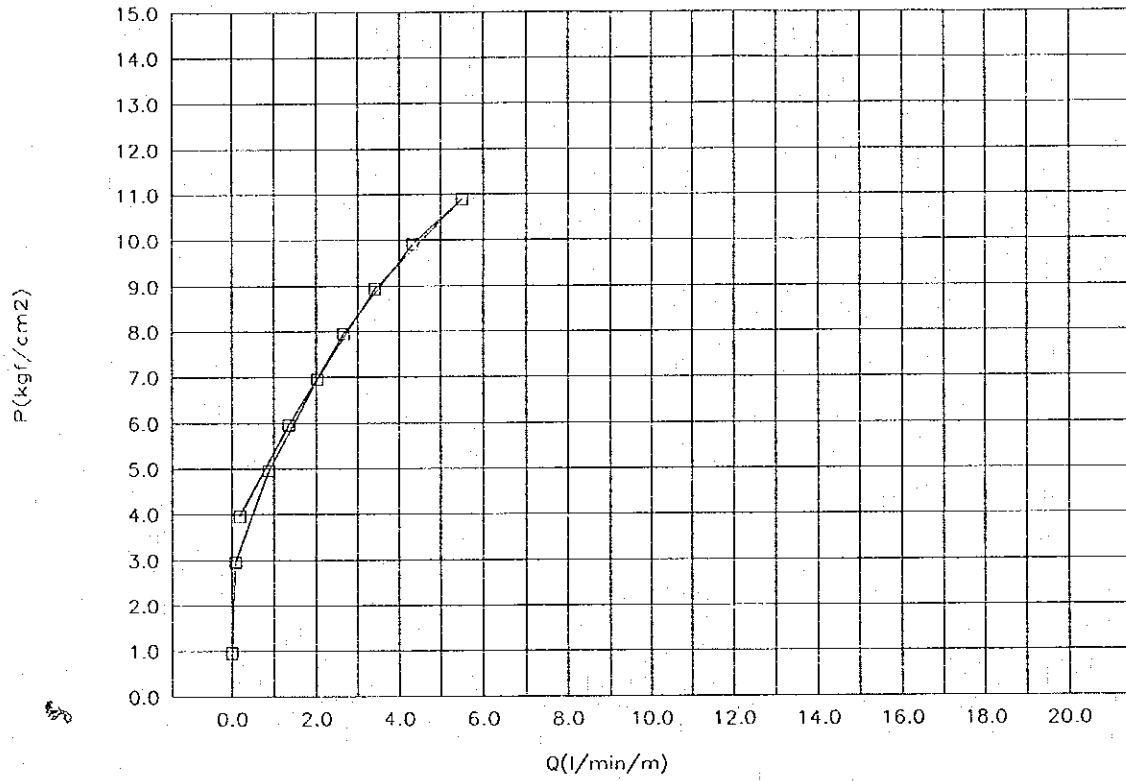
LUGEON TEST

CB-3(8) 35.0-40.0m



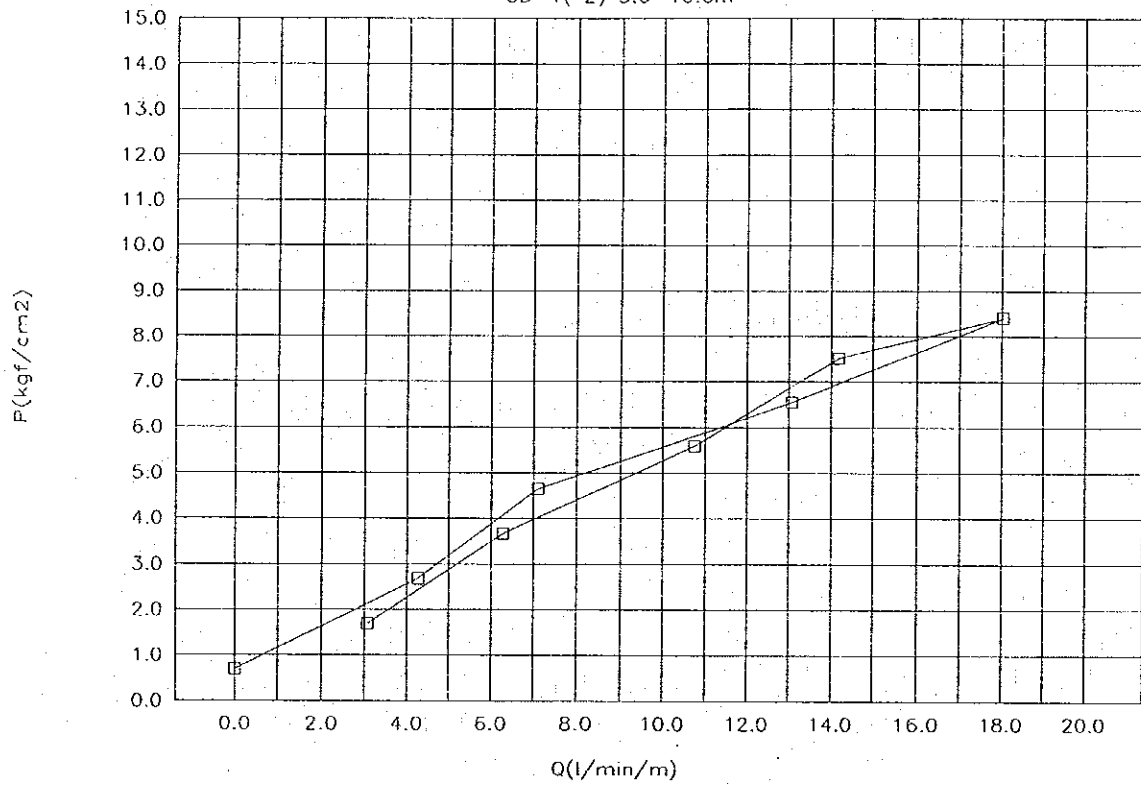
LUGEON TEST

CB-3(9) 40.0-43.0m



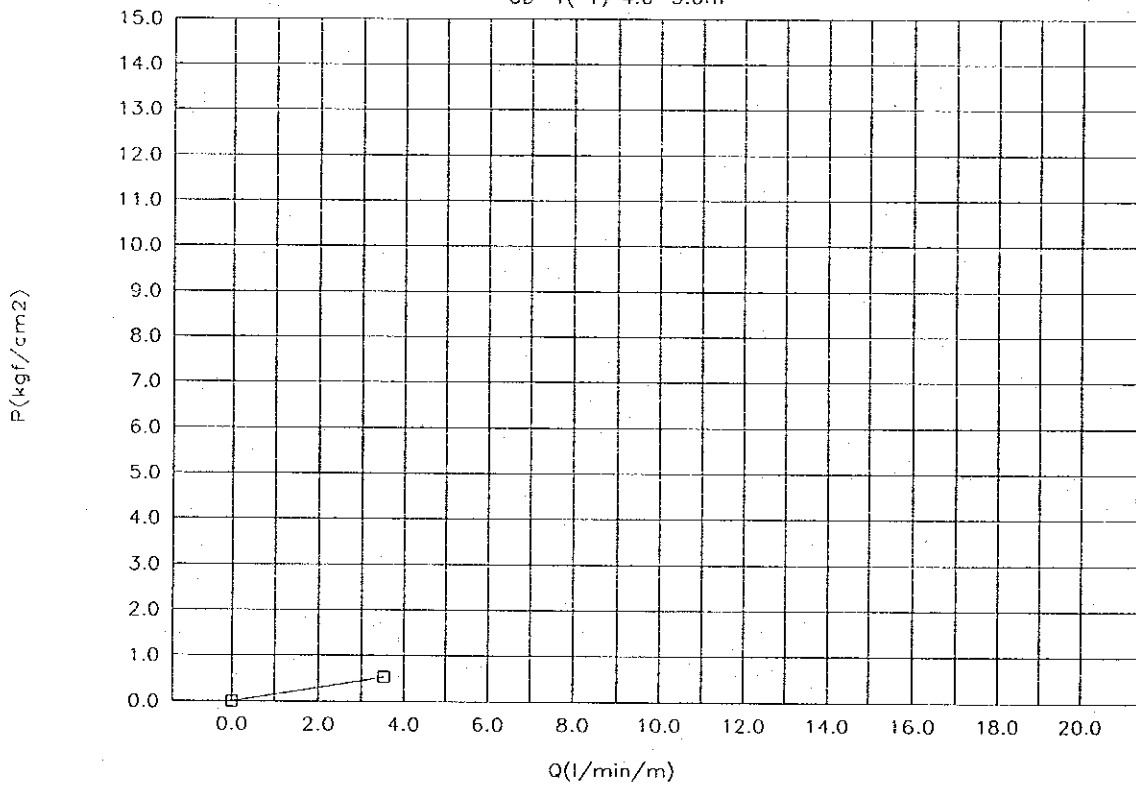
LUGEON TEST

CD-1(2) 5.0-10.0m



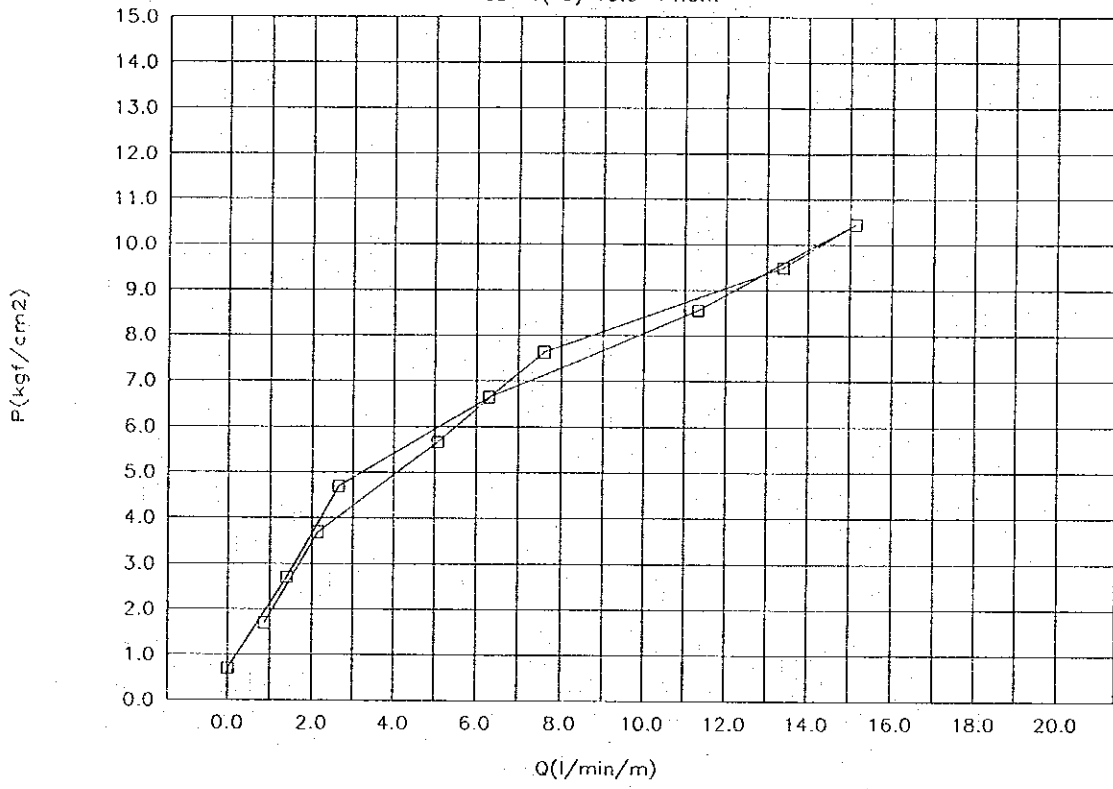
LUGEON TEST

CD-1(1) 4.0-5.0m



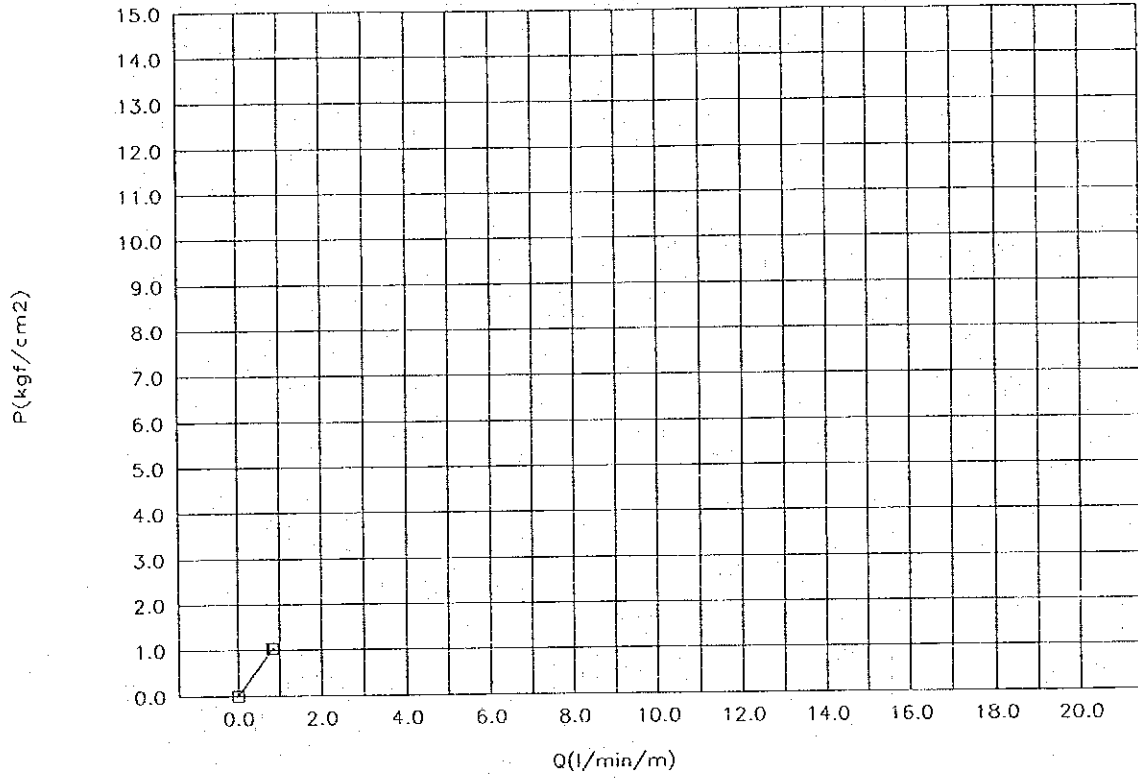
LUGEON TEST

CD-1(:3) 10.0-14.0m



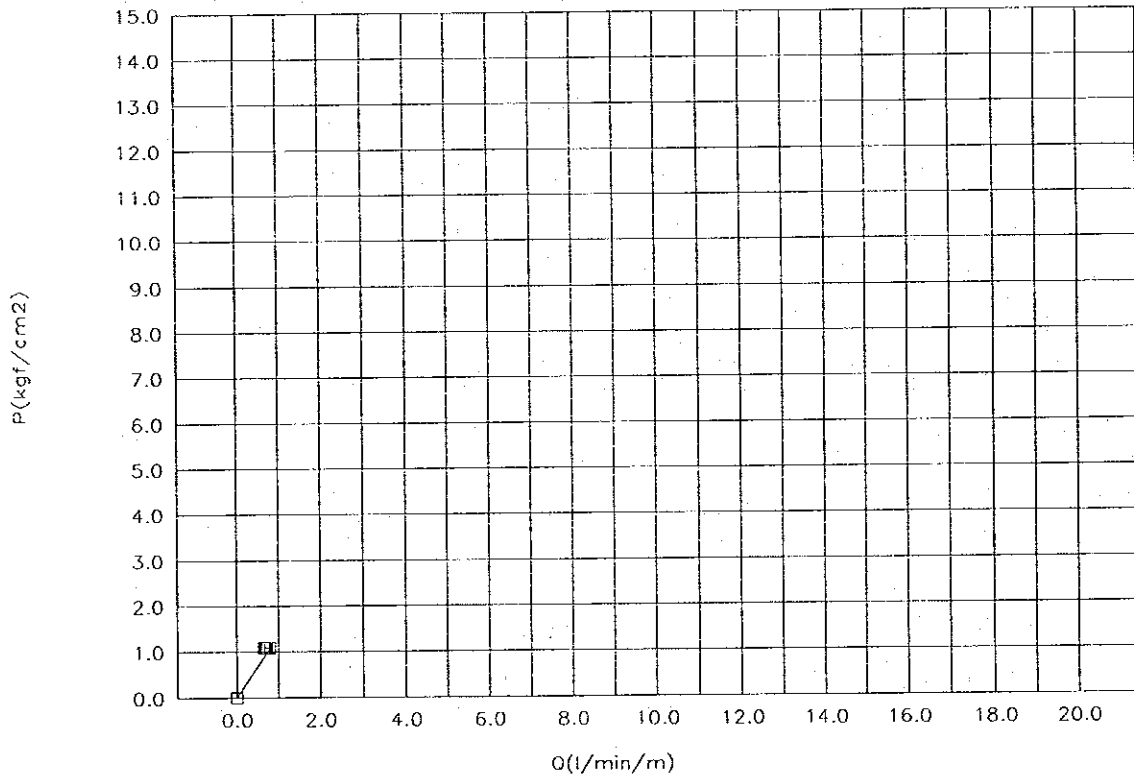
CONSTANT HEAD TEST

CD-2(1)1.0-5.0m



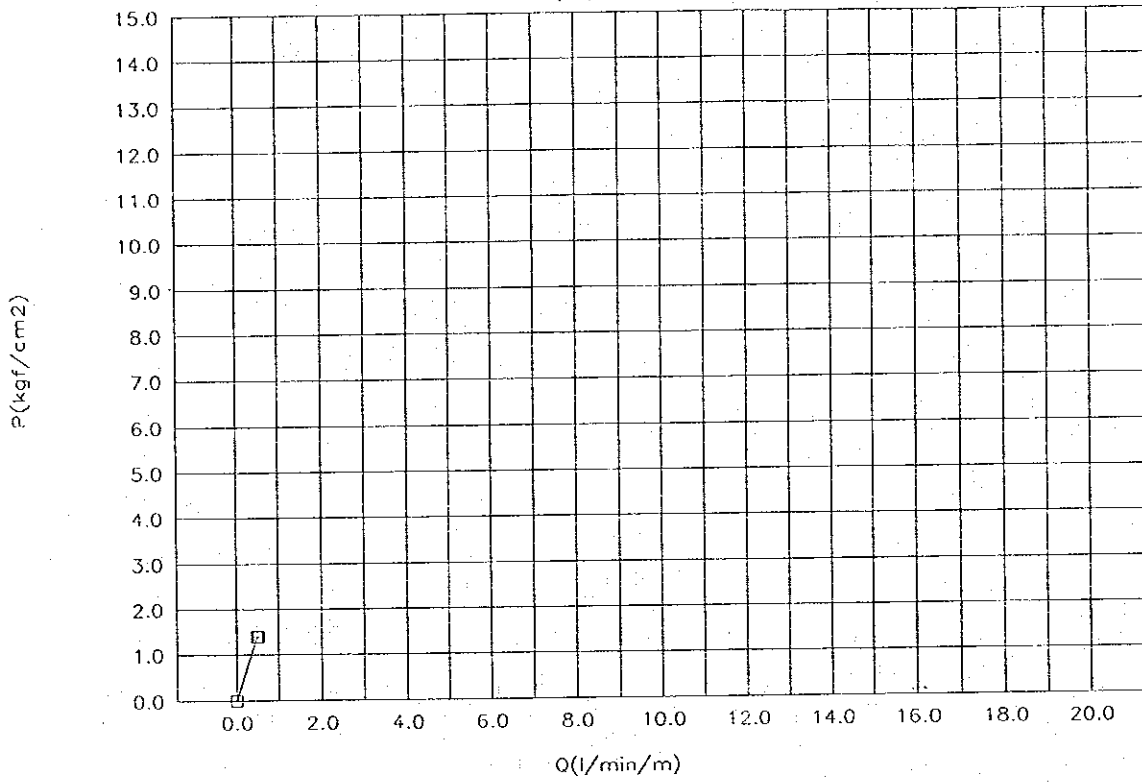
CONSTANT HEAD TEST

CD-2(2)5.0-10.0m



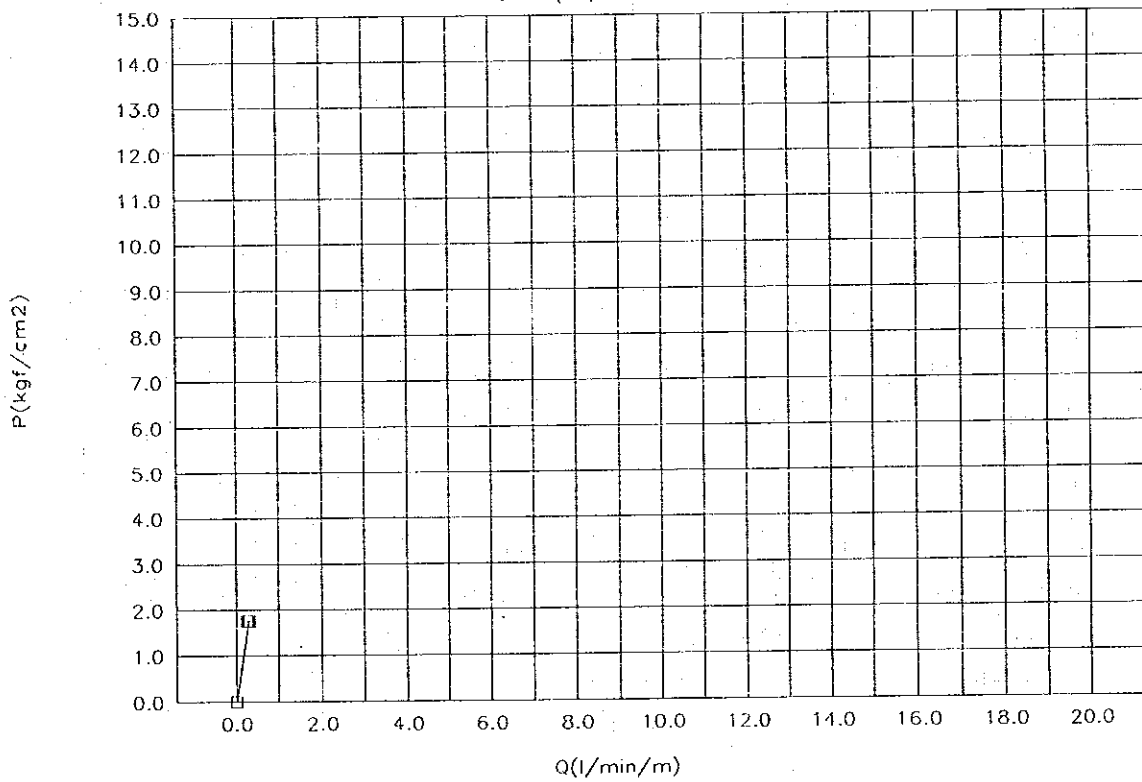
CONSTANT HEAD TEST

CD-2(3)10.0-15.0m



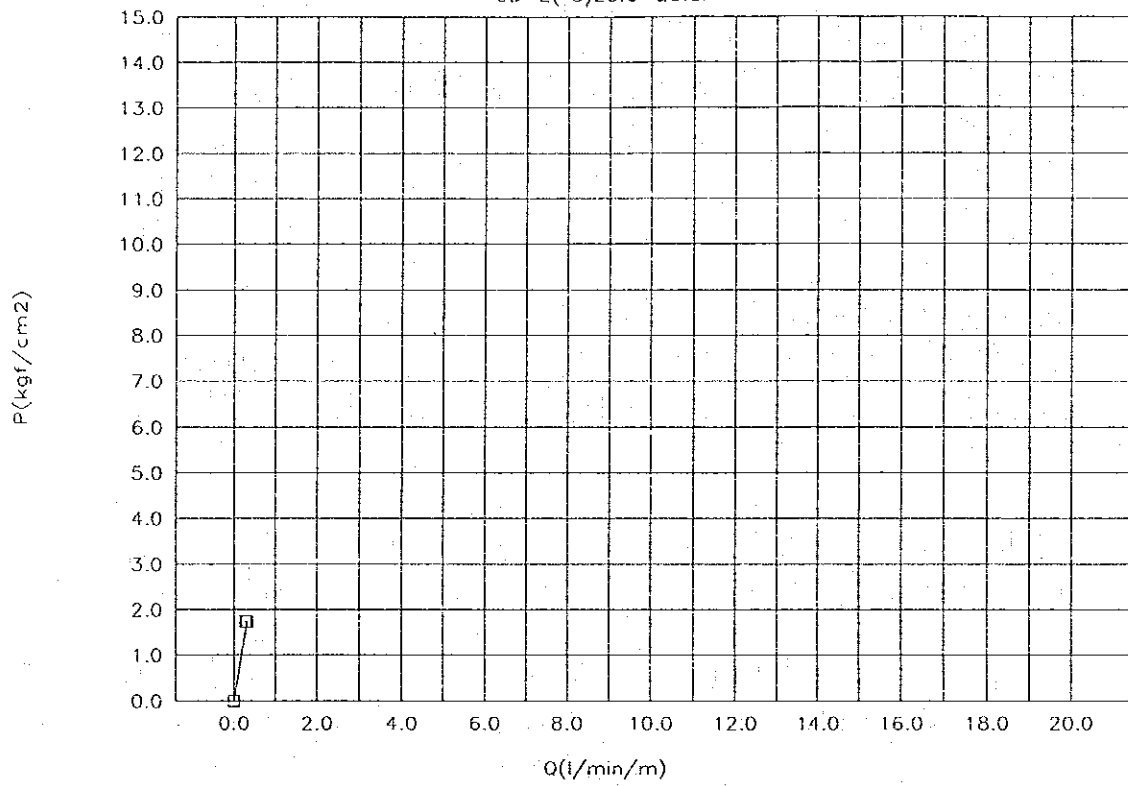
CONSTANT HEAD TEST

CD-2(4)15.0-20.0m



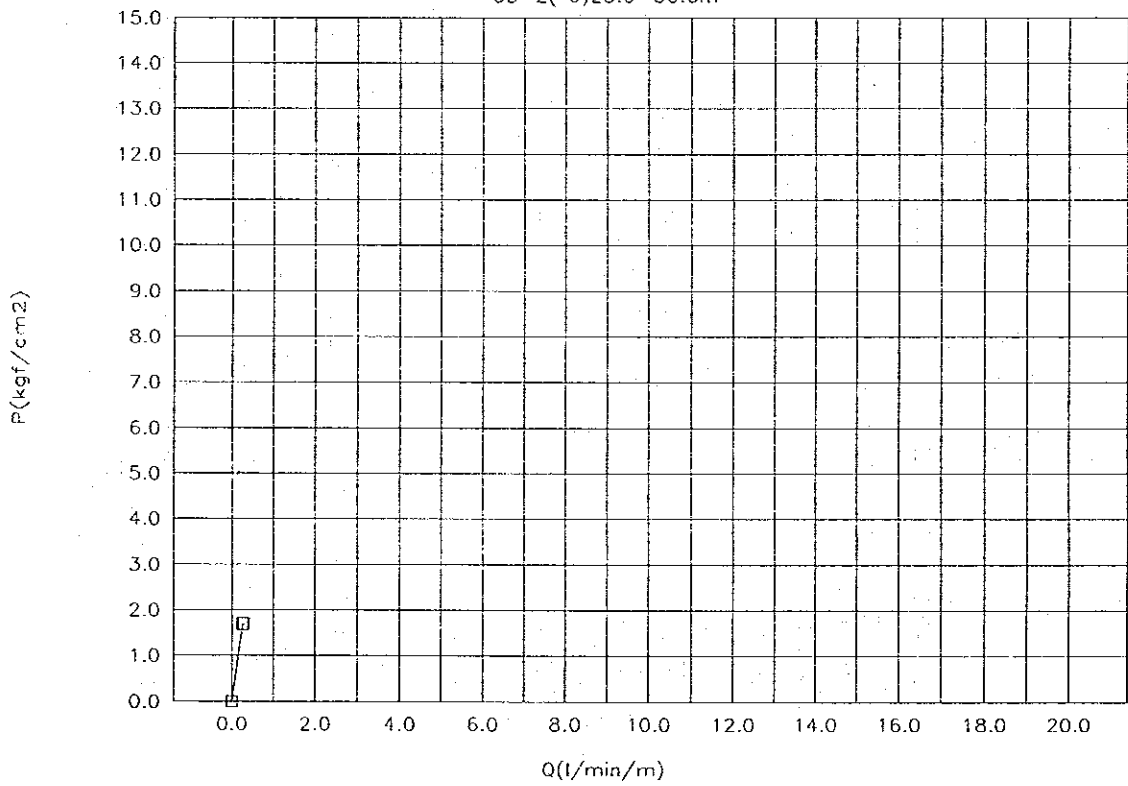
CONSTANT HEAD TEST

CD-2(5)20.0-25.0m



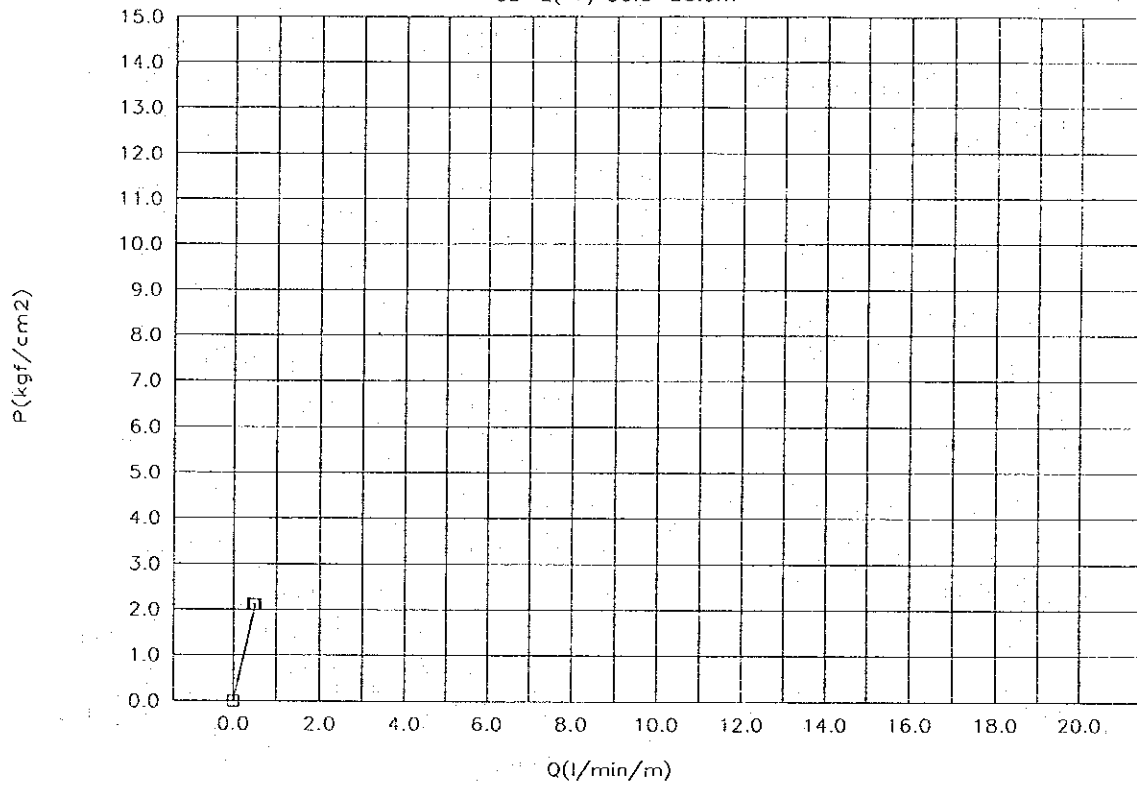
CONSTANT HEAD TEST

CD-2(6)25.0-30.0m



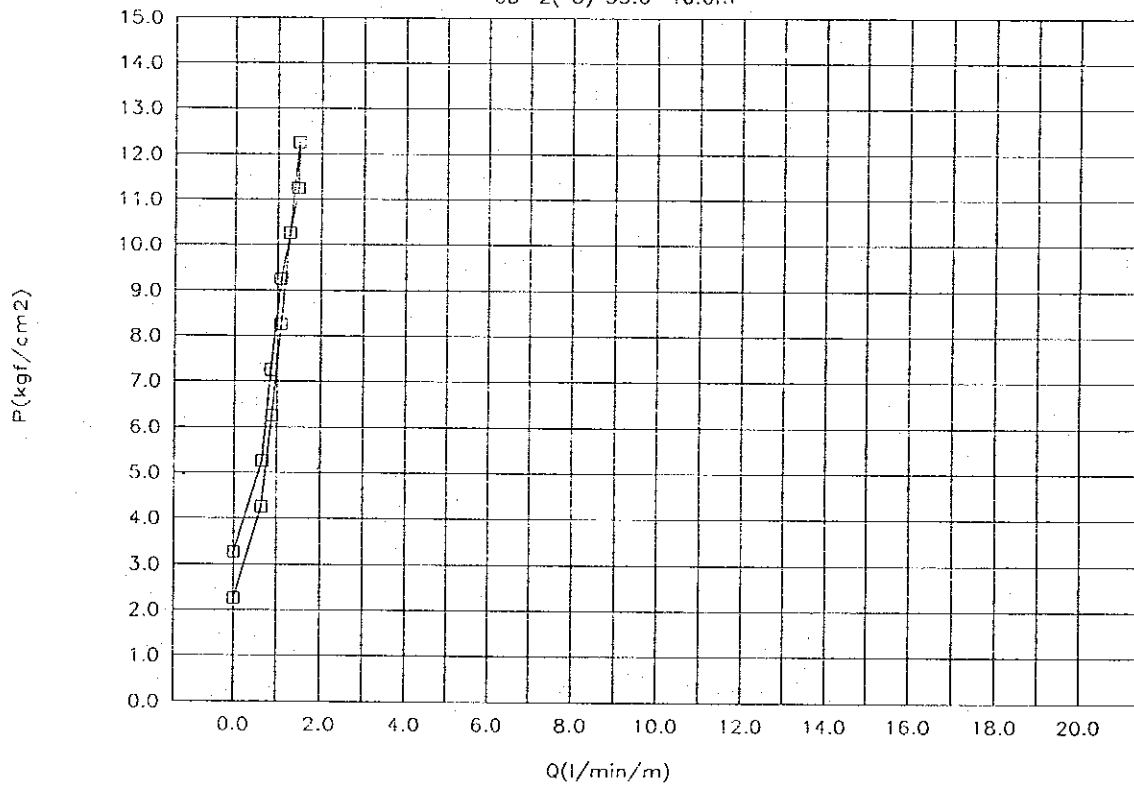
CONSTANT HEAD TEST

CD-2(7) 30.0-35.0m



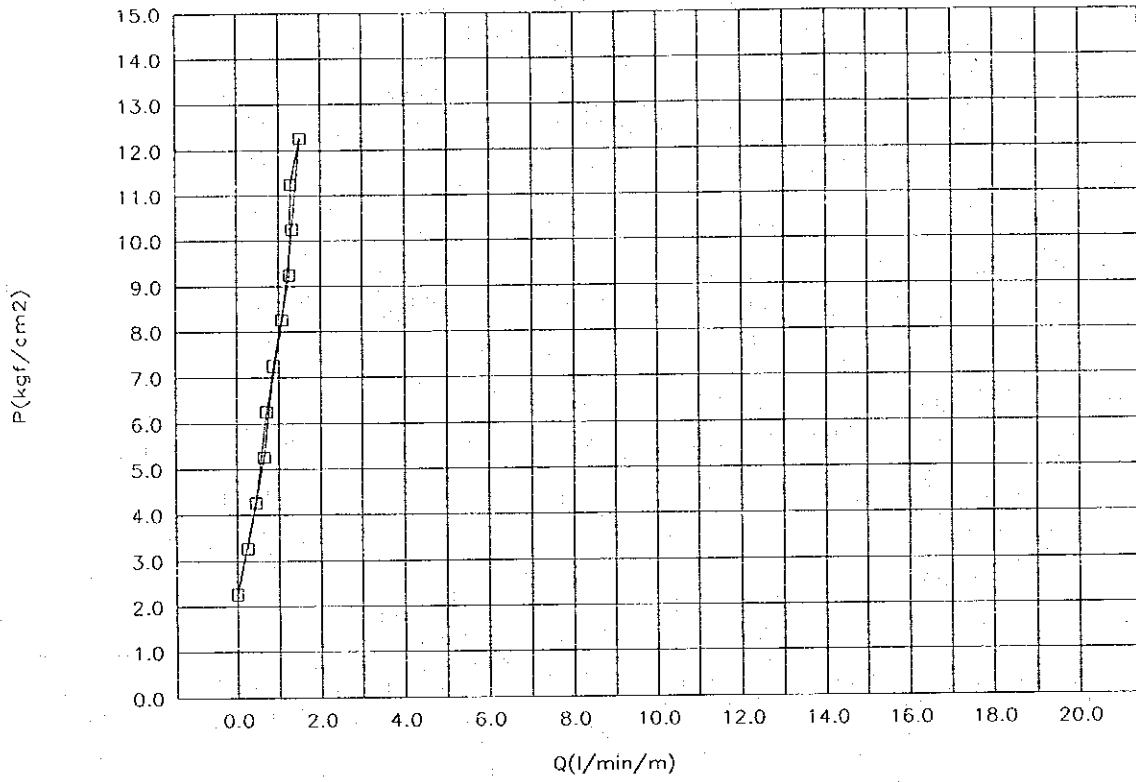
CONSTANT HEAD TEST

CD-2(8) 35.0-40.0m



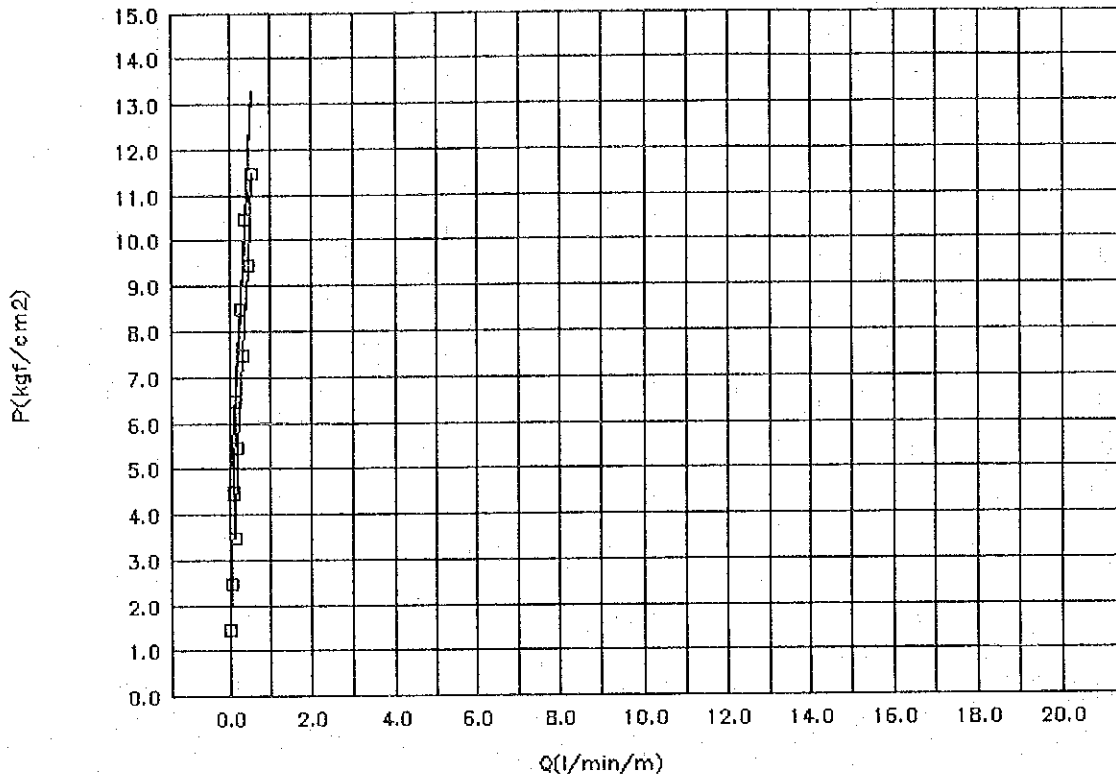
CONSTANT HEAD TEST

CD-2(9) 40.0-45.0m



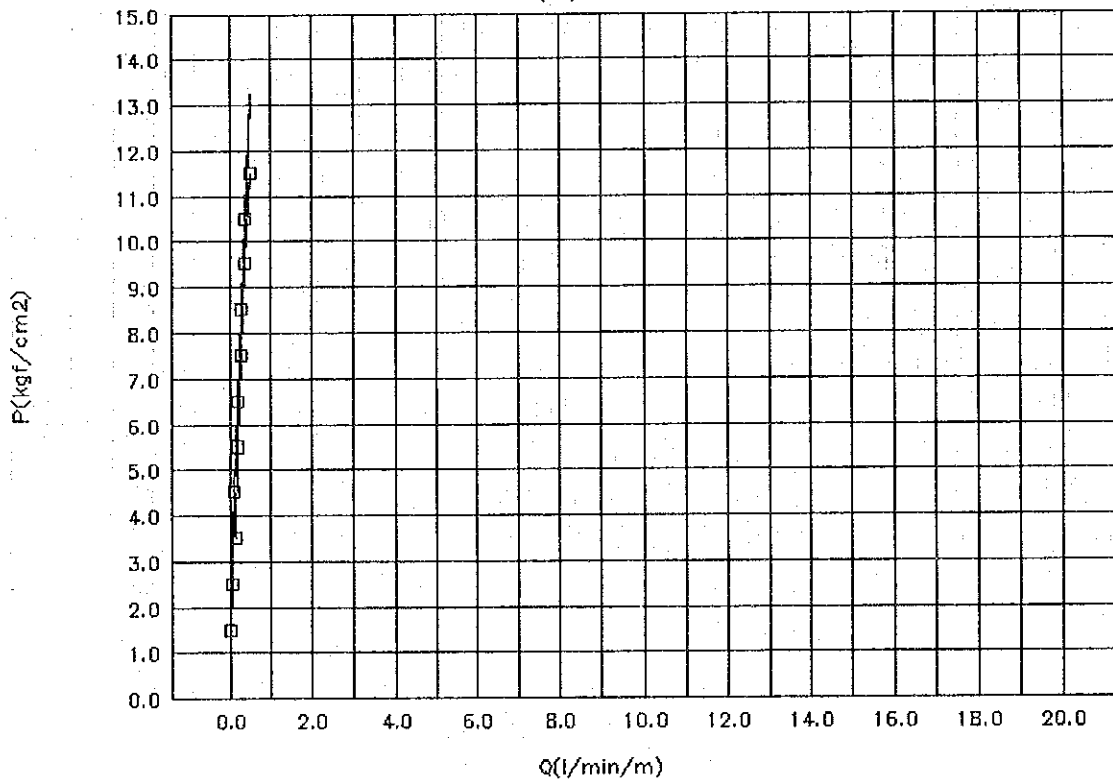
LUGEON TEST

CD-3(3) 10.0-15.0m



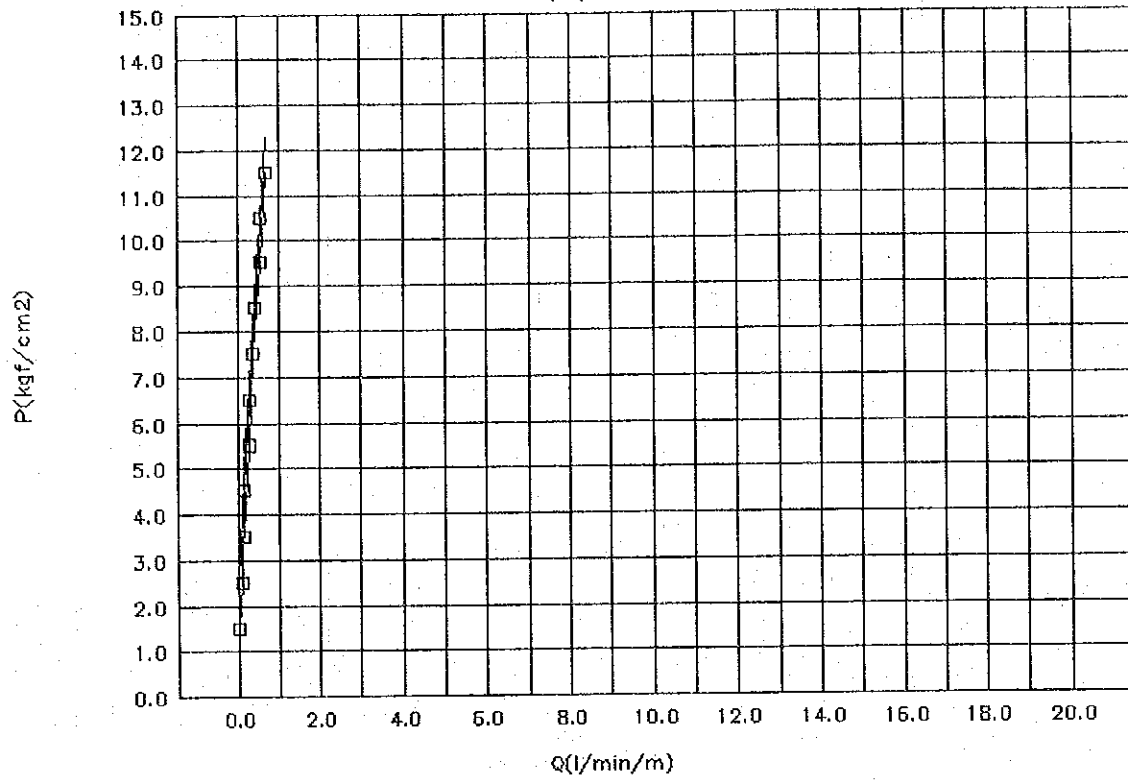
LUGEON TEST

CD-3(4) 15.0-20.0m



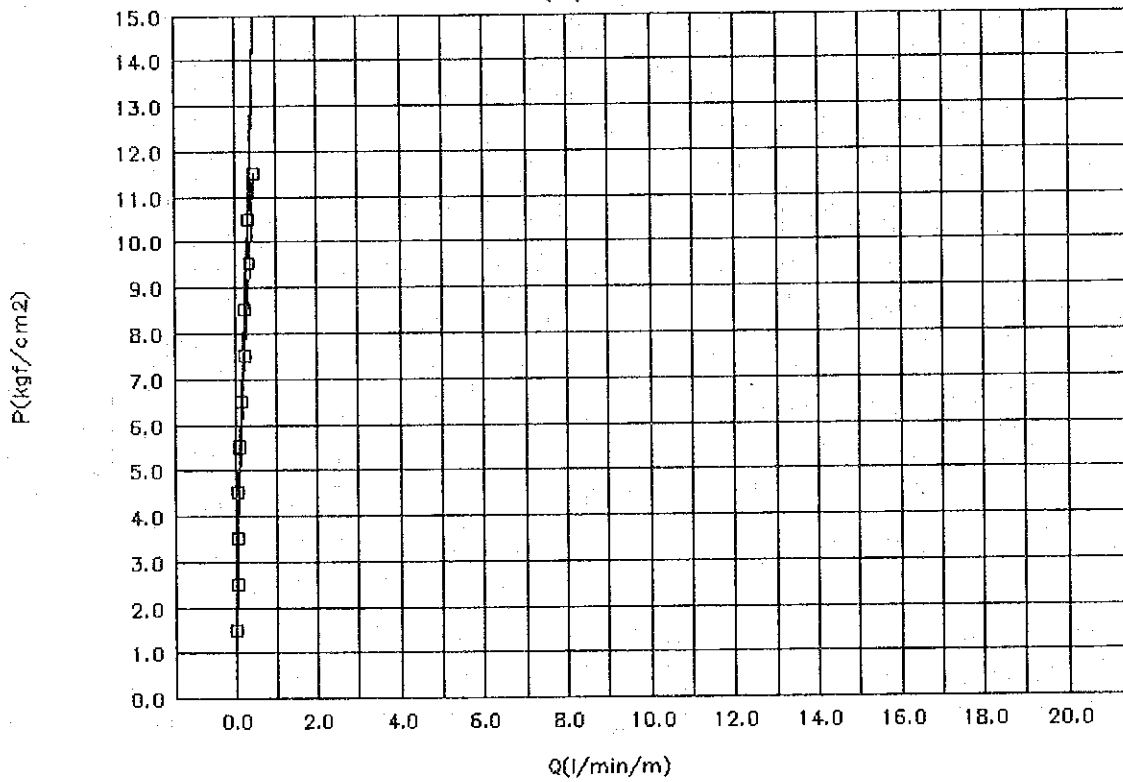
LUGEON TEST

CD-3(5) 20.0-25.0m



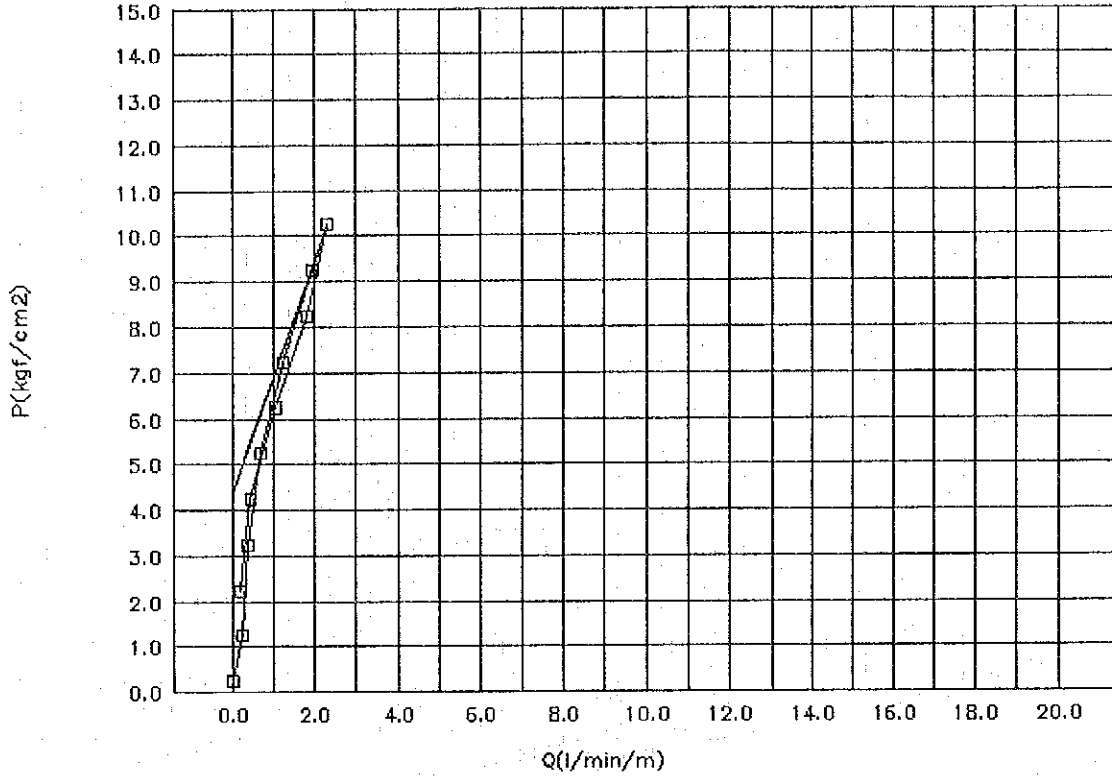
LUGEON TEST

CD-3(6) 25.0-30.0m



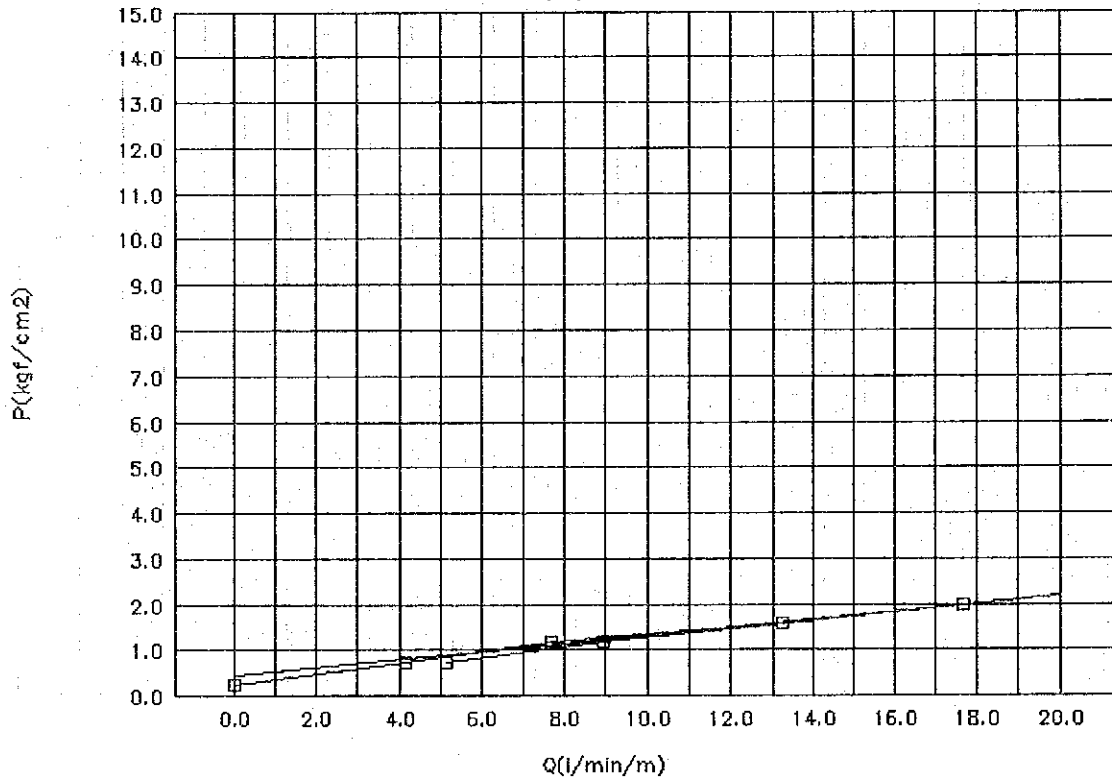
LUGEON TEST

CD-4(1) 1.5- 5.0m



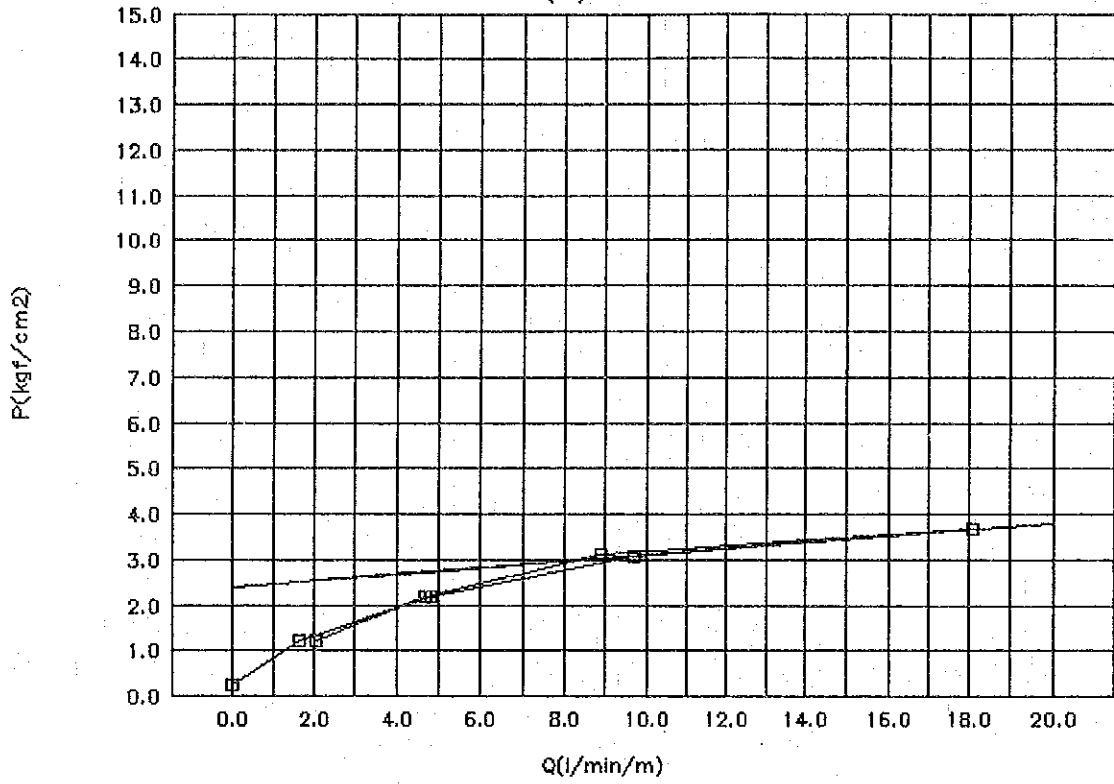
LUGEON TEST

CD-4(2) 5.0-10.0m



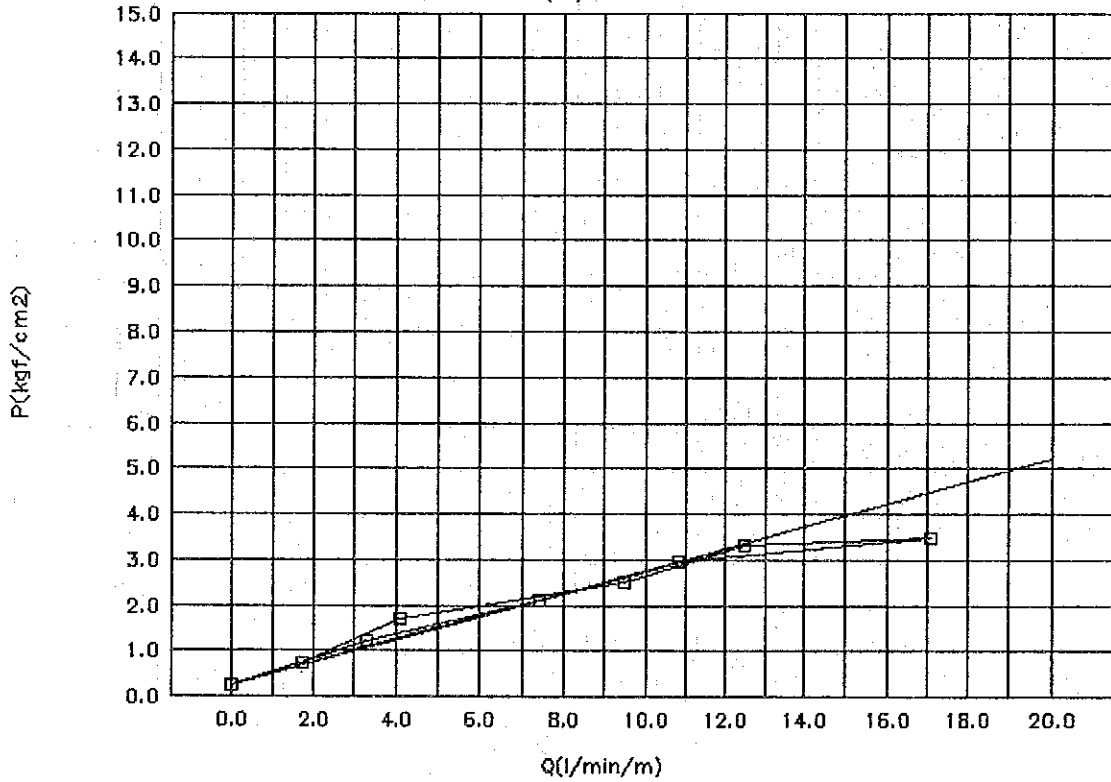
LUGEON TEST

CD-4(3) 10.0-15.0m



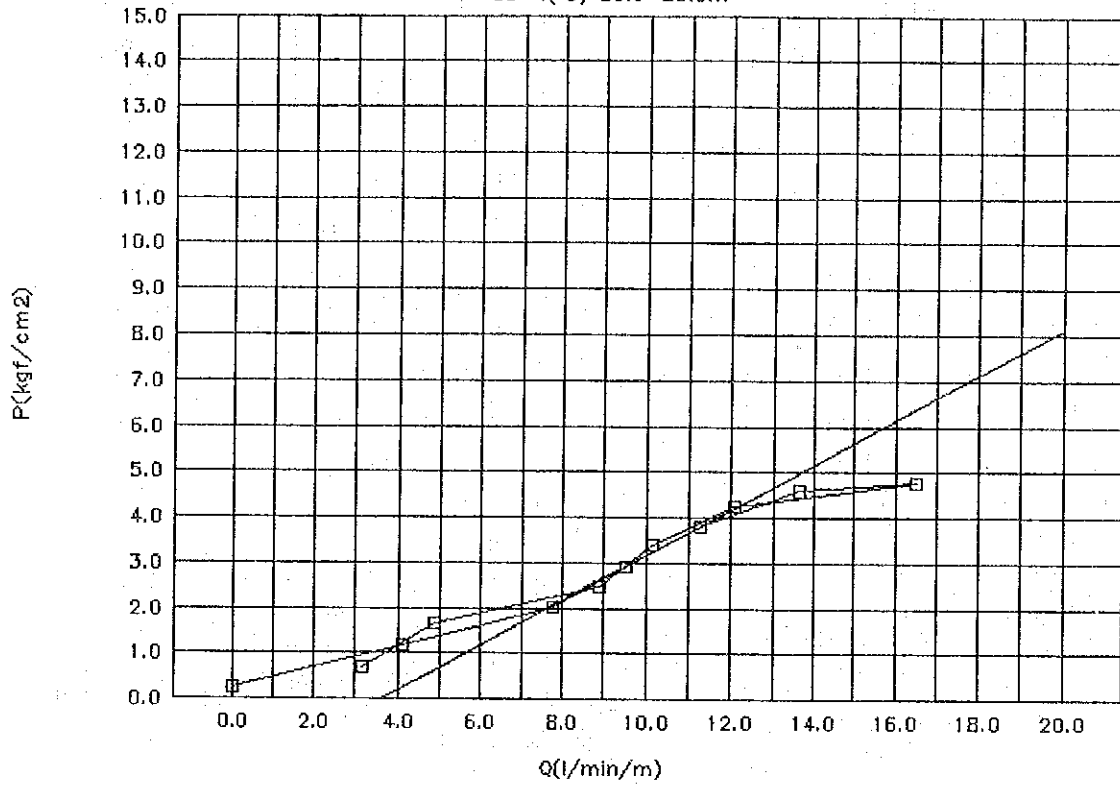
LUGEON TEST

CD-4(4) 15.0-20.0m



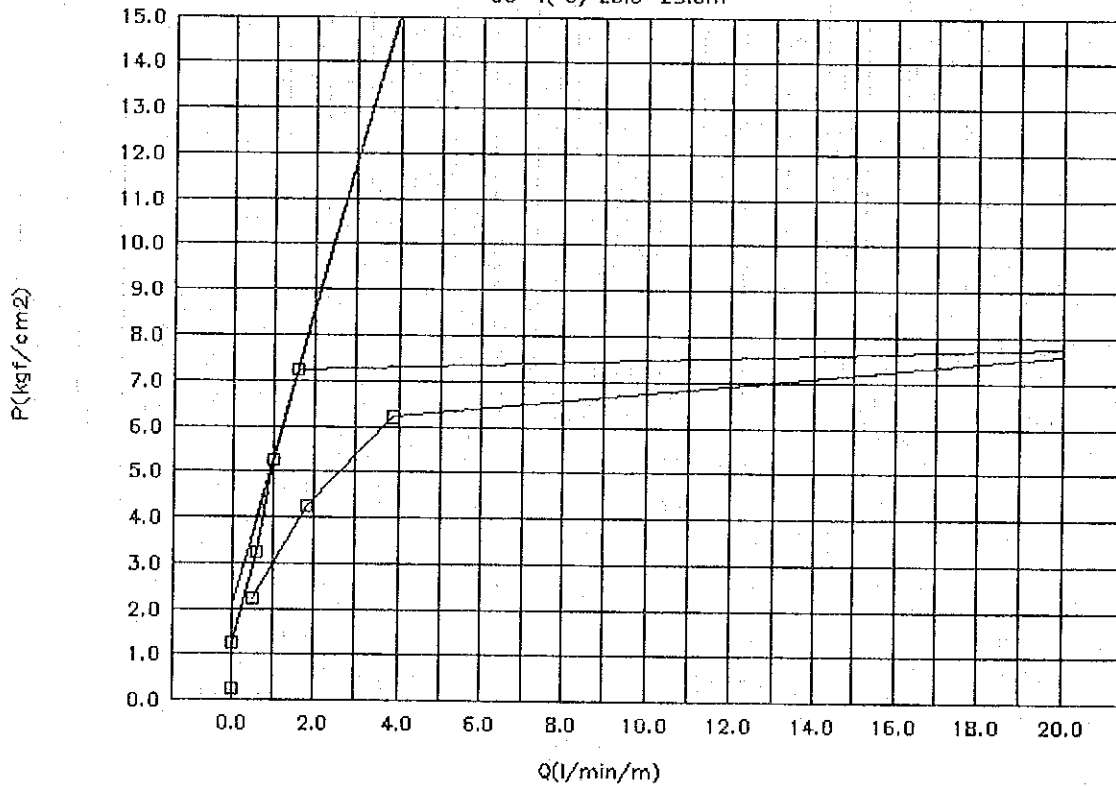
LUGEON TEST

CD-4(5) 20.0-25.0m



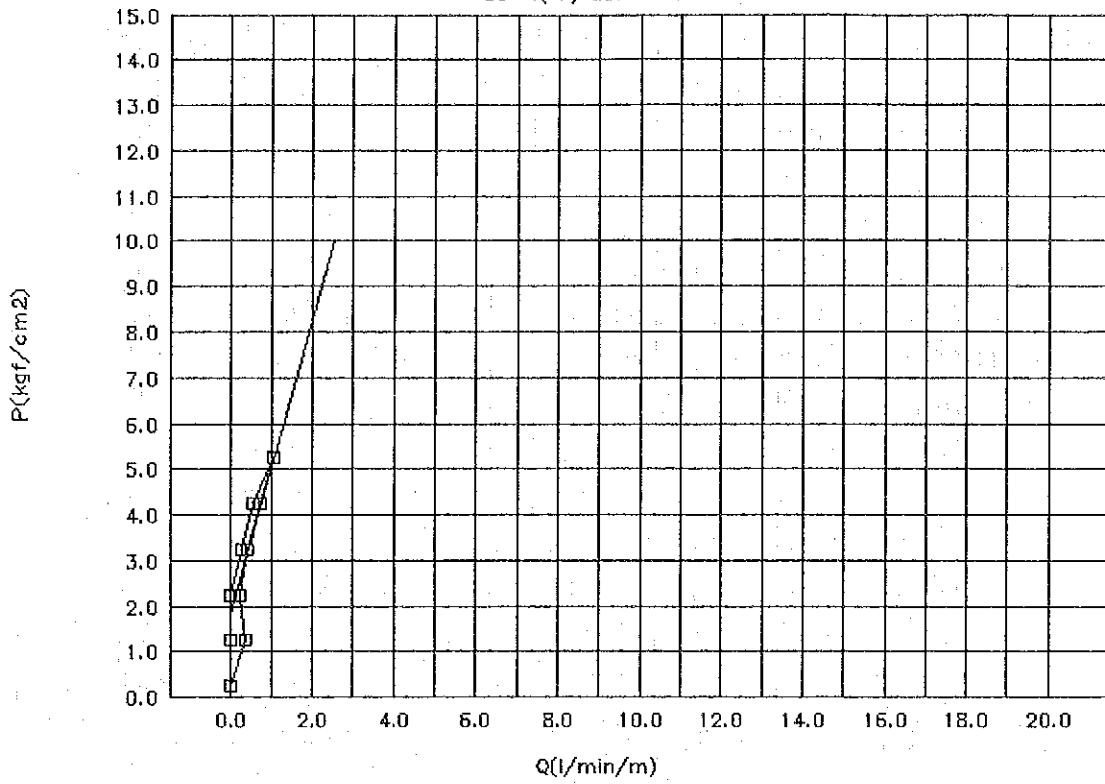
LUGEON TEST

CD-4(6) 25.0-29.0m



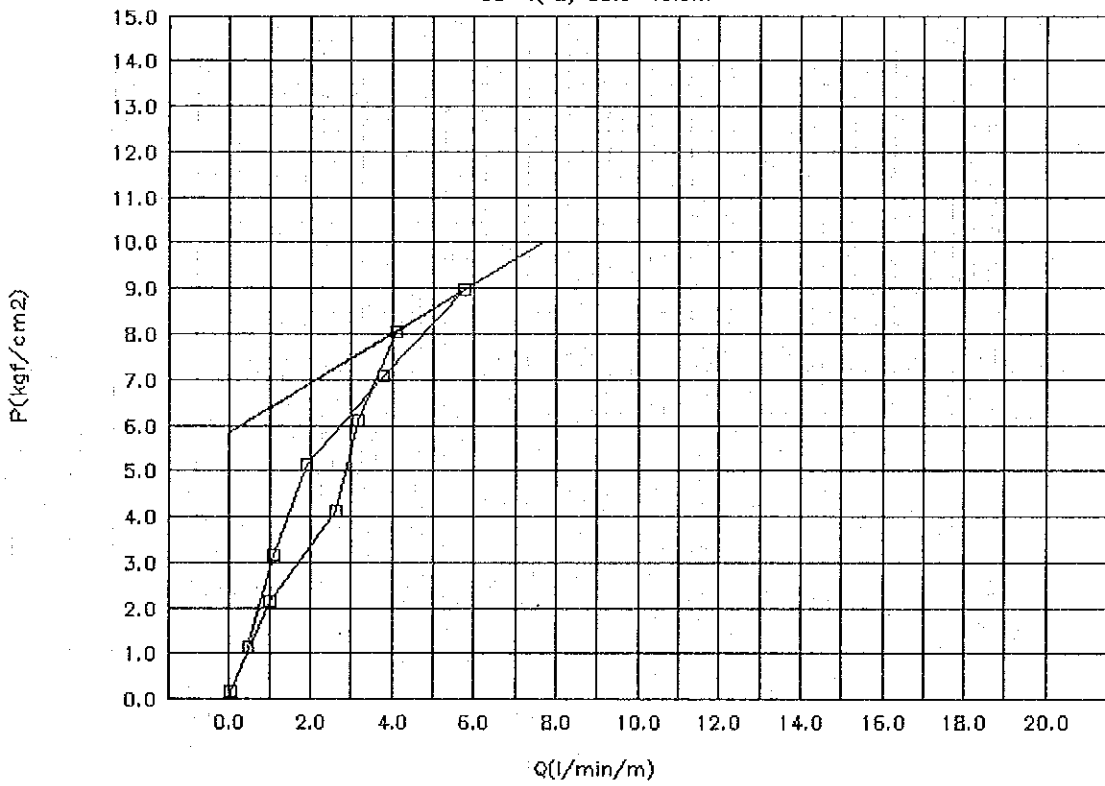
LUGEON TEST

CD-4(7) 29.0-35.0m



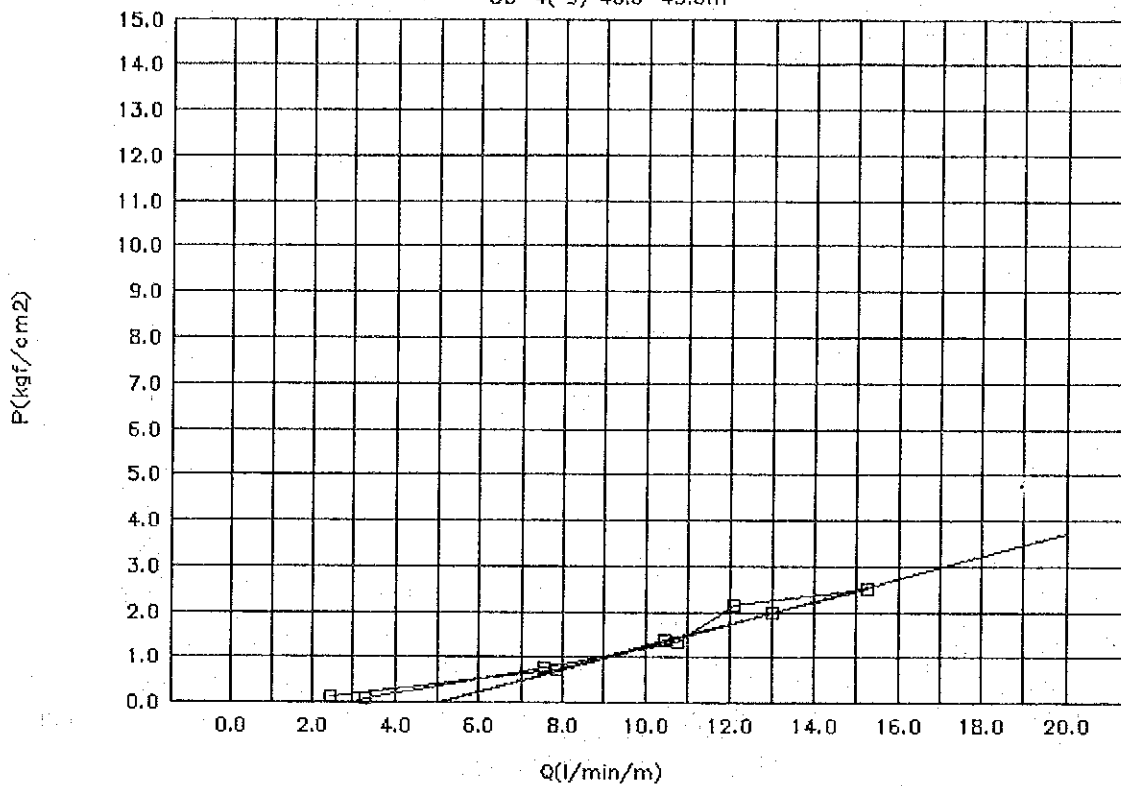
LUGEON TEST

CD-4(8) 35.0-40.0m



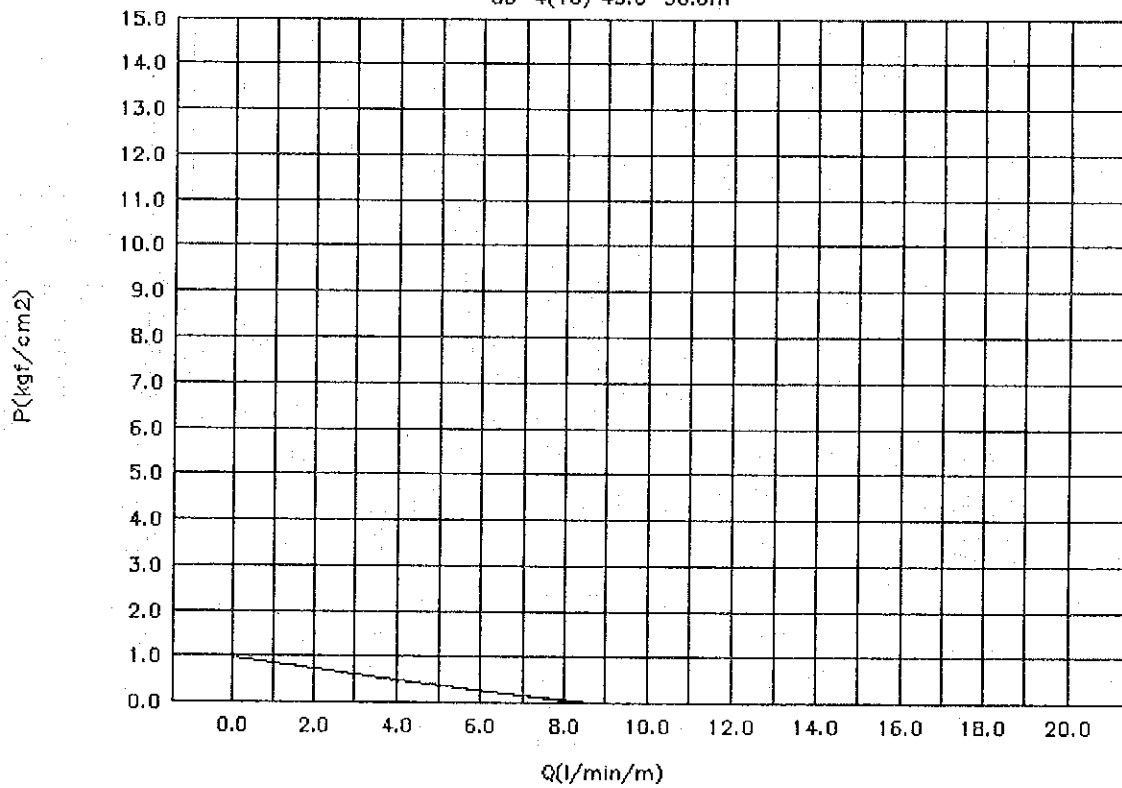
LUGEON TEST

CD-4(9) 40.0-45.0m



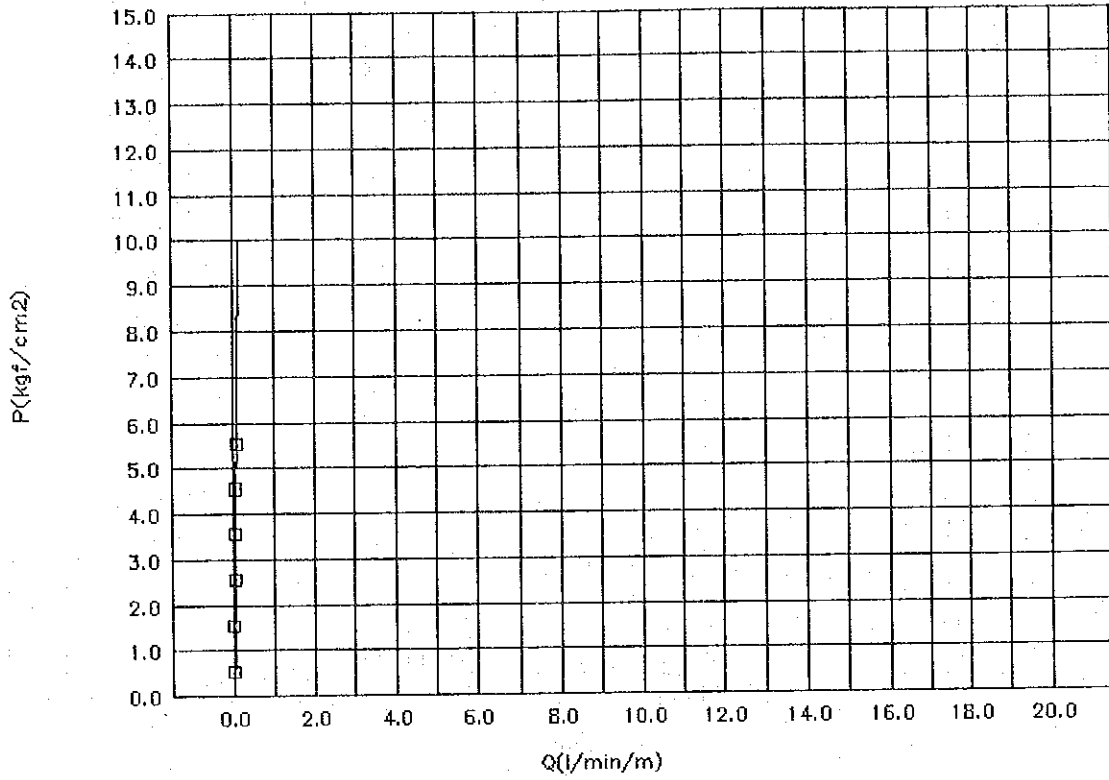
LUGEON TEST

CD-4(10) 45.0-50.0m



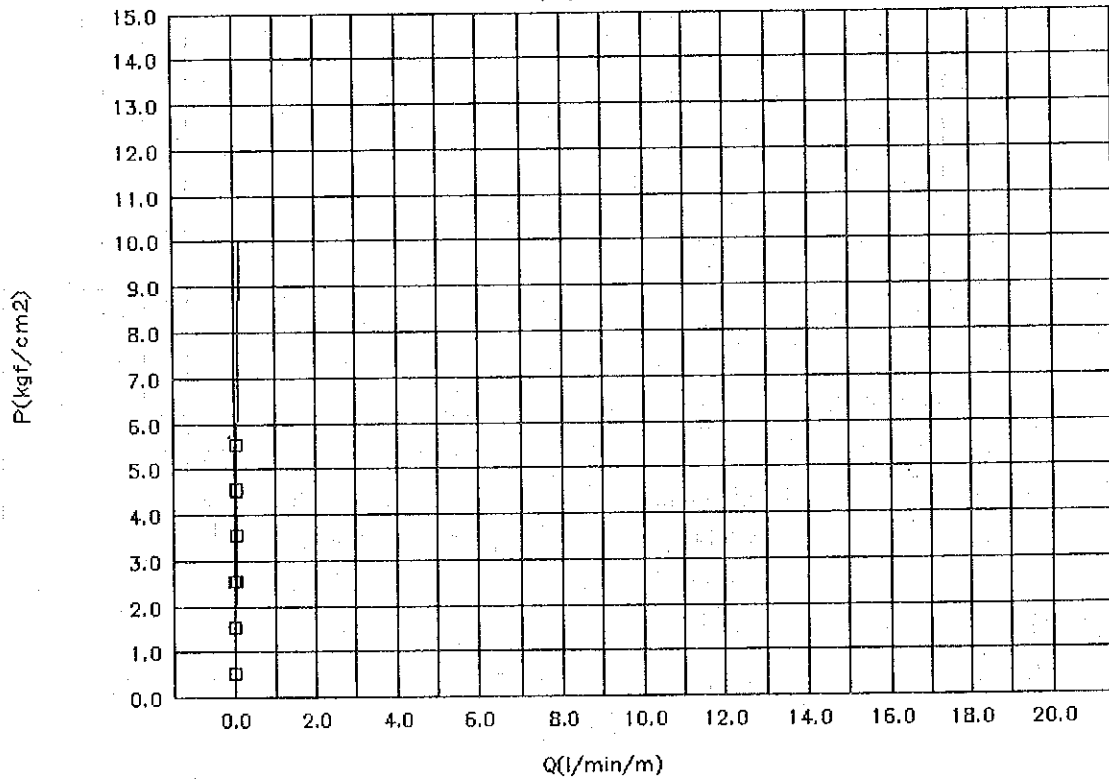
LUGEON TEST

CD-5(3) 10.0-15.0m



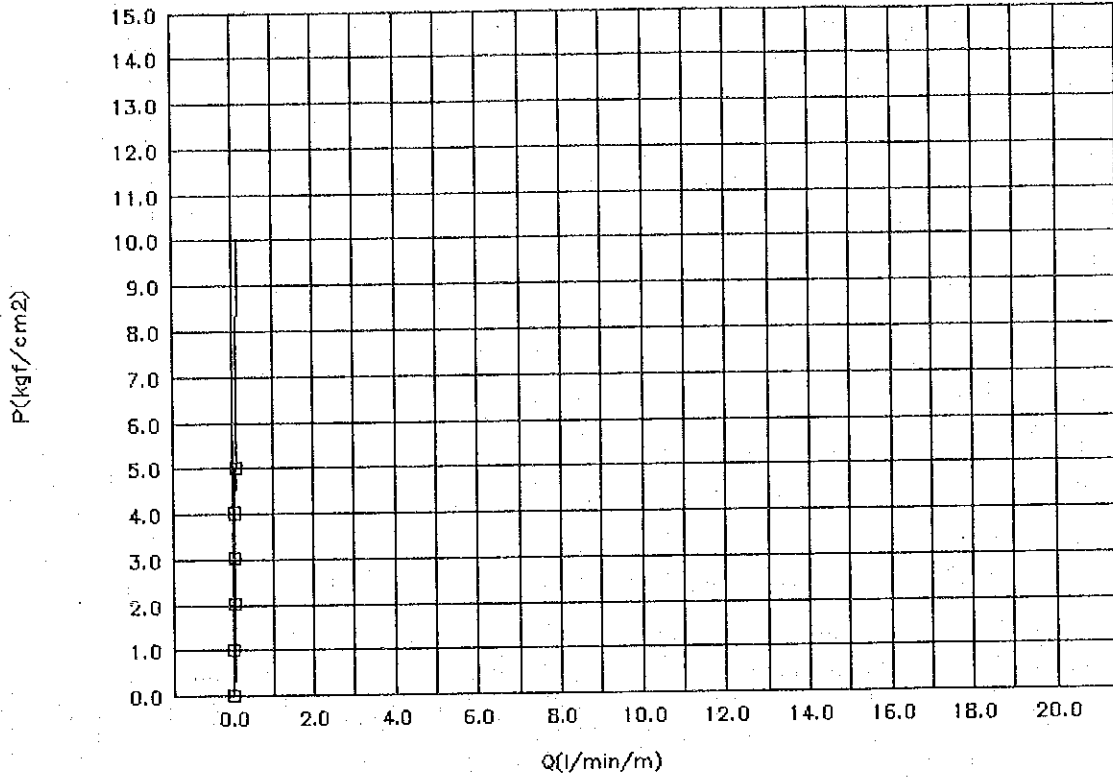
LUGEON TEST

CD-5(4) 15.0-20.0m



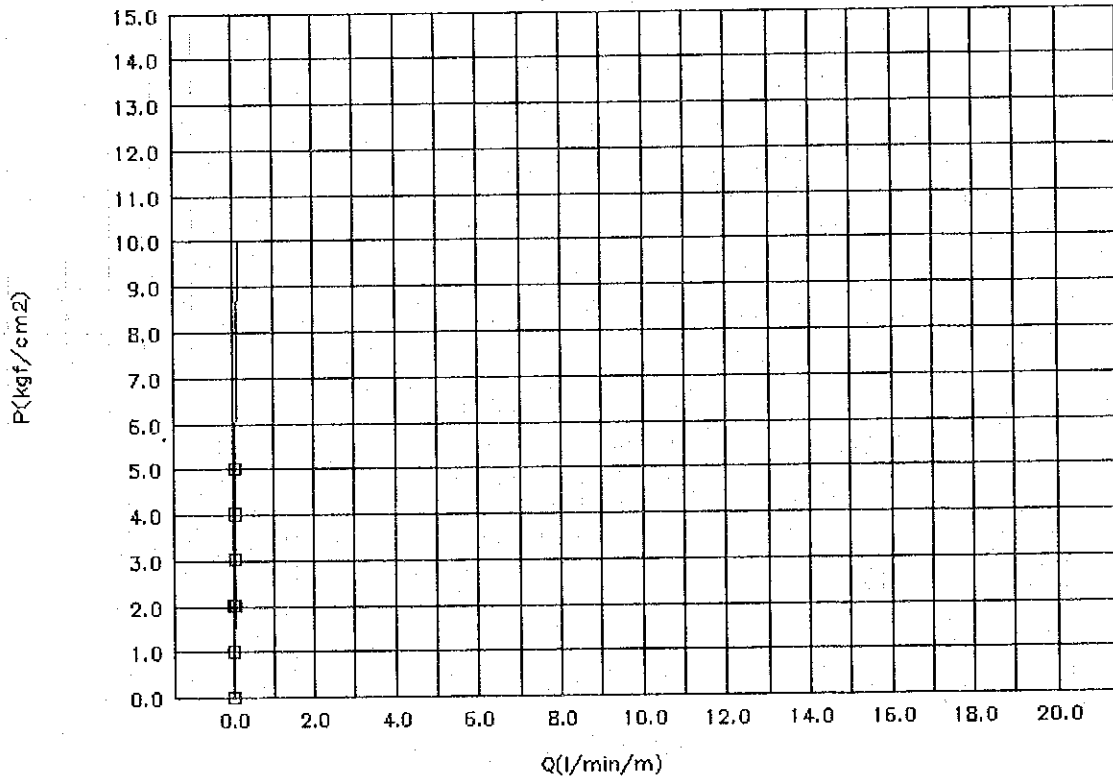
LUGEON TEST

CD-6(3) 10.0-15.0m



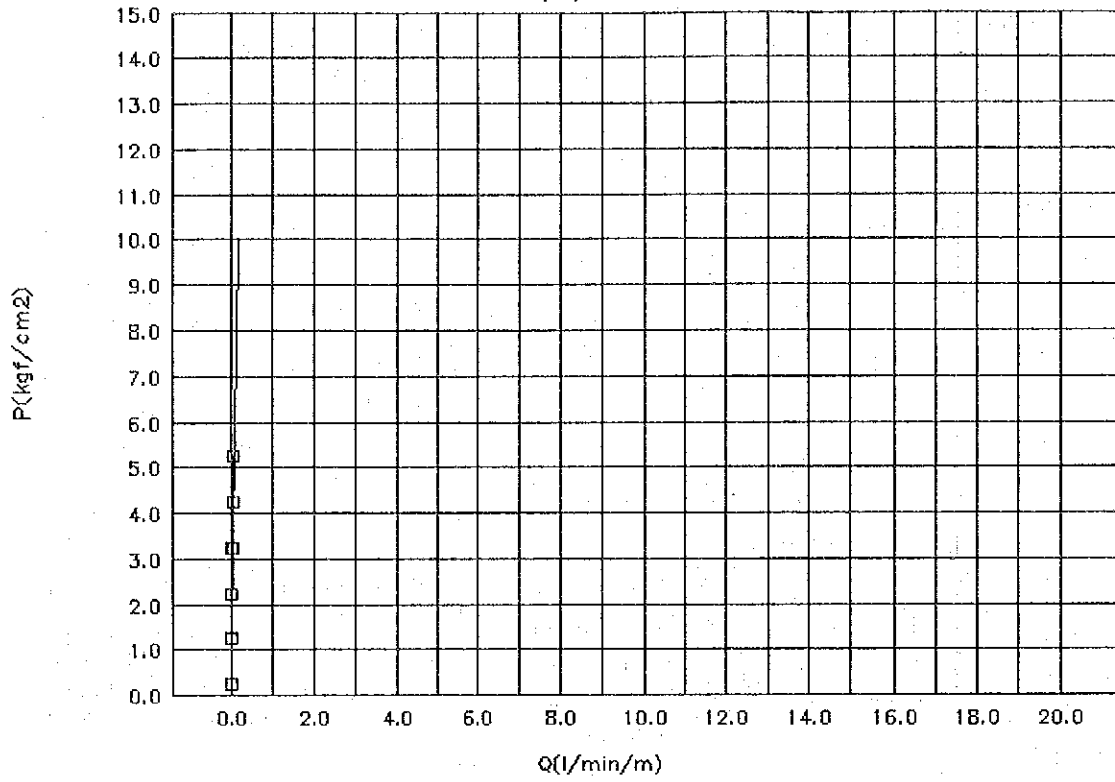
LUGEON TEST

CD-6(4) 15.0-20.0m



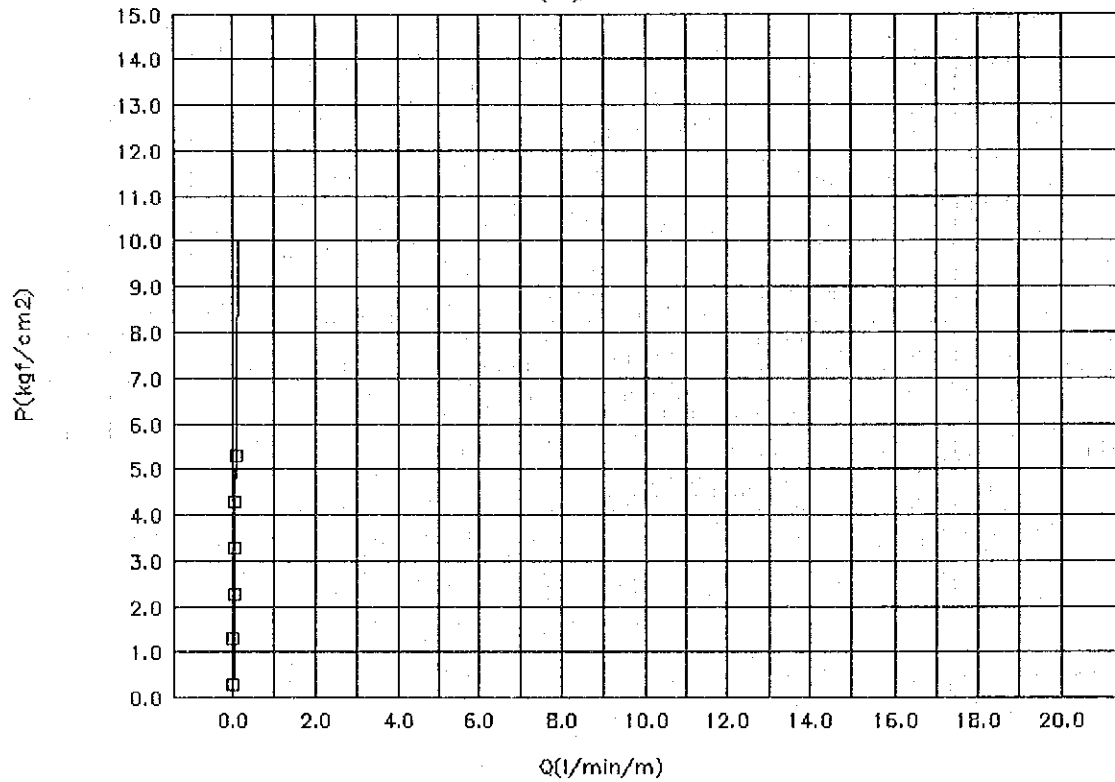
LUGEON TEST

CD-7(2) 5.0-10.0m



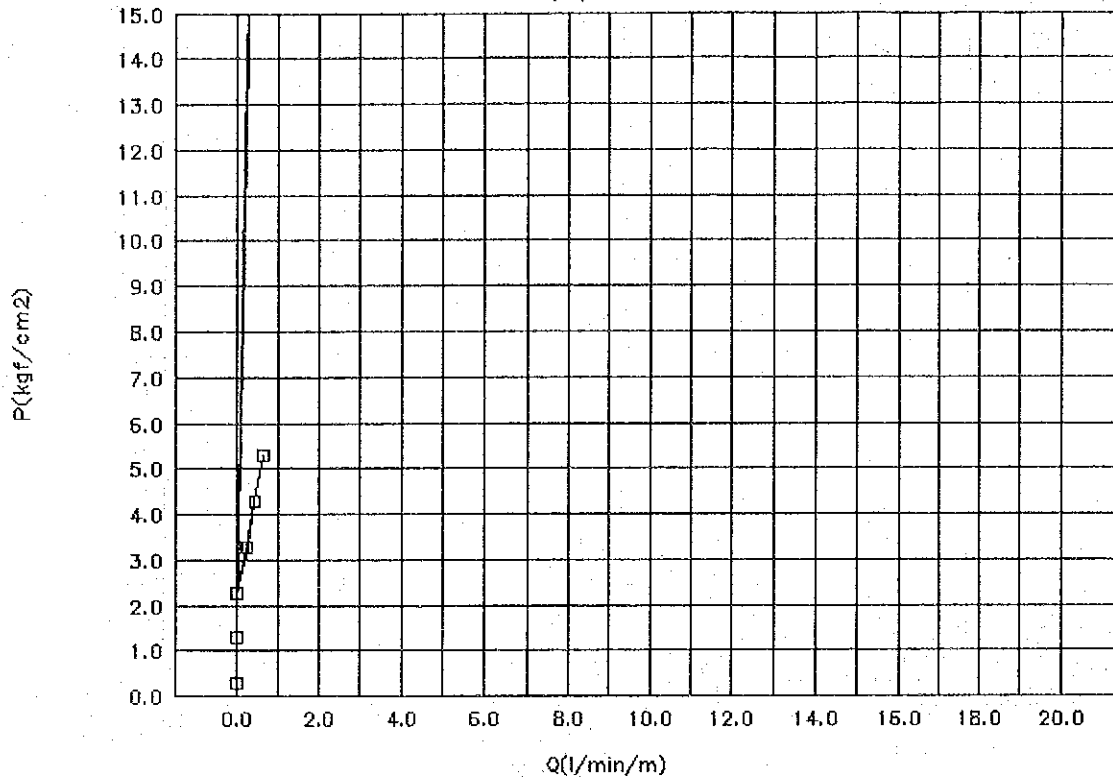
LUGEON TEST

CD-7(3) 10.0-15.0m



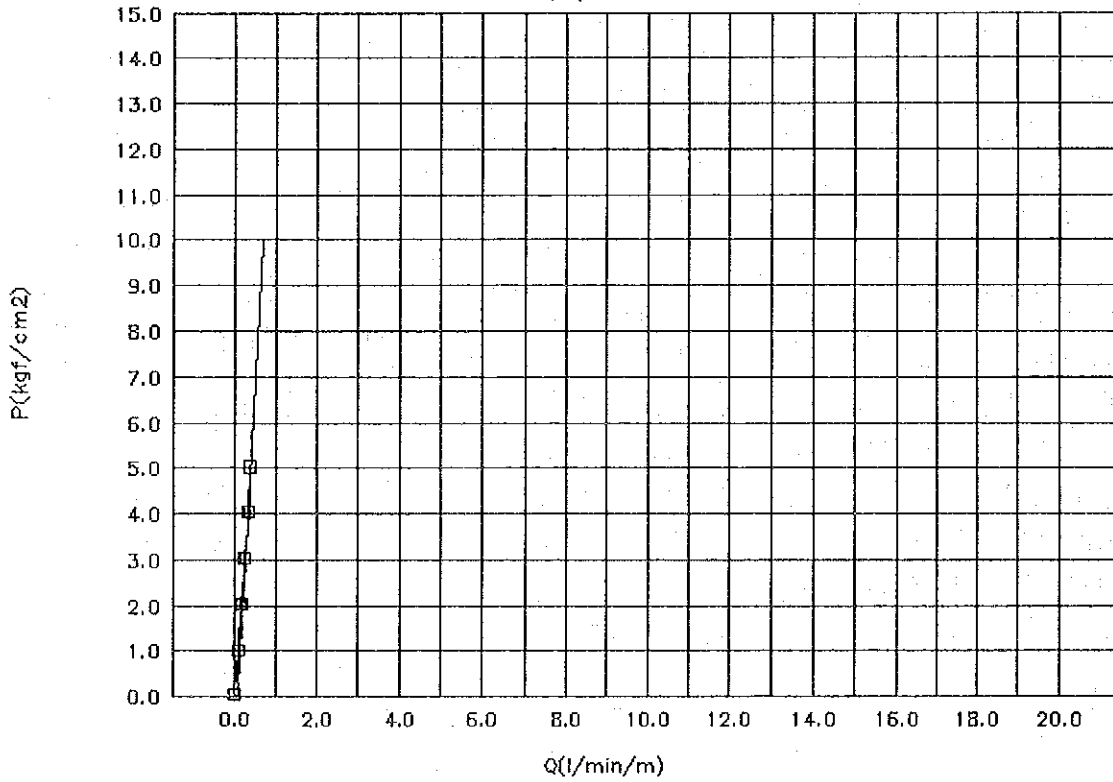
LUGEON TESTS

CD-7(4) 15.0-20.0m



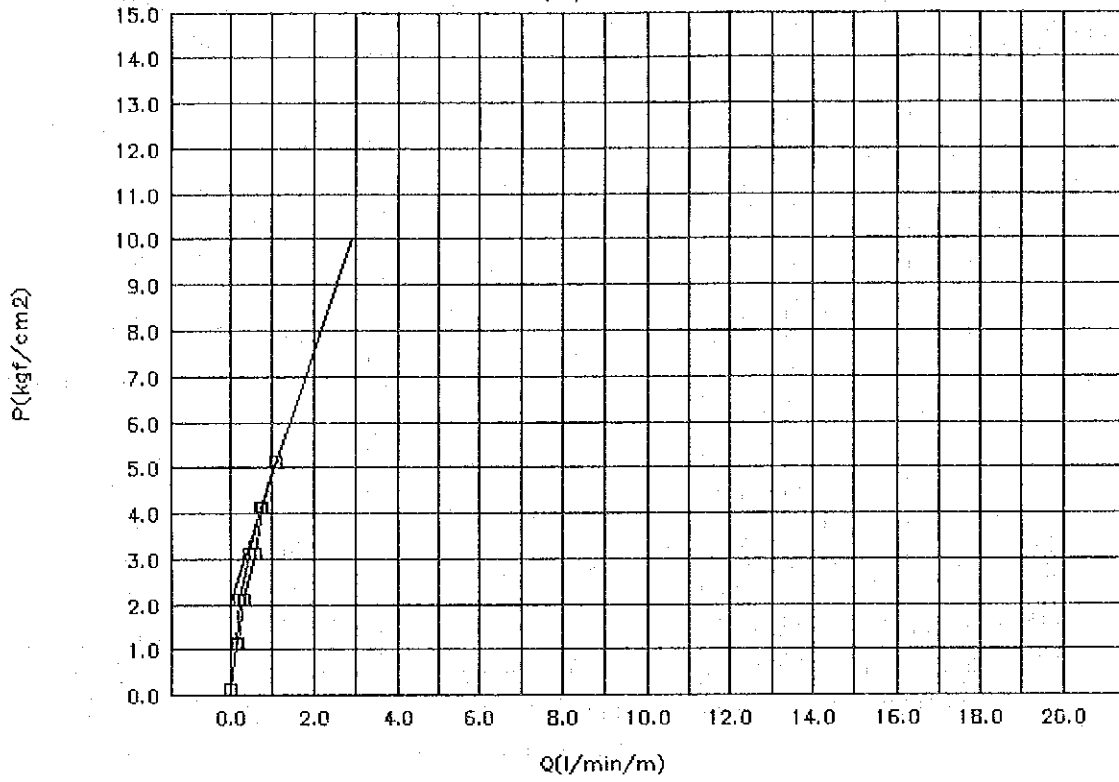
LUGEON TESTS

KR-2(3) 10.0-15.0m



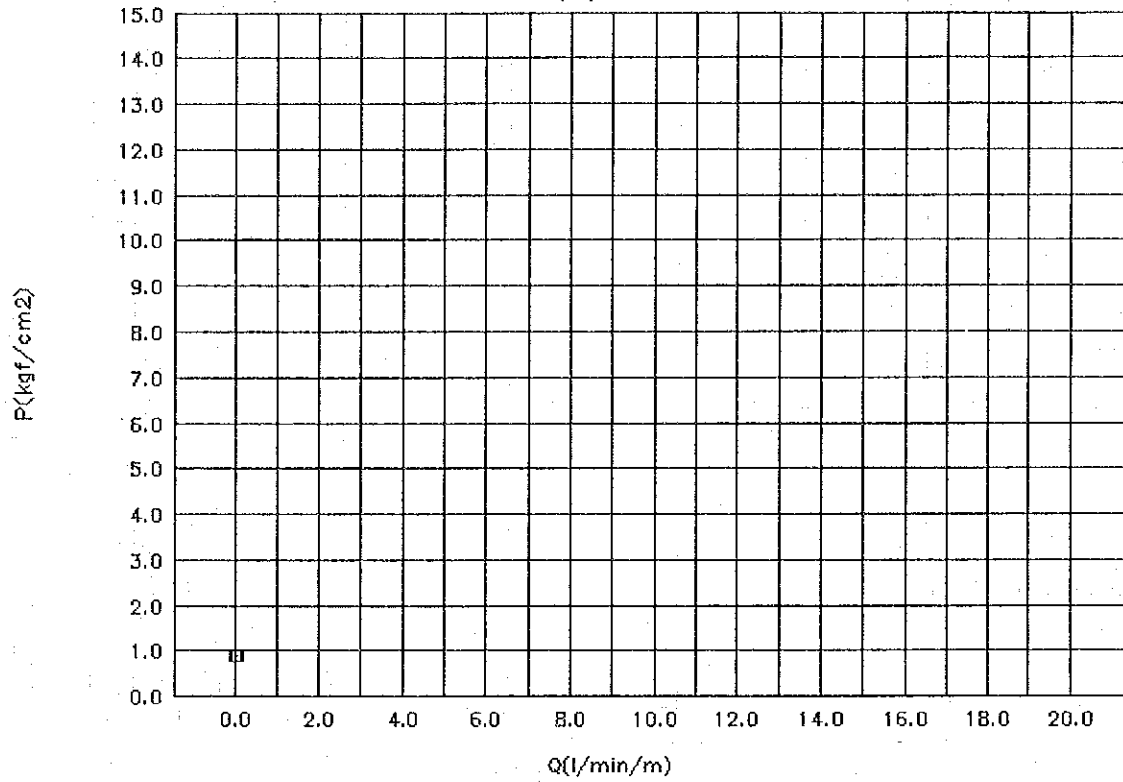
LUGEON TESTS

KR-2(3) 10.0-15.0m



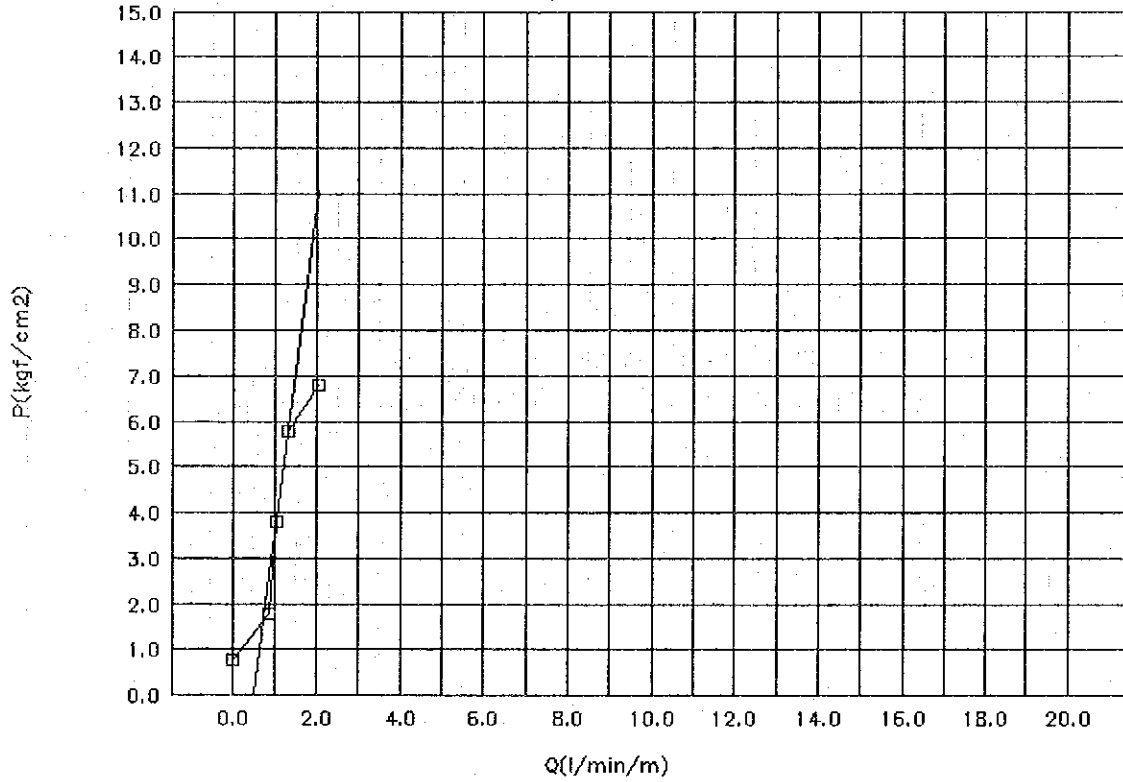
CONSTANT HEAD TEST

Kr-4(1) 1.5~ 5.0m



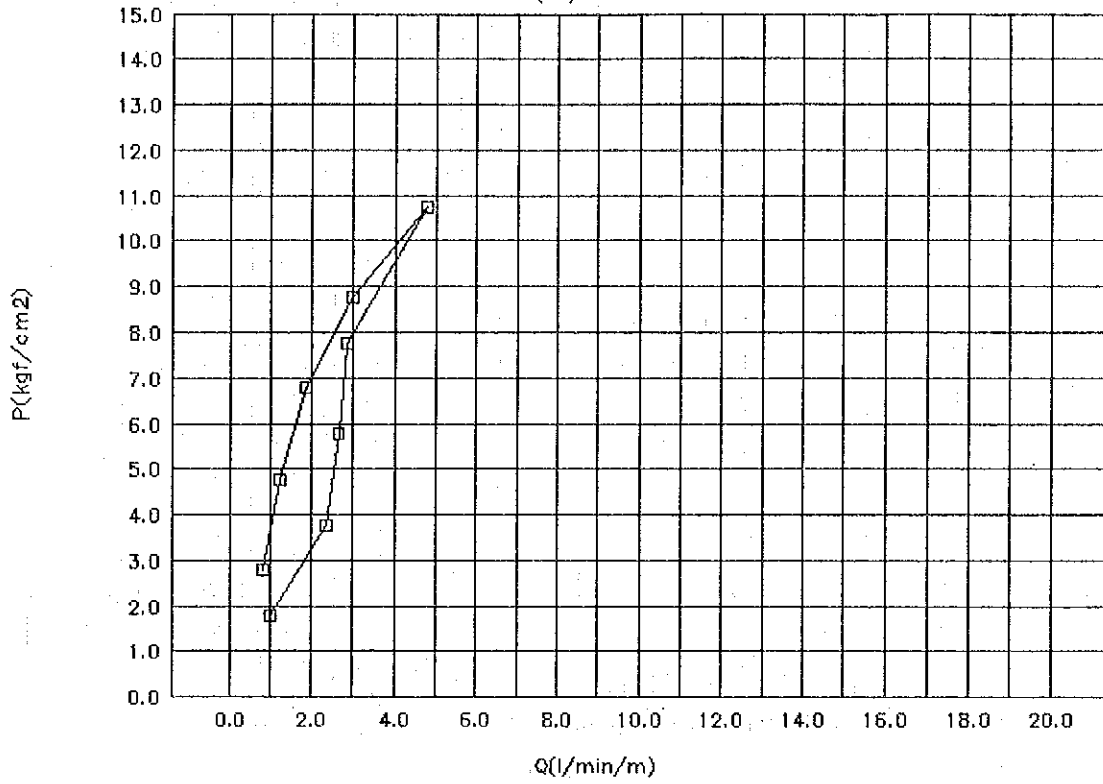
LUGEON TEST

Kr-4(2) 5.0~10.0m



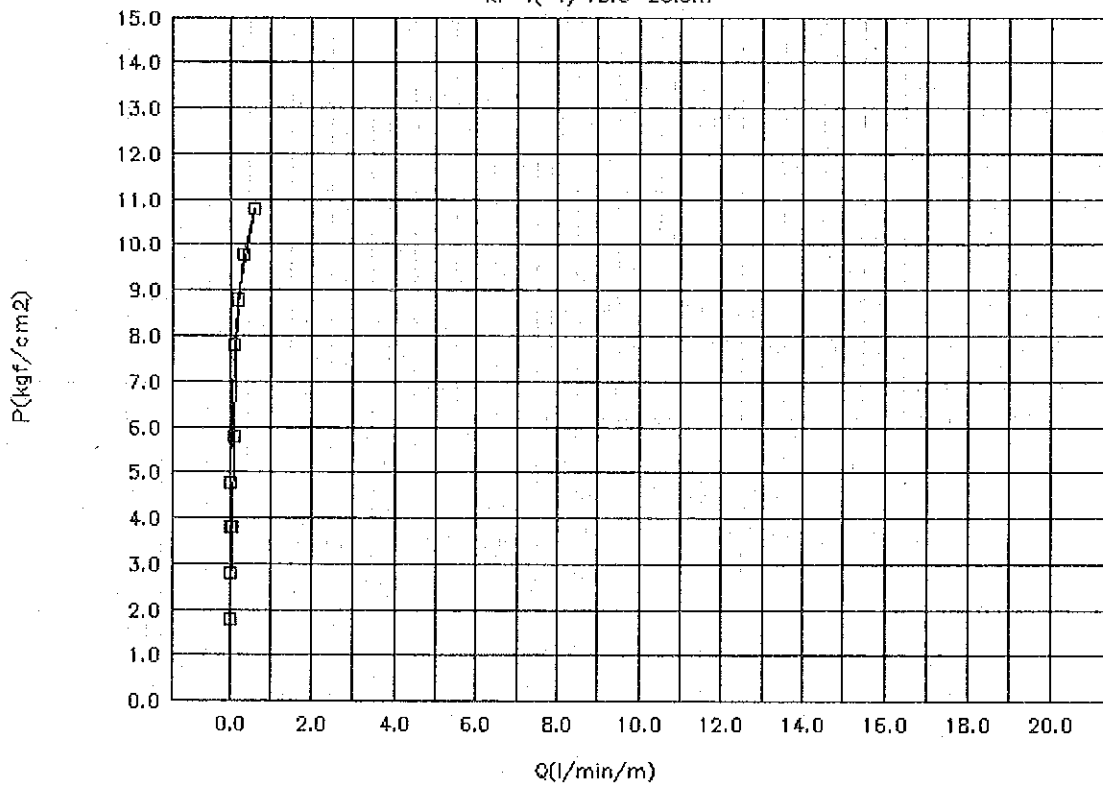
LUGEON TEST

Kr-4(3) 10.0-15.0m



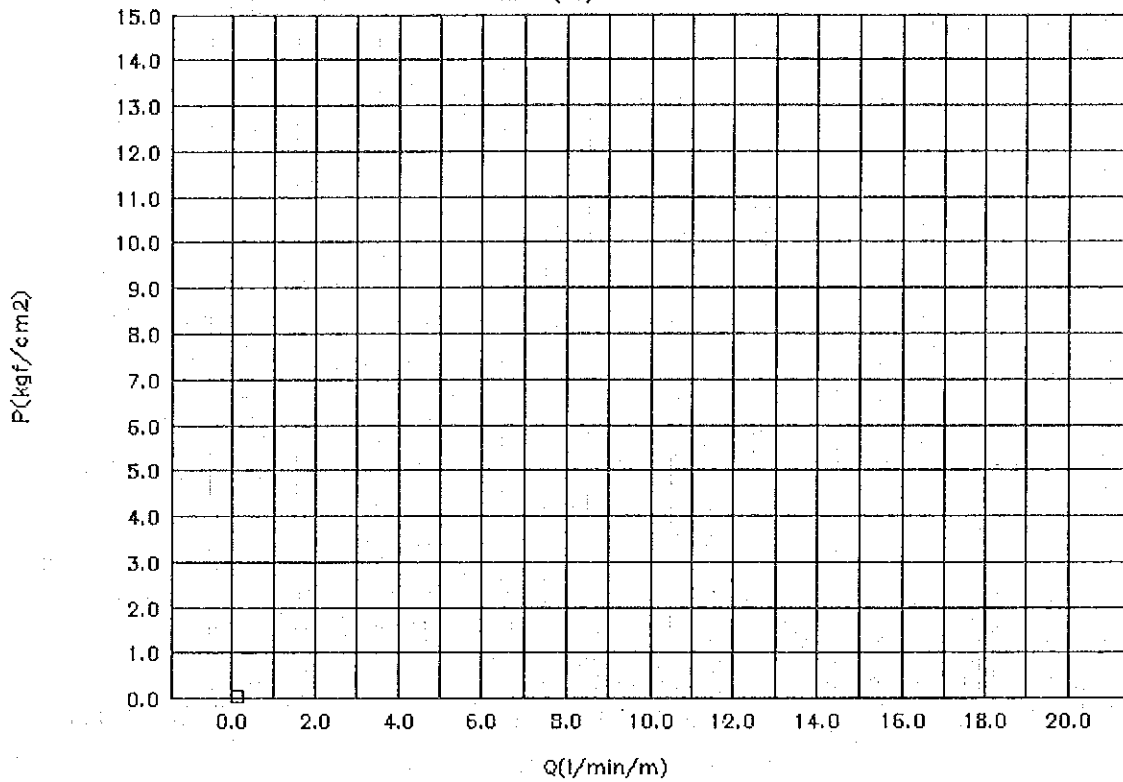
LUGEON TEST

Kr-4(4) 15.0-20.0m



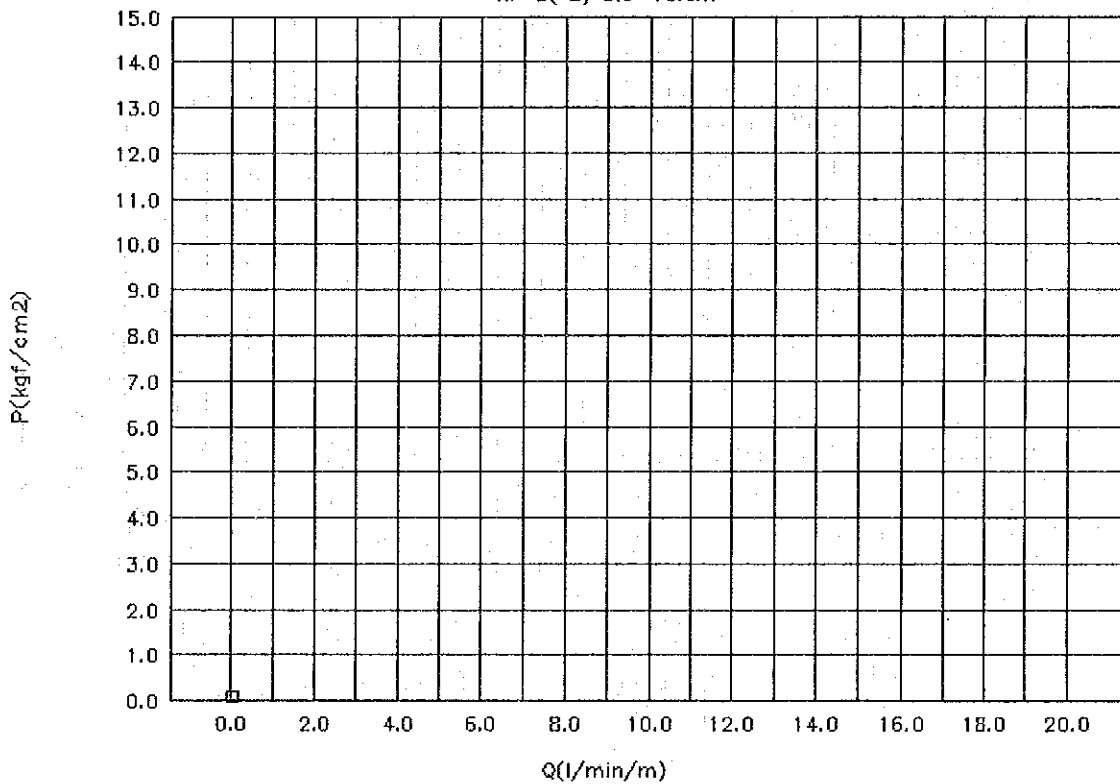
CONSTANT HEAD TEST

Kr-5(1) 1.0- 5.0m



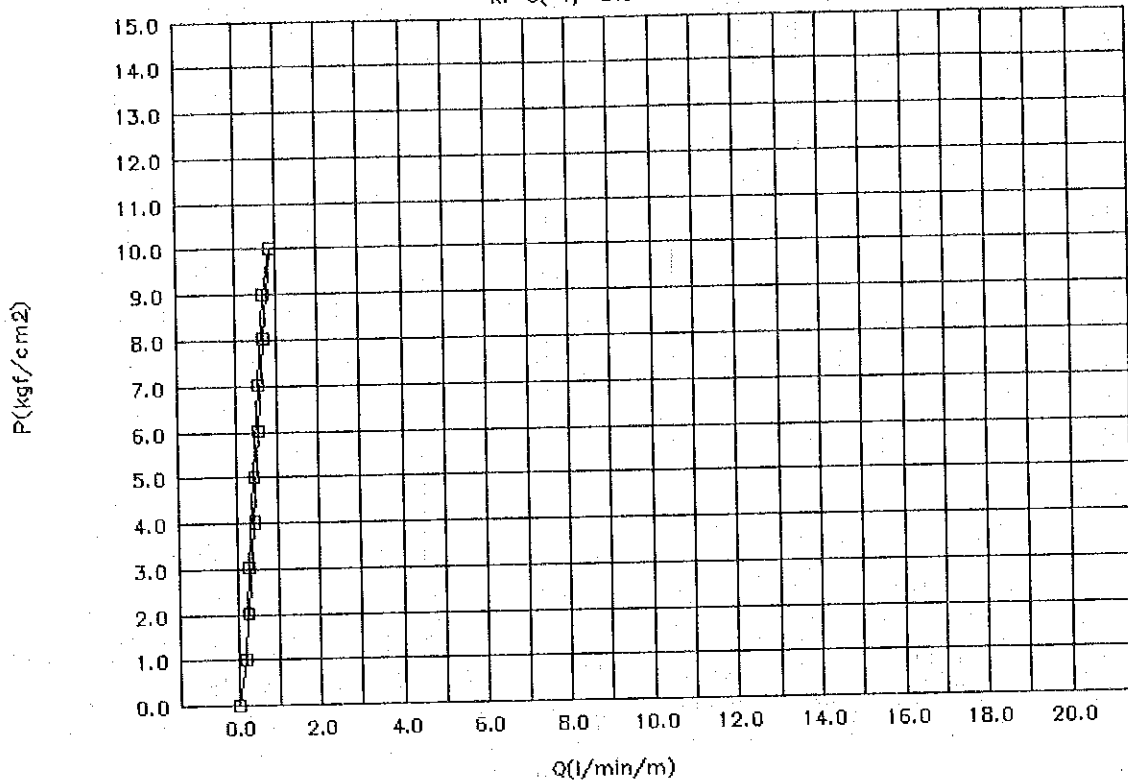
CONSTANT HEAD TEST

Kr-5(2) 5.0-10.0m



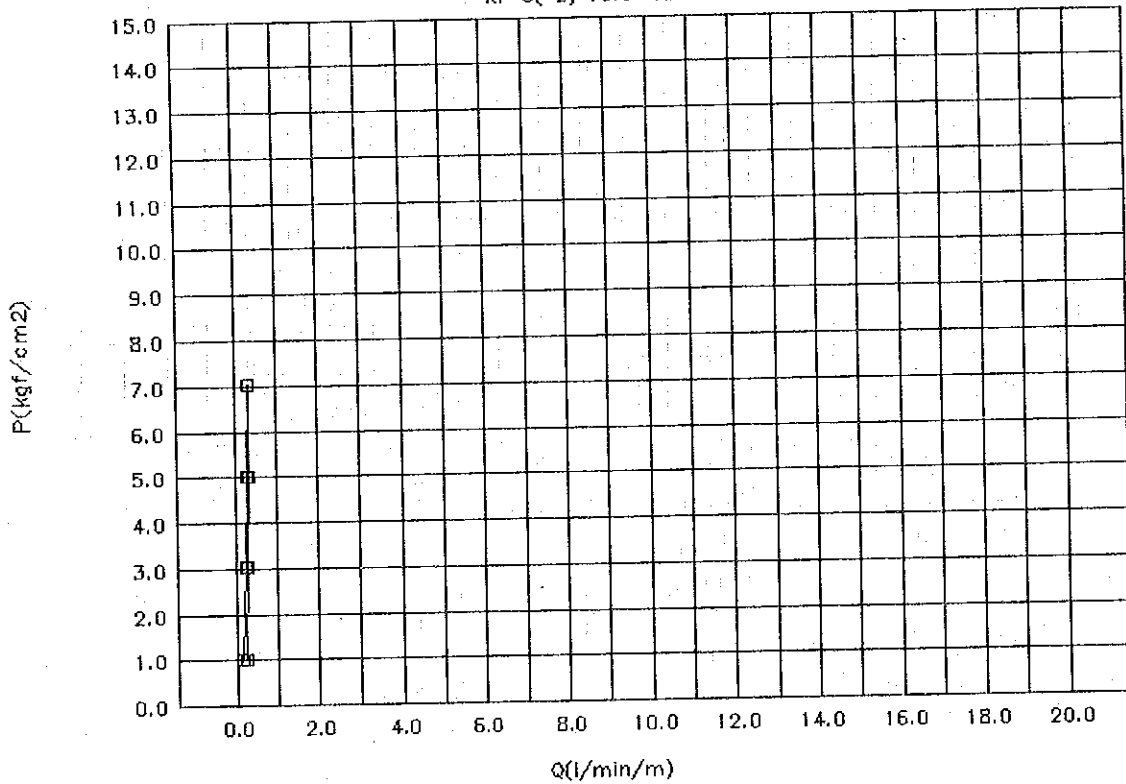
LUGEON TEST

Kr-6(1) 5.0-10.0m



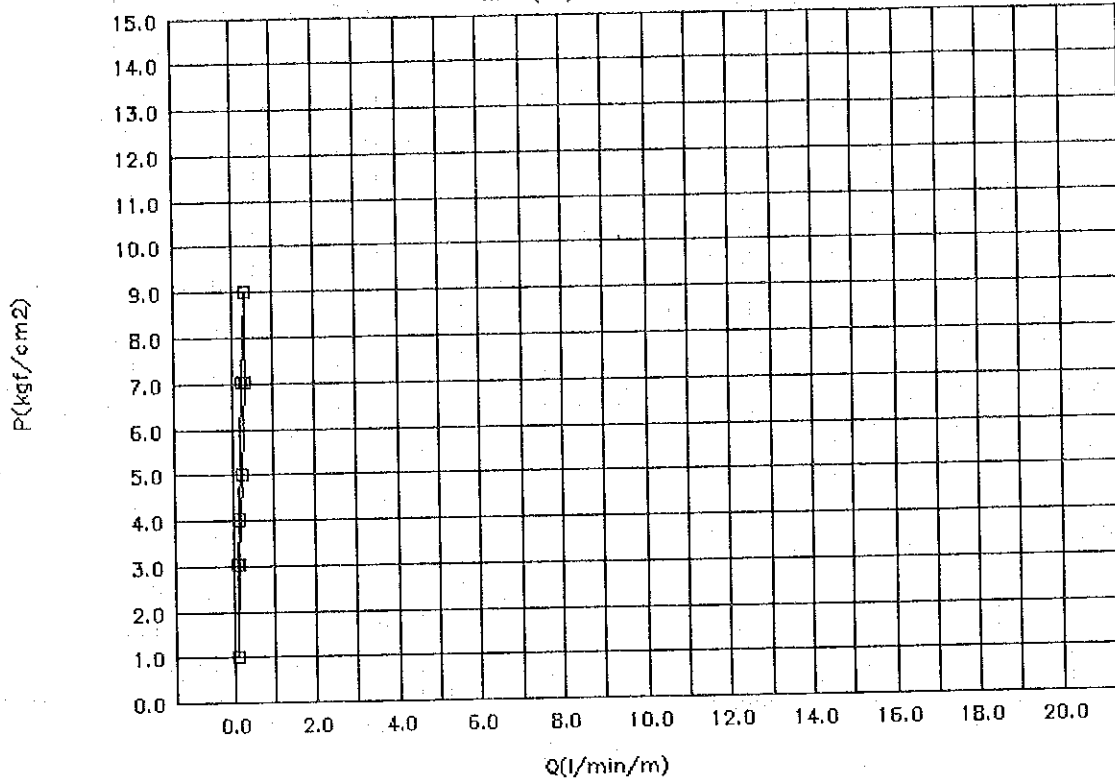
LUGEON TEST

Kr-6(2) 10.0-15.0m



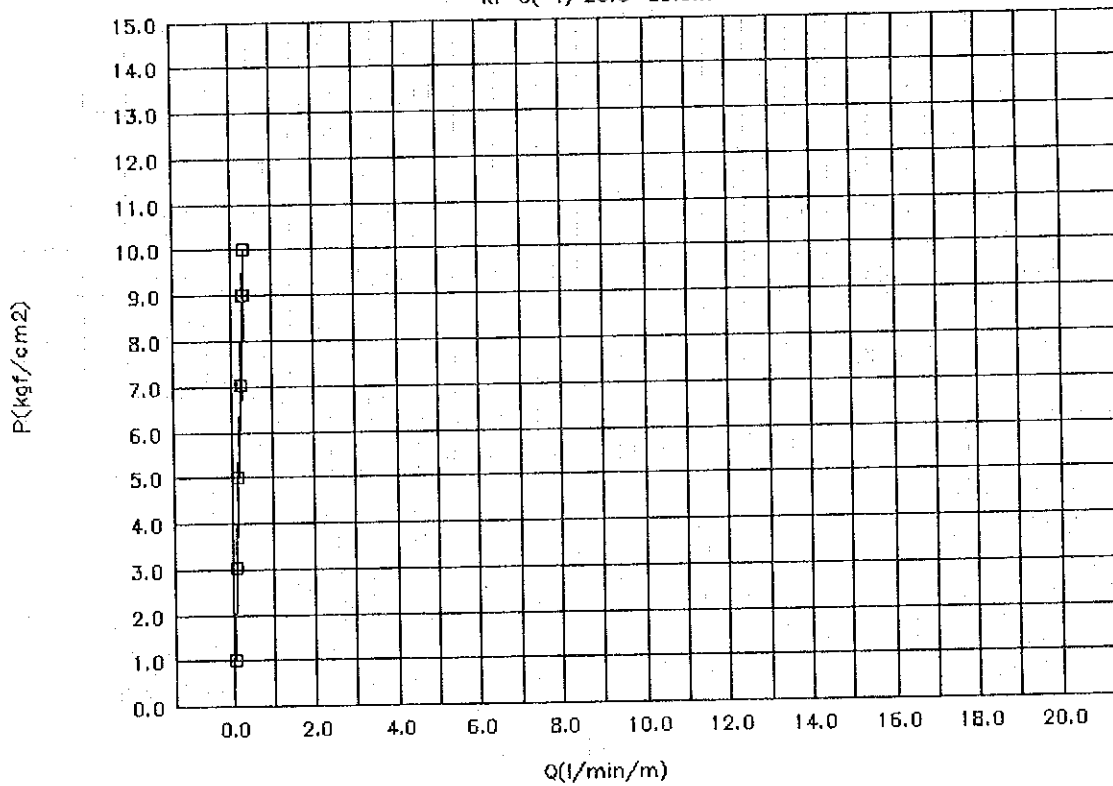
LUGEON TEST

Kr-6(3) 15.0-20.0m



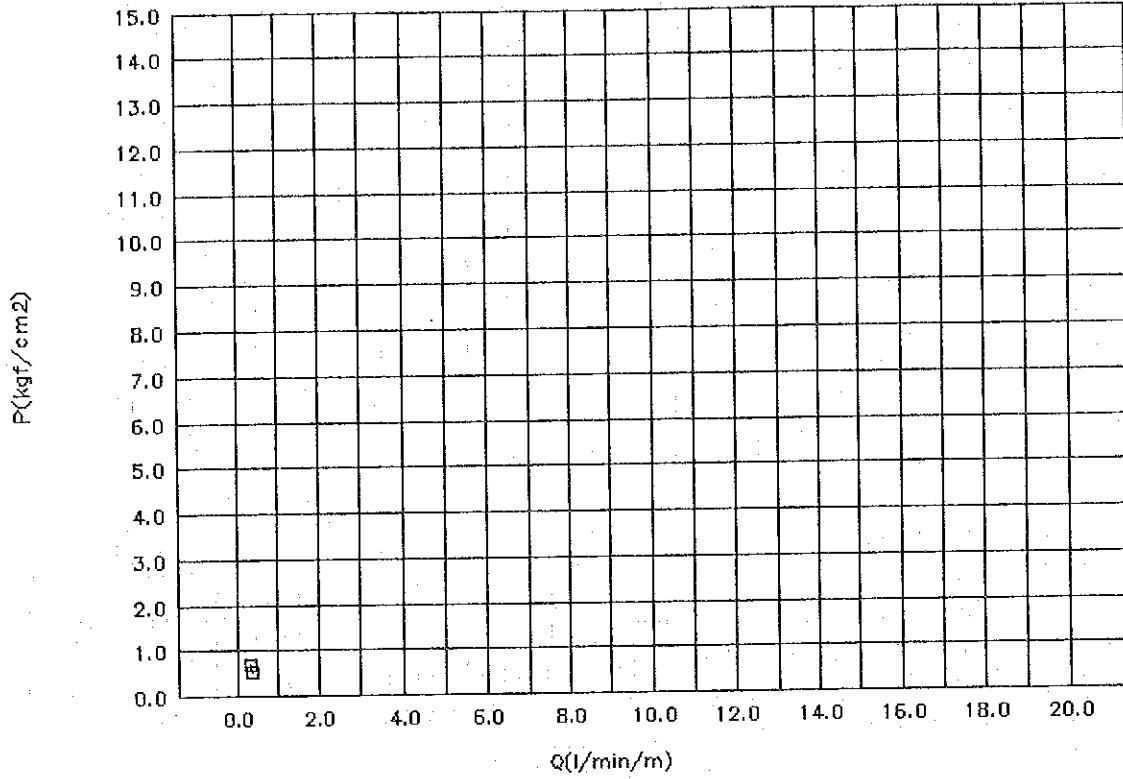
LUGEON TEST

Kr-6(4) 20.0-25.0m



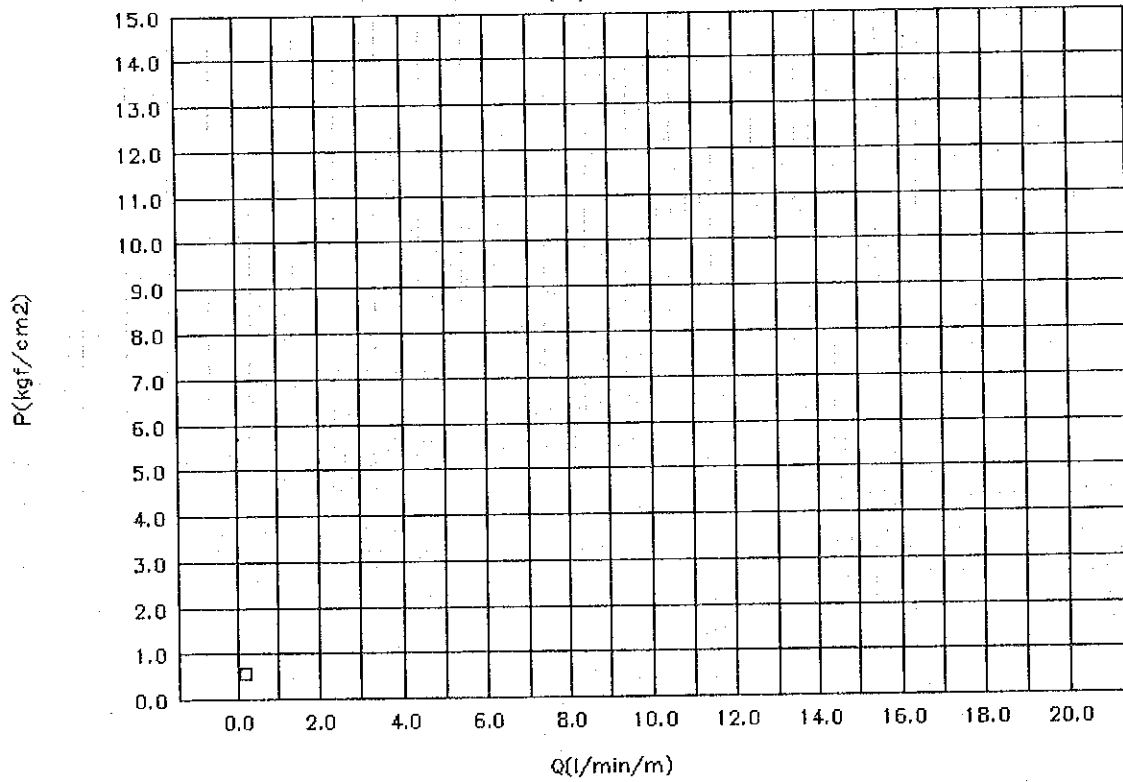
CONSTANT HEAD TEST

Kr-7(1) 1.0- 5.0m



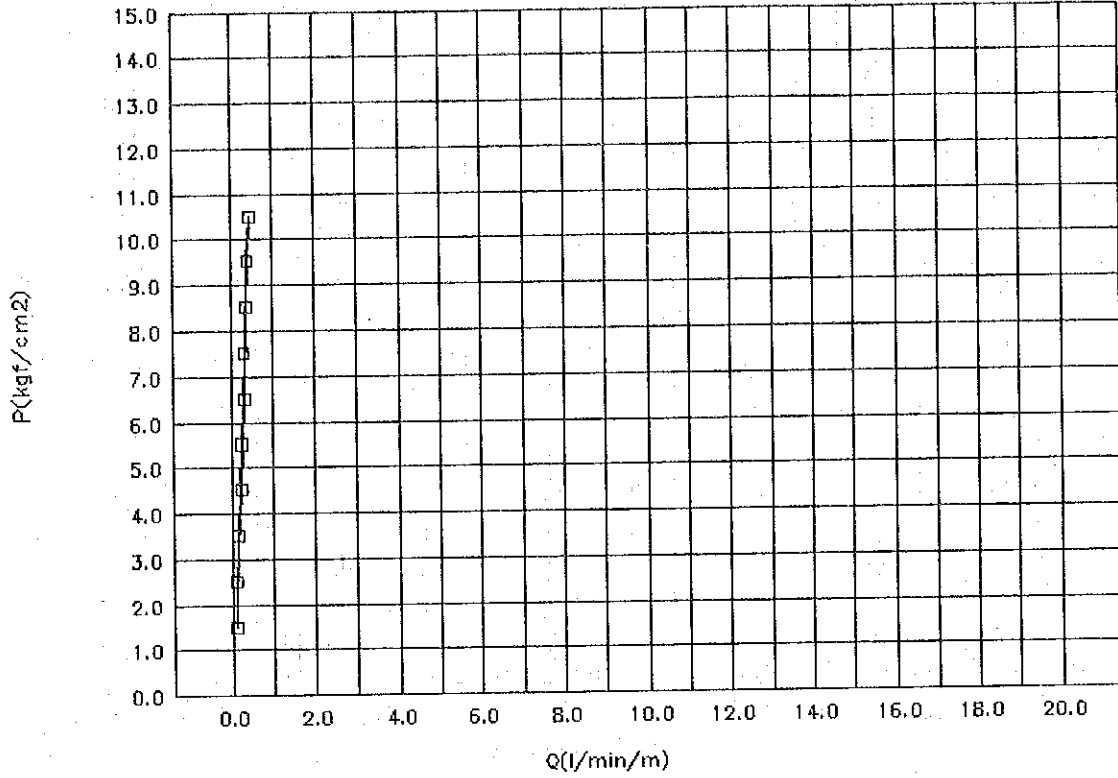
CONSTANT HEAD TEST

Kr-7(2) 5.0-10.0m



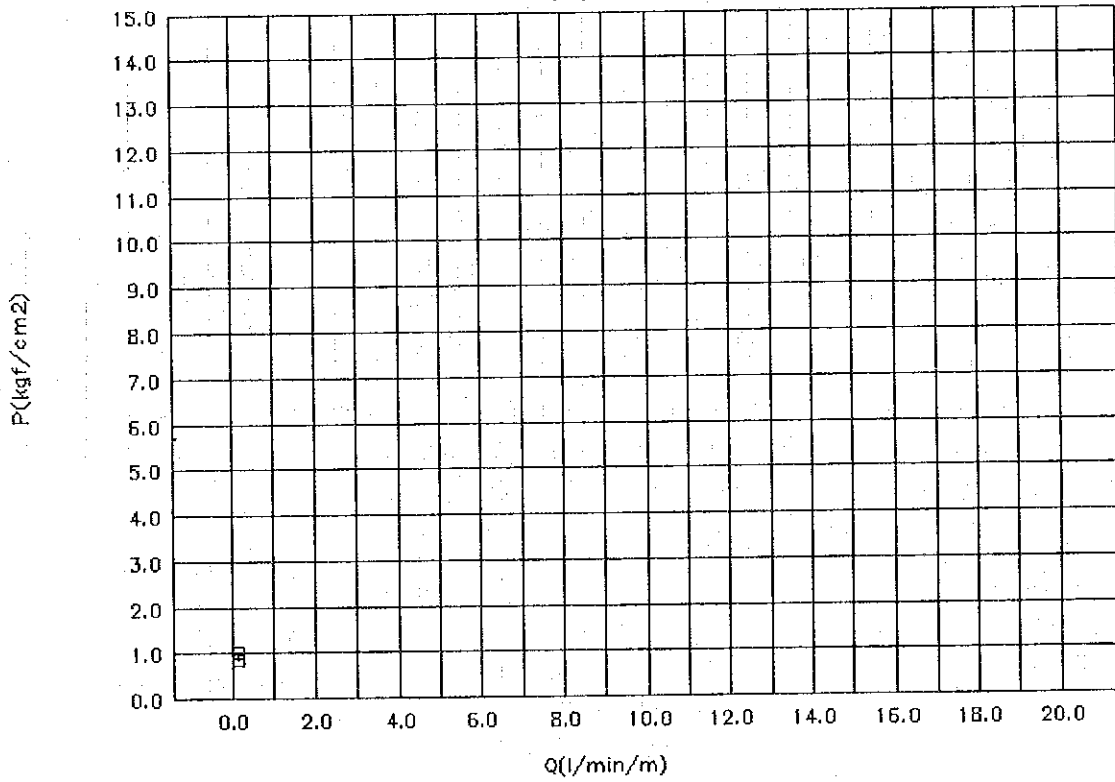
LUGEON TEST

Kr-7(3) 10.0-15.0m



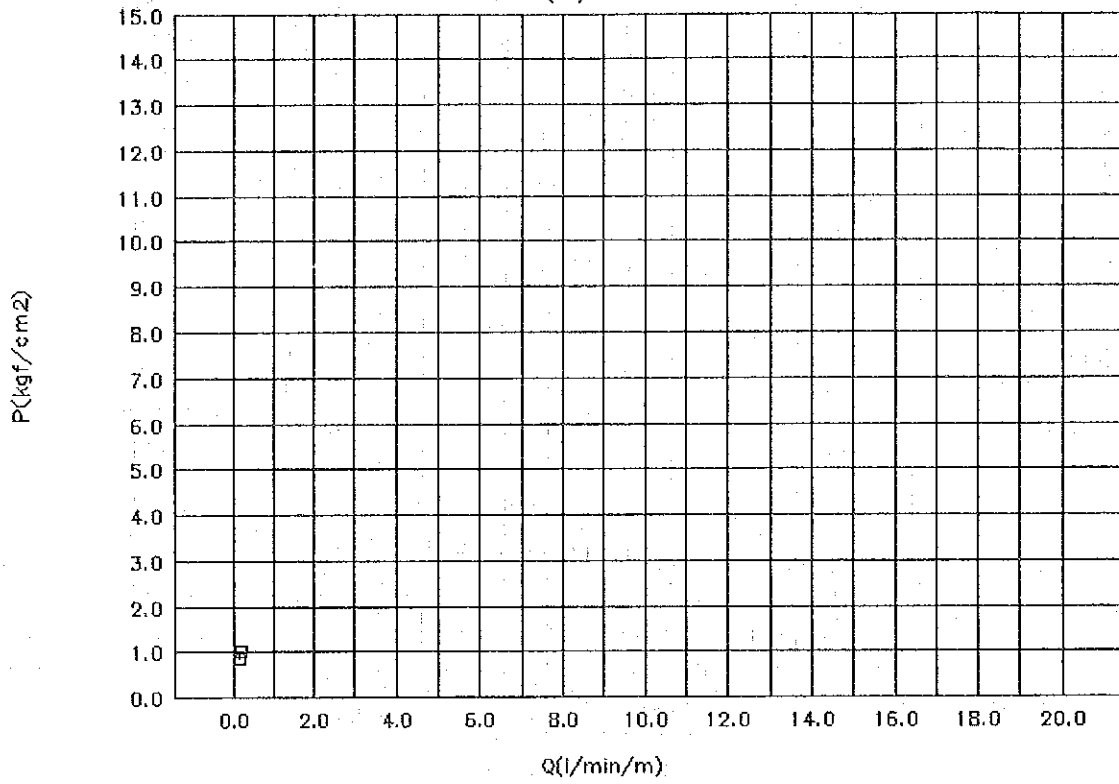
CONSTANT HEAD TEST

CD-2(2) 5.0-10.0m



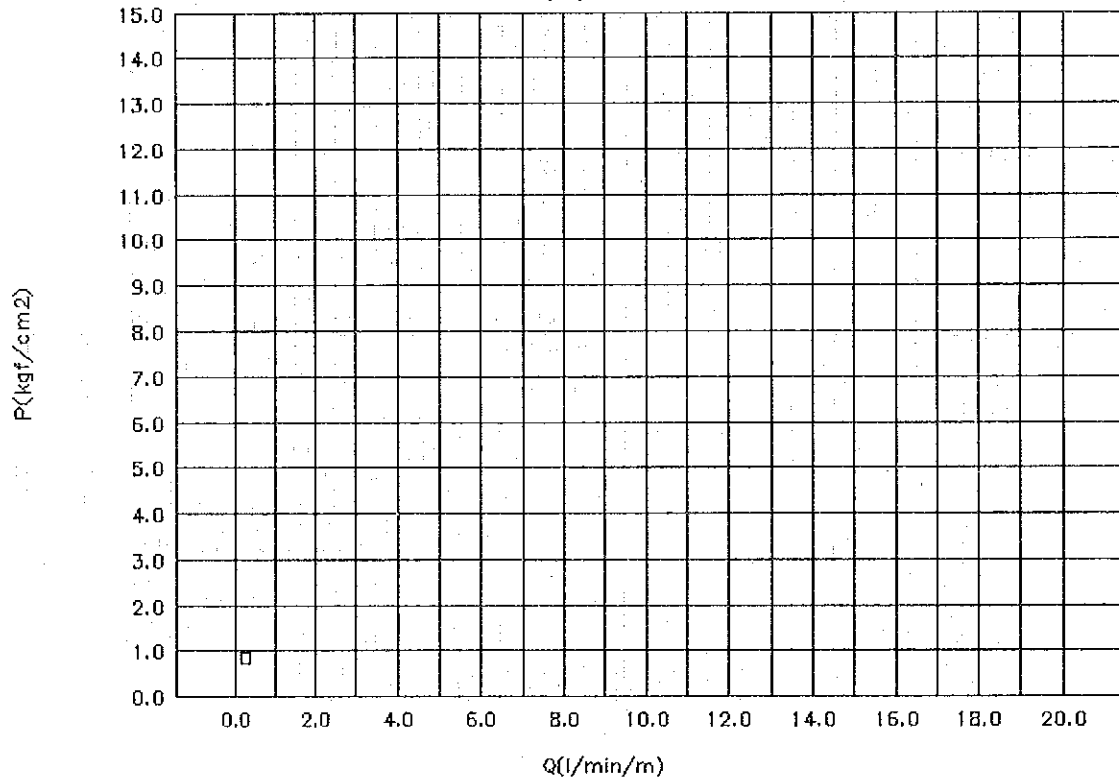
CONSTANT HEAD TEST

Kr-B(2) 5.0-10.0m



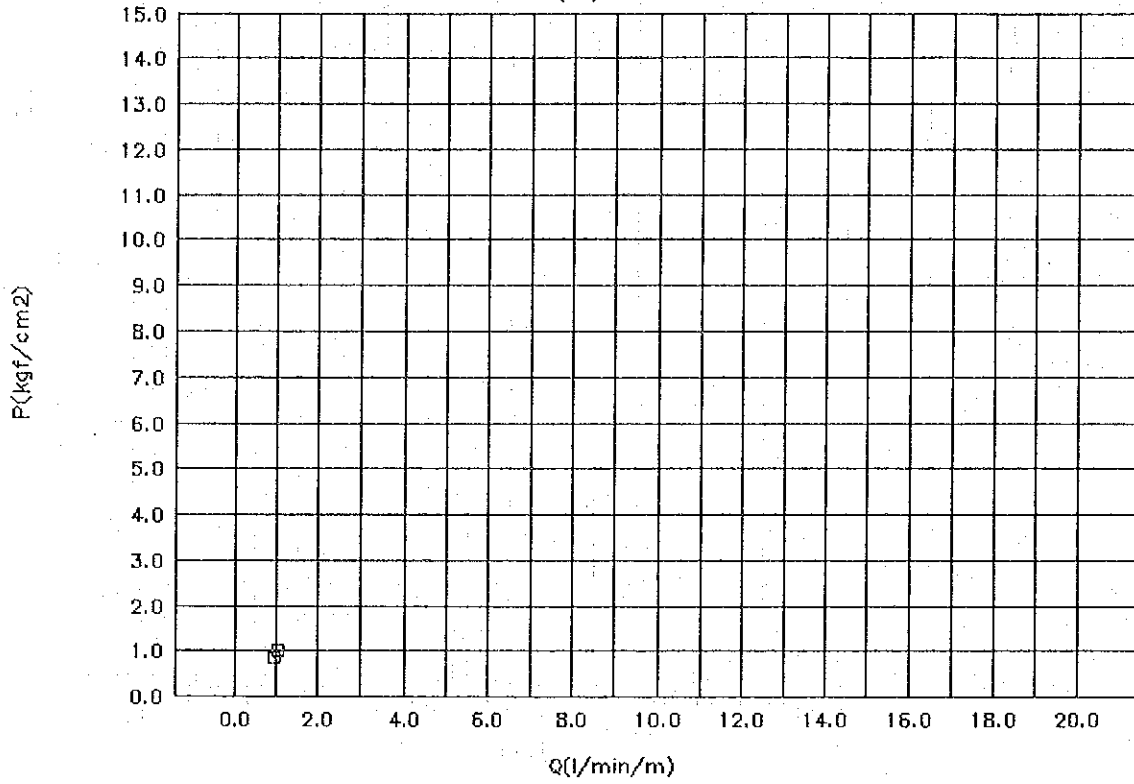
CONSTANT HEAD TEST

Kr-B(3) 13.5-15.0m



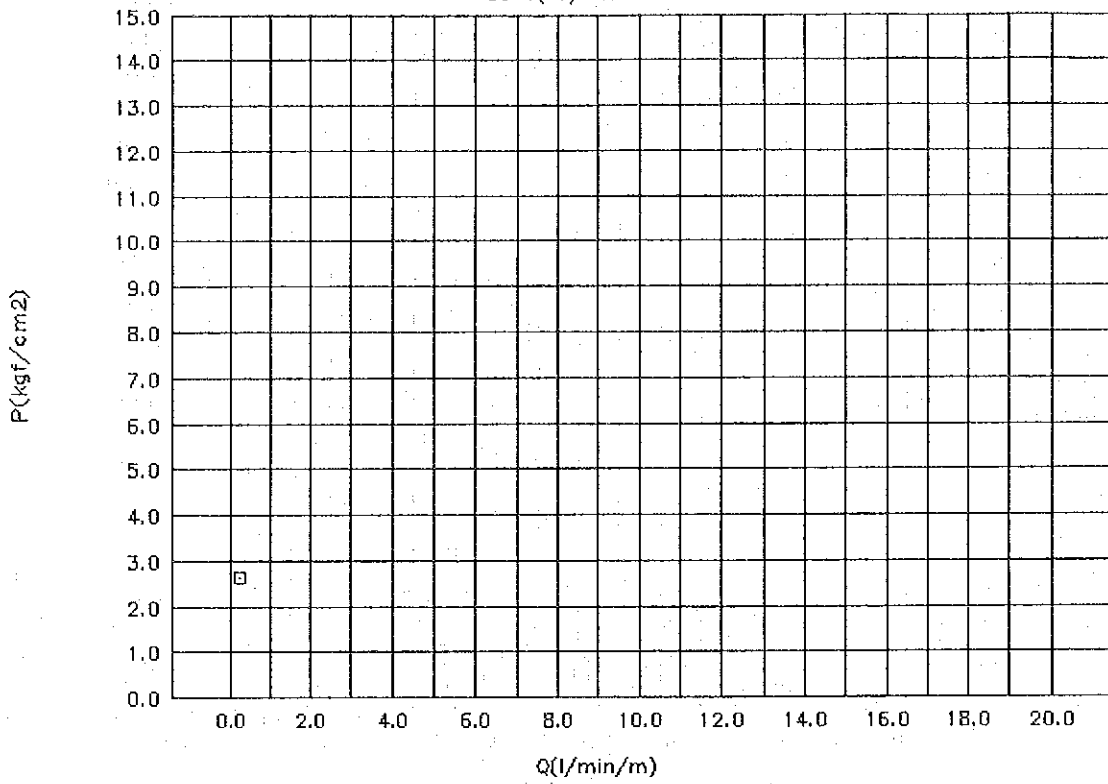
CONSTANT HEAD TEST

Kr-B(4)15.0~20.0m



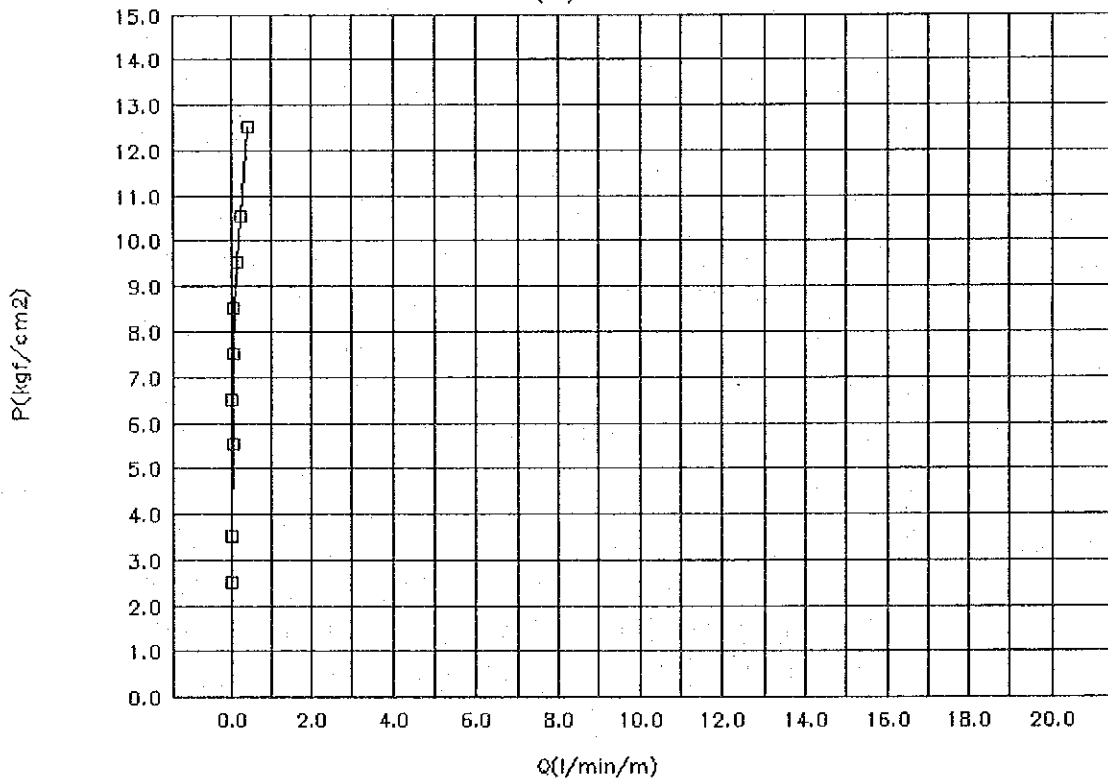
CONSTANT HEAD TEST

Dt-1(1) 1.5- 5.0m



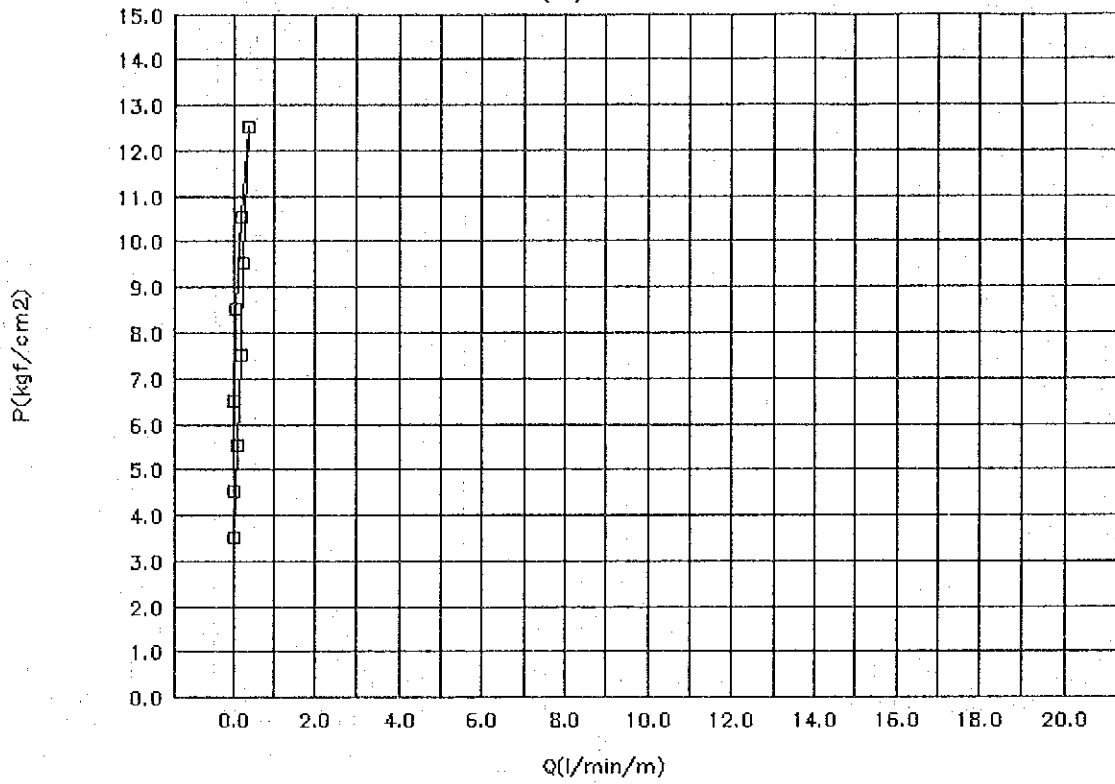
LUGEON TEST

Dt-1(2) 5.0-10.0m



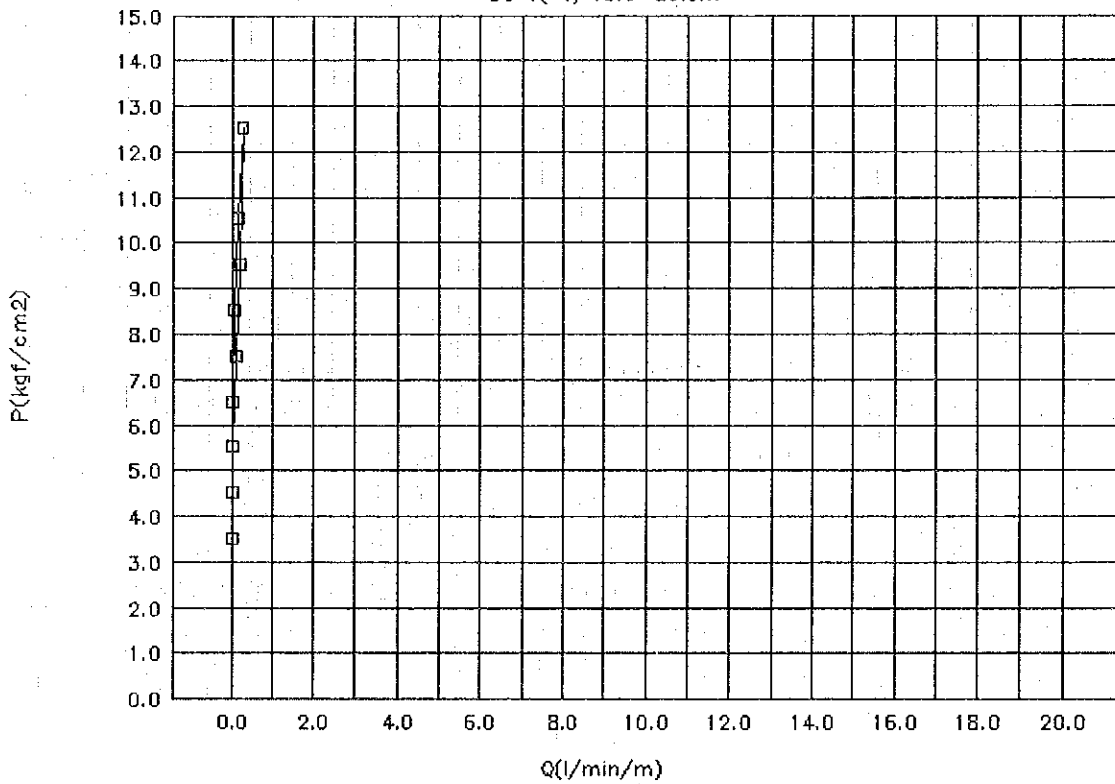
LUGEON TEST

Dt-1(3) 10.0-15.0m



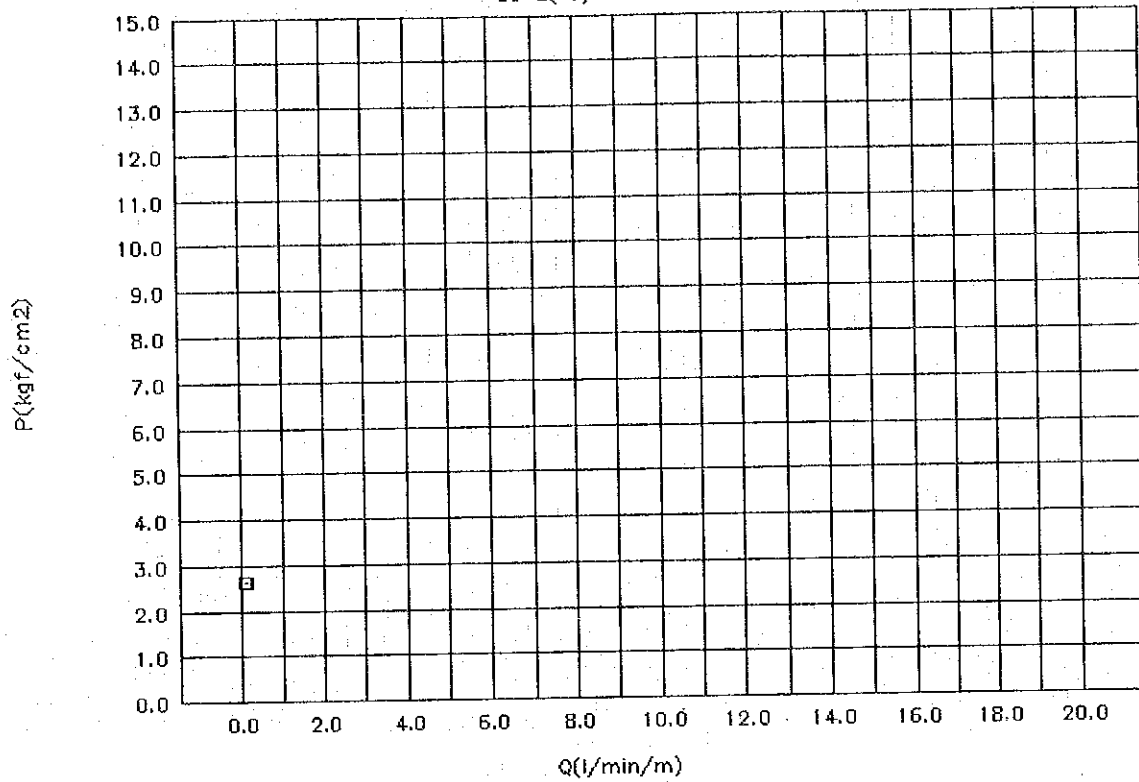
LUGEON TEST

Dt-1(4) 15.0-20.0m



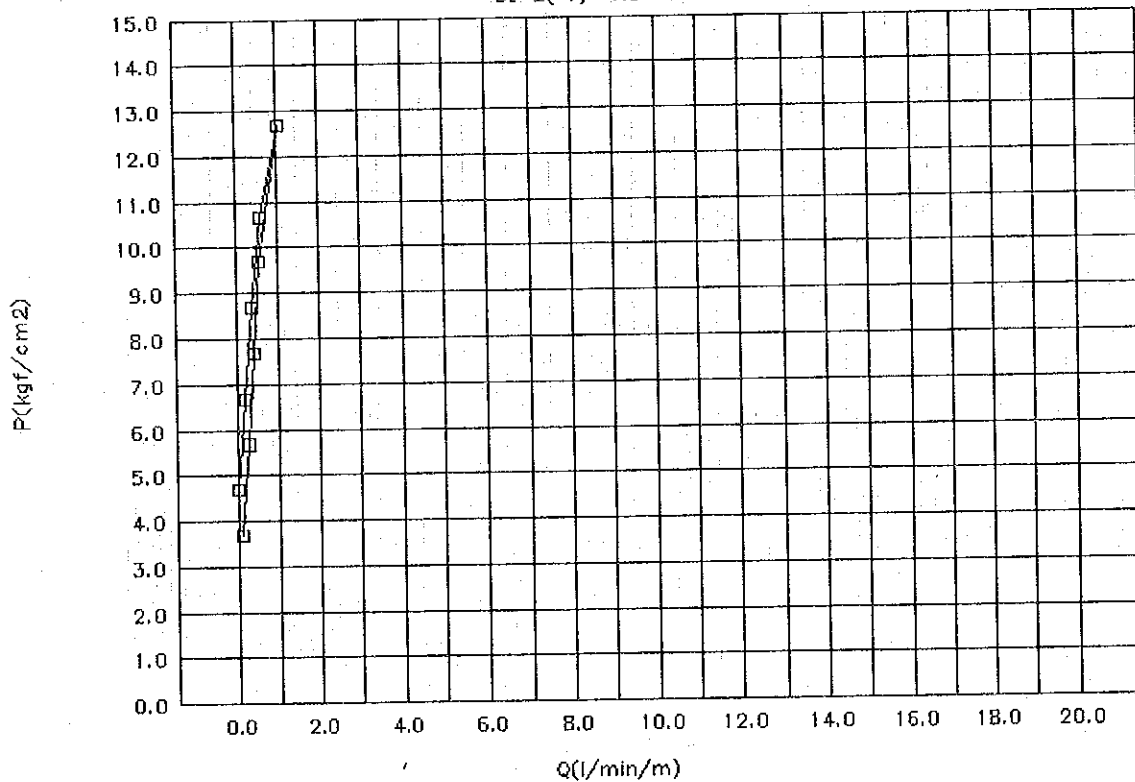
CONSTANT HEAD TEST

Dt-2(1) 1.5- 5.0m



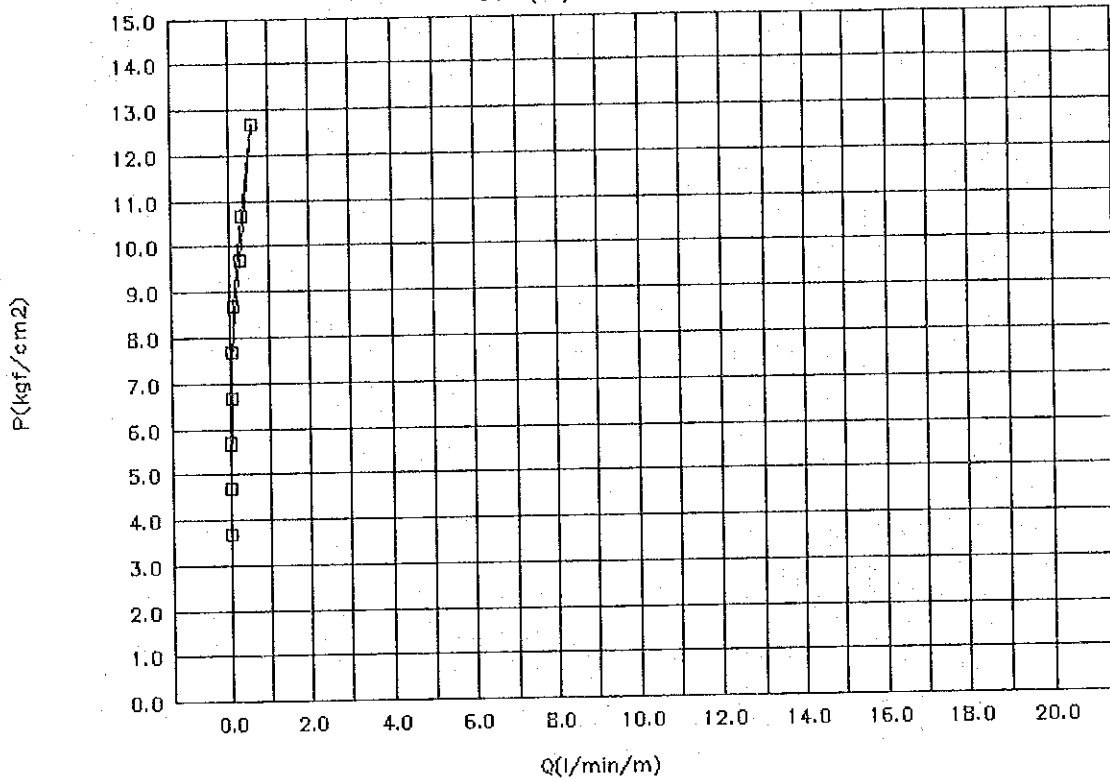
CONSTANT HEAD TEST

Dt-2(1) 1.5- 5.0m



LUGEON TEST

Dt-2(3) 10.0-15.0m



LUGEON TEST

Dt-2(4) 15.0-20.0m

