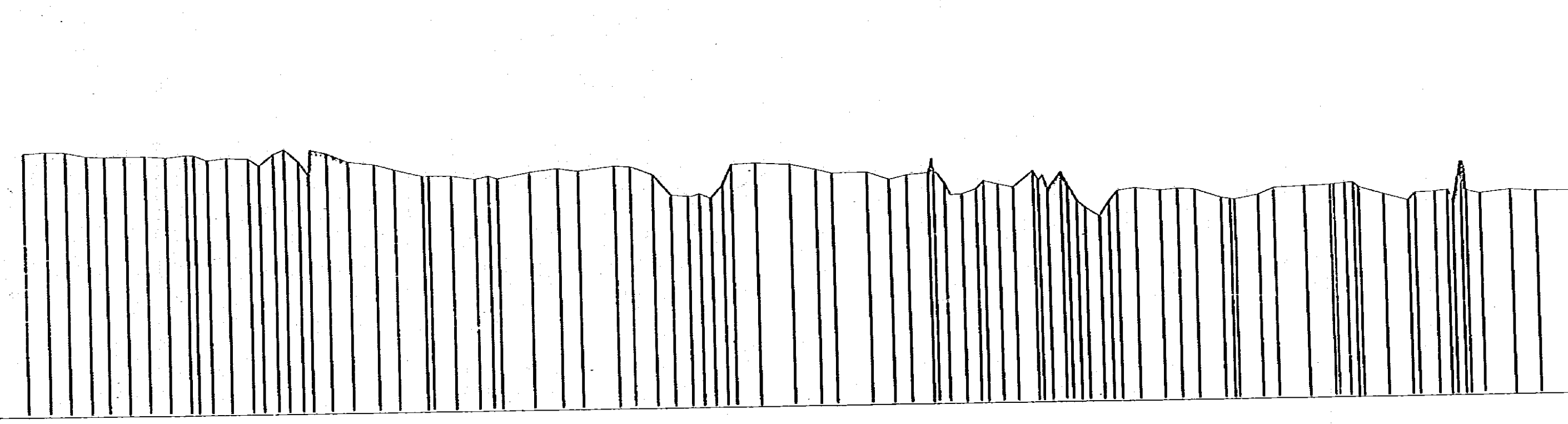
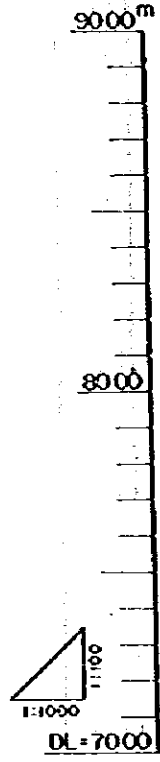
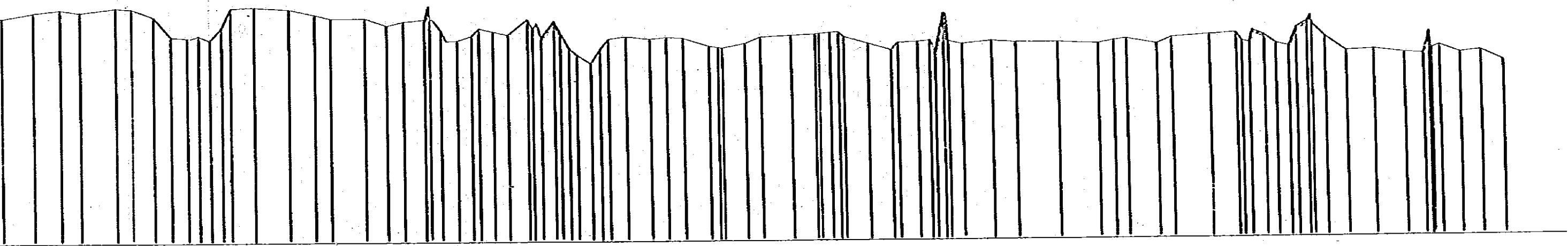


JAPAN INTERNATIONAL COOPERATION AGENCY
 TOKYO JAPAN
 FEASIBILITY STUDY OF TEKAI HYDRO ELECTRIC
 POWER DEVELOPMENT PROJECT
 Lower Tekai
 Longitudinal Profiling and Cross Section
 FIGURE 4-2

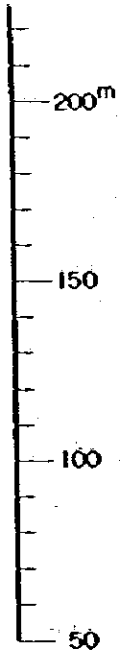


Station	Distance	Total Distance	Ground Height
NO.1	0.00	0.00	83.13
	11.50	11.50	83.24
	30.50	30.50	83.22
	31.00	31.00	83.02
	40.00	40.00	82.97
NO.2	100.00	100.00	82.99
	100.00	200.00	83.02
	100.00	300.00	82.97
	100.00	400.00	83.04
	100.00	500.00	82.99
	100.00	600.00	83.02
	100.00	700.00	82.97
	100.00	800.00	83.04
	100.00	900.00	82.99
	100.00	1000.00	83.02
	100.00	1100.00	82.97
	100.00	1200.00	83.04
	100.00	1300.00	82.99
	100.00	1400.00	83.02
	100.00	1500.00	82.97
	100.00	1600.00	83.04
	100.00	1700.00	82.99
	100.00	1800.00	83.02
	100.00	1900.00	82.97
	100.00	2000.00	83.04
	100.00	2100.00	82.99
	100.00	2200.00	83.02
	100.00	2300.00	82.97
	100.00	2400.00	83.04
	100.00	2500.00	82.99
	100.00	2600.00	83.02
	100.00	2700.00	82.97
	100.00	2800.00	83.04
	100.00	2900.00	82.99
	100.00	3000.00	83.02
	100.00	3100.00	82.97
	100.00	3200.00	83.04
	100.00	3300.00	82.99
	100.00	3400.00	83.02
	100.00	3500.00	82.97
	100.00	3600.00	83.04
	100.00	3700.00	82.99
	100.00	3800.00	83.02
	100.00	3900.00	82.97
	100.00	4000.00	83.04
	100.00	4100.00	82.99
	100.00	4200.00	83.02
	100.00	4300.00	82.97
	100.00	4400.00	83.04
	100.00	4500.00	82.99
	100.00	4600.00	83.02
	100.00	4700.00	82.97
	100.00	4800.00	83.04
	100.00	4900.00	82.99
	100.00	5000.00	83.02
	100.00	5100.00	82.97
	100.00	5200.00	83.04
	100.00	5300.00	82.99
	100.00	5400.00	83.02
	100.00	5500.00	82.97
	100.00	5600.00	83.04
	100.00	5700.00	82.99
	100.00	5800.00	83.02
	100.00	5900.00	82.97
	100.00	6000.00	83.04
	100.00	6100.00	82.99
	100.00	6200.00	83.02
	100.00	6300.00	82.97
	100.00	6400.00	83.04
	100.00	6500.00	82.99
	100.00	6600.00	83.02
	100.00	6700.00	82.97
	100.00	6800.00	83.04
	100.00	6900.00	82.99
	100.00	7000.00	83.02
	100.00	7100.00	82.97
	100.00	7200.00	83.04
	100.00	7300.00	82.99
	100.00	7400.00	83.02
	100.00	7500.00	82.97
	100.00	7600.00	83.04
	100.00	7700.00	82.99
	100.00	7800.00	83.02
	100.00	7900.00	82.97
	100.00	8000.00	83.04
	100.00	8100.00	82.99
	100.00	8200.00	83.02
	100.00	8300.00	82.97
	100.00	8400.00	83.04
	100.00	8500.00	82.99
	100.00	8600.00	83.02
	100.00	8700.00	82.97
	100.00	8800.00	83.04
	100.00	8900.00	82.99
	100.00	9000.00	83.02
	100.00	9100.00	82.97
	100.00	9200.00	83.04
	100.00	9300.00	82.99
	100.00	9400.00	83.02
	100.00	9500.00	82.97
	100.00	9600.00	83.04
	100.00	9700.00	82.99
	100.00	9800.00	83.02
	100.00	9900.00	82.97
	100.00	10000.00	83.04



NO.6	4.30	234.00	81.61
	16.00	250.00	81.93
	14.00	264.00	82.05
	10.00	274.00	81.94
	18.00	292.00	82.14
NO.7	8.00	300.00	82.11
	11.00	311.00	81.69
	9.00	320.00	80.85
	8.50	328.50	80.58
	5.80	334.10	80.87
	5.40	339.50	80.43
NO.7'	6.00	345.50	81.11
NO.8	4.50	350.00	82.16
	11.90	361.90	82.20
	17.20	379.10	82.12
	13.00	392.10	81.79
NO.9	7.90	400.00	81.06
	17.40	417.40	81.08
	10.70	428.10	81.25
	8.70	436.80	81.43
NO.10	10.80	447.60	81.57
	5.90	453.50	81.57
	6.40	463.90	80.84
	7.30	471.20	80.74
NO.11	3.80	475.00	81.16
	7.40	482.40	80.97
	7.60	490.00	80.60
NO.12	19.00	503.00	80.95
	4.50	507.50	80.63
	6.90	513.40	81.97
	3.90	519.30	80.83
	4.20	525.50	79.71
NO.13	7.00	532.00	79.26
	4.80	536.80	80.00
	4.20	541.00	80.85
NO.14	9.00	550.00	80.66
	12.50	562.50	80.54
	8.50	571.00	80.60
	9.00	580.00	80.57
NO.15	13.20	593.20	80.12
	2.80	596.00	80.87
NO.16	13.20	612.00	80.26
	8.00	620.00	80.57
	15.50	635.50	80.64
	13.20	648.70	80.66
	3.80	652.50	80.77
	3.20	655.70	80.75
	2.50	662.20	80.56
NO.16'	12.50	675.00	80.18
	11.60	686.60	79.46
	3.50	690.10	80.25
NO.17	9.00	700.00	80.27
	9.10	709.10	80.34
	2.70	711.80	79.70
	4.30	716.10	81.26
	2.50	718.60	80.29
	7.10	722.40	80.14
NO.18	15.40	737.80	80.29
	12.20	750.00	80.21
	21.70	771.70	80.21
NO.19	20.40	792.10	80.11
	7.90	800.00	80.25
	6.50	808.50	80.36
	15.90	822.40	80.10
	7.90	830.30	80.44
NO.20	19.70	850.00	80.56
	13.40	863.40	80.64
	3.80	867.20	80.74
	7.70	877.90	80.50
	6.10	884.00	80.11
	6.50	890.50	79.80
	4.50	894.50	80.85
	2.70	897.20	81.23
NO.21	7.40	909.50	80.43
	10.70	920.20	79.86
	14.10	934.30	79.70
NO.22	15.70	950.00	79.36
	2.80	952.80	79.21
	4.00	956.80	80.67
	10.30	978.00	79.50
NO.23	10.50	988.50	79.82
	11.50	1000.00	79.10

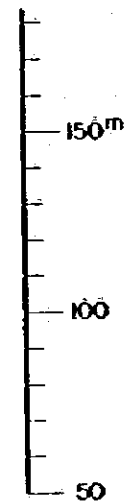
JAPAN INTERNATIONAL COOPERATION AGENCY
 TOKYO JAPAN
 FEASIBILITY STUDY OF TEKAI HYDRO-ELECTRIC
 POWER DEVELOPMENT PROJECT
UPPER TEKAI
 Longitudinal Profiling
 FIGURE 4-3



NO. 1

DL=5000

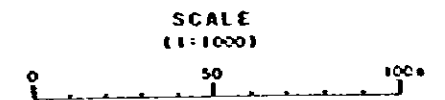
WL Aug 26 1981



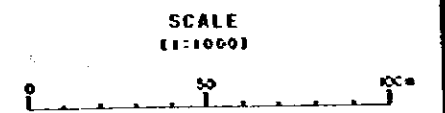
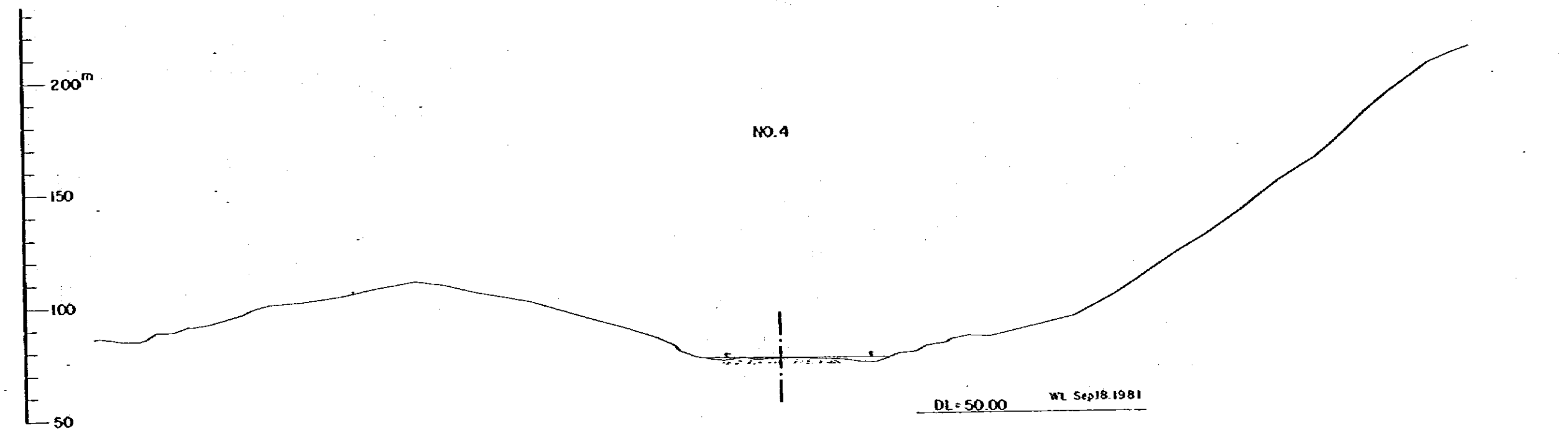
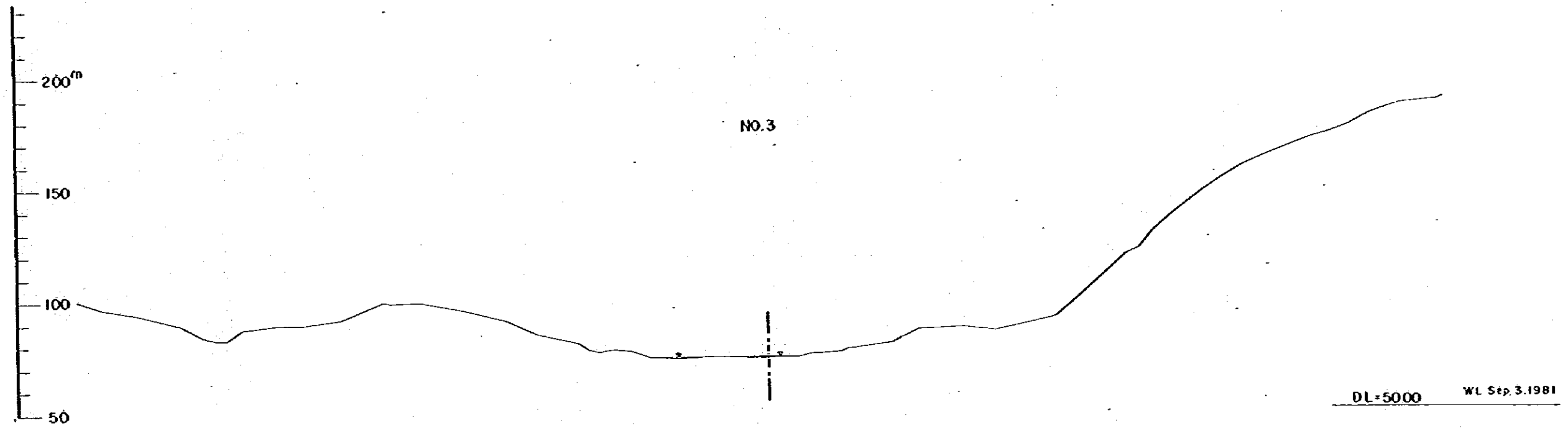
NO. 2

DL=5000

WL Aug 27 1981



JAPAN INTERNATIONAL COOPERATION AGENCY
TOKYO JAPAN
FEASIBILITY STUDY OF TEKAI HYDRO-ELECTRIC
POWER DEVELOPMENT PROJECT
UPPER TEKAI
Cross Section (NO.1, NO.2)
FIGURE 4-4



JAPAN INTERNATIONAL COOPERATION AGENCY
TOKYO JAPAN
FEASIBILITY STUDY OF TEKAI HYDRO-ELECTRIC
POWER DEVELOPMENT PROJECT
UPPER TEKAI
Cross Section (NO.3, NO.4)
FIGURE 4-5

200m
150
100
50

NO.5

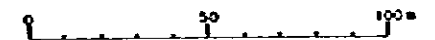
DL=50.00 WL Sep.18.1981

150m
100
50

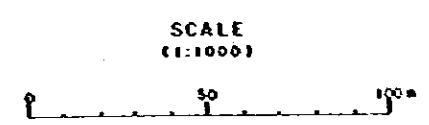
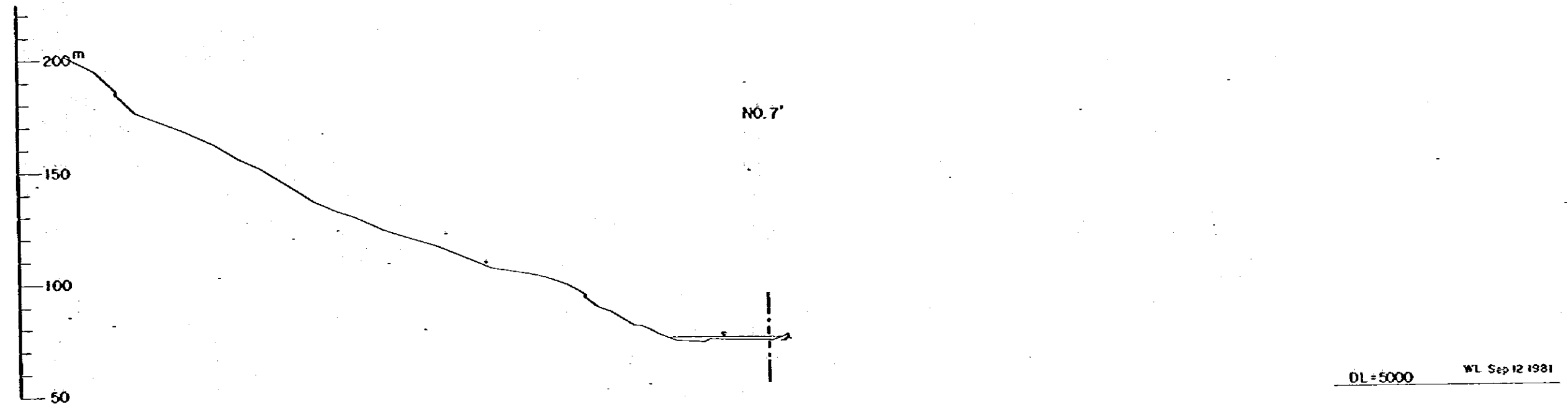
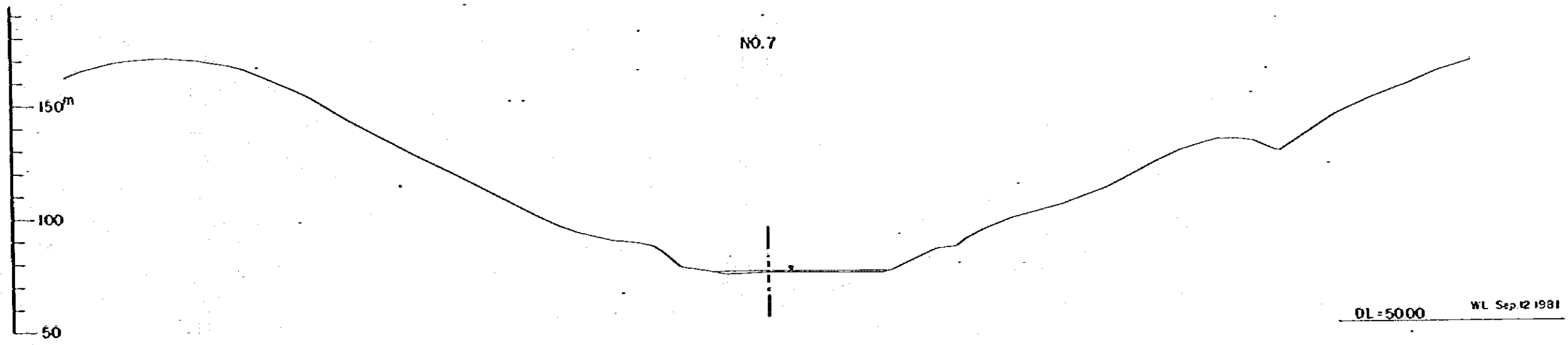
NO.6

DL=50.00 WL Sep.7.1981

SCALE
(1:1000)

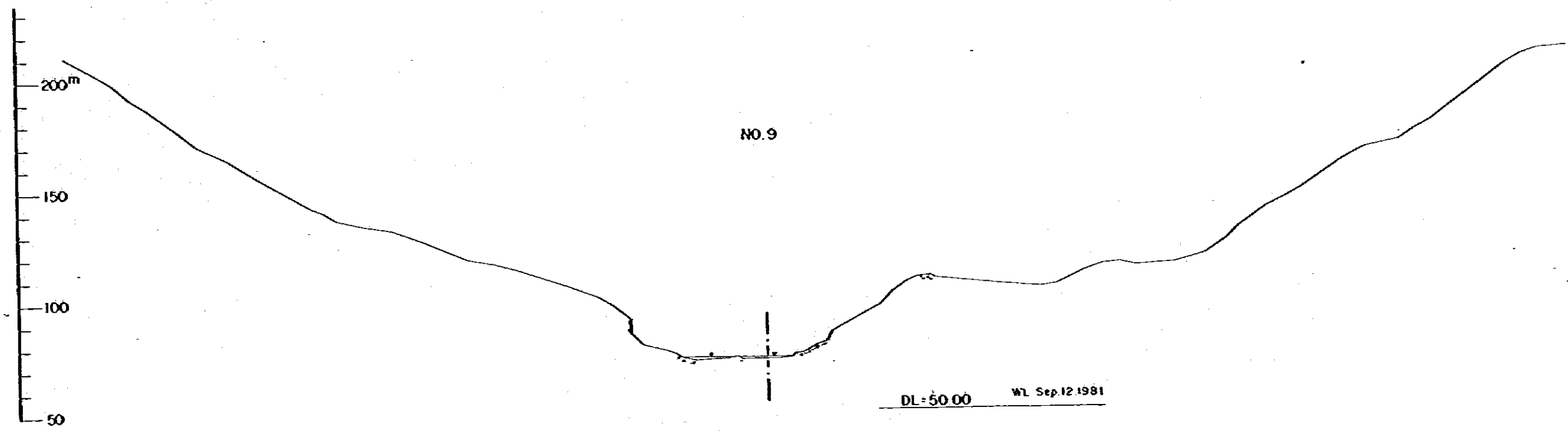
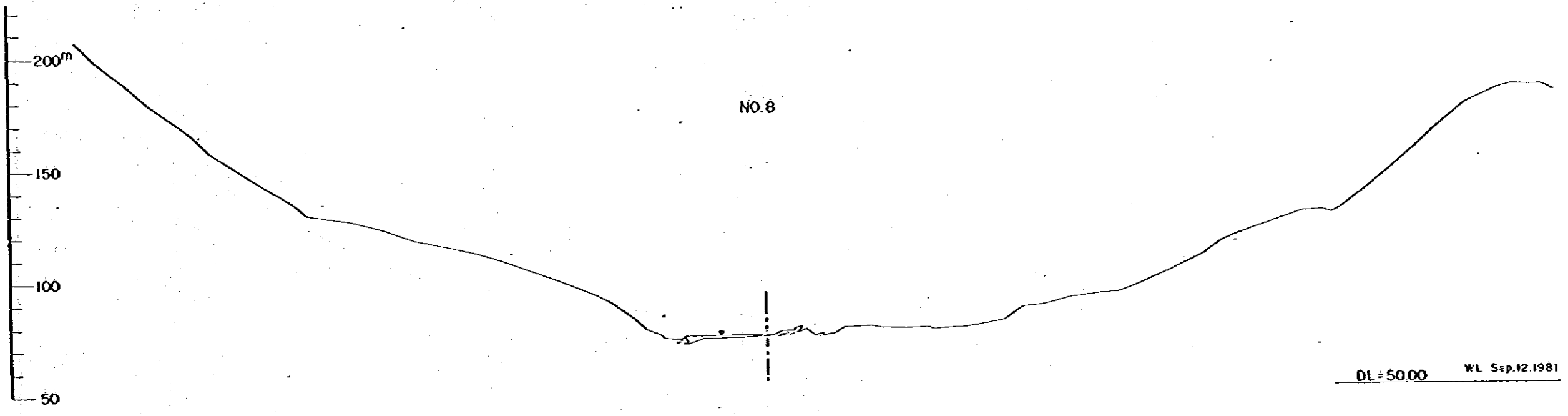


JAPAN INTERNATIONAL COOPERATION AGENCY
TOKYO JAPAN
FEASIBILITY STUDY OF TEKAI HYDRO-ELECTRIC
POWER DEVELOPMENT PROJECT
UPPER TEKAI
Cross Section (NO.5, NO.6)
FIGURE 4.6



JAPAN INTERNATIONAL COOPERATION AGENCY
 TOKYO JAPAN
 FEASIBILITY STUDY OF TEKAI HYDRO-ELECTRIC
 POWER DEVELOPMENT PROJECT
UPPER TEKAI
 Cross Section (NO.7, NO.7')

FIGURE 4-7

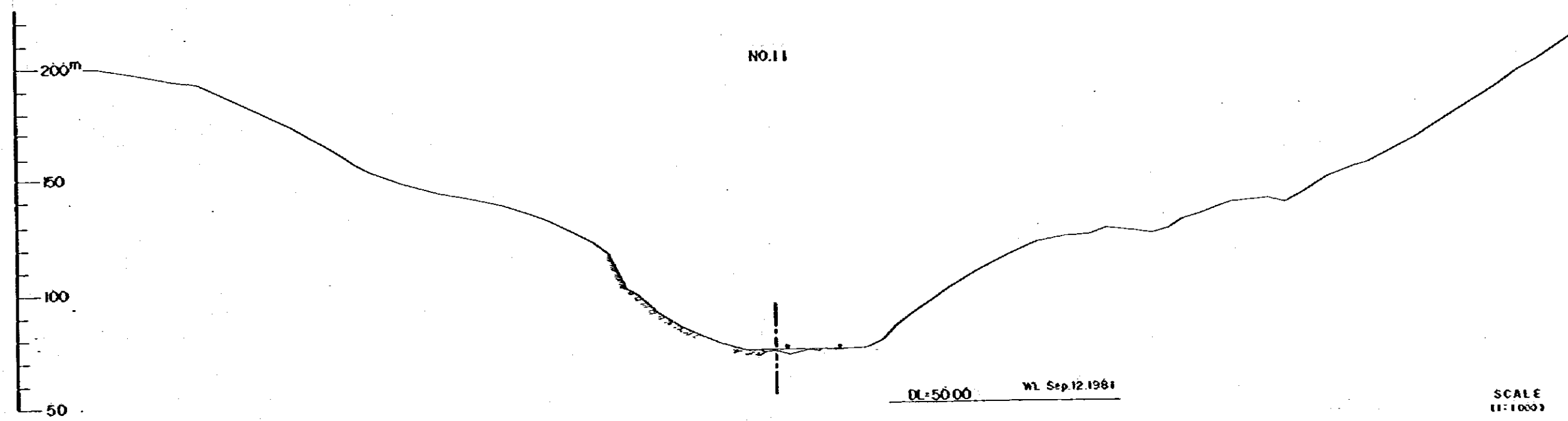
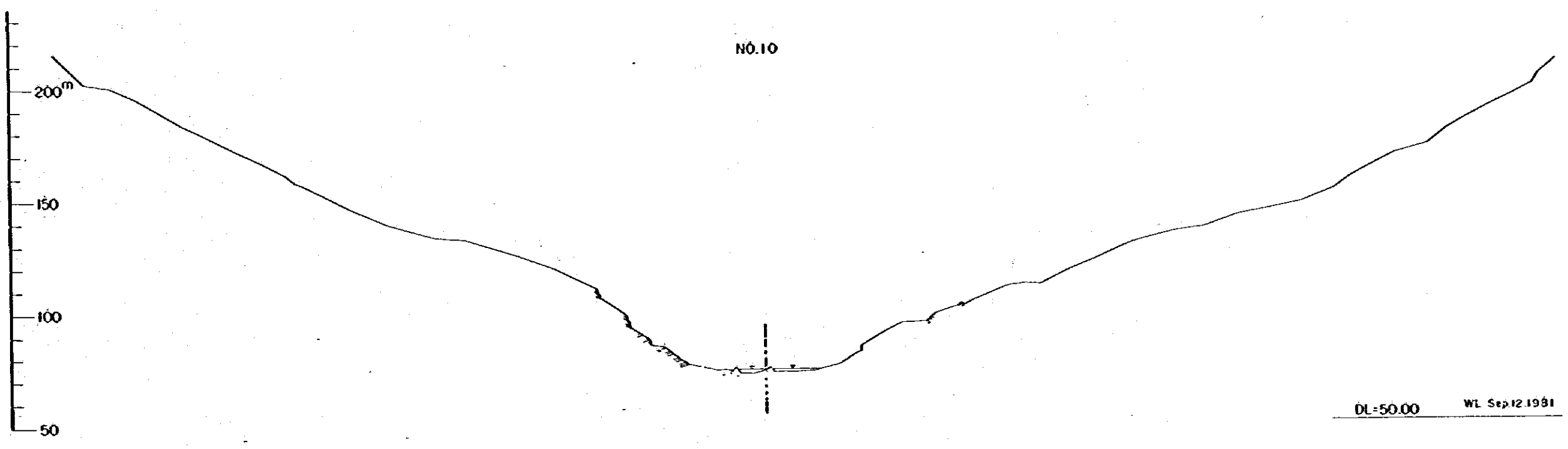


JAPAN INTERNATIONAL COOPERATION AGENCY
TOKYO JAPAN

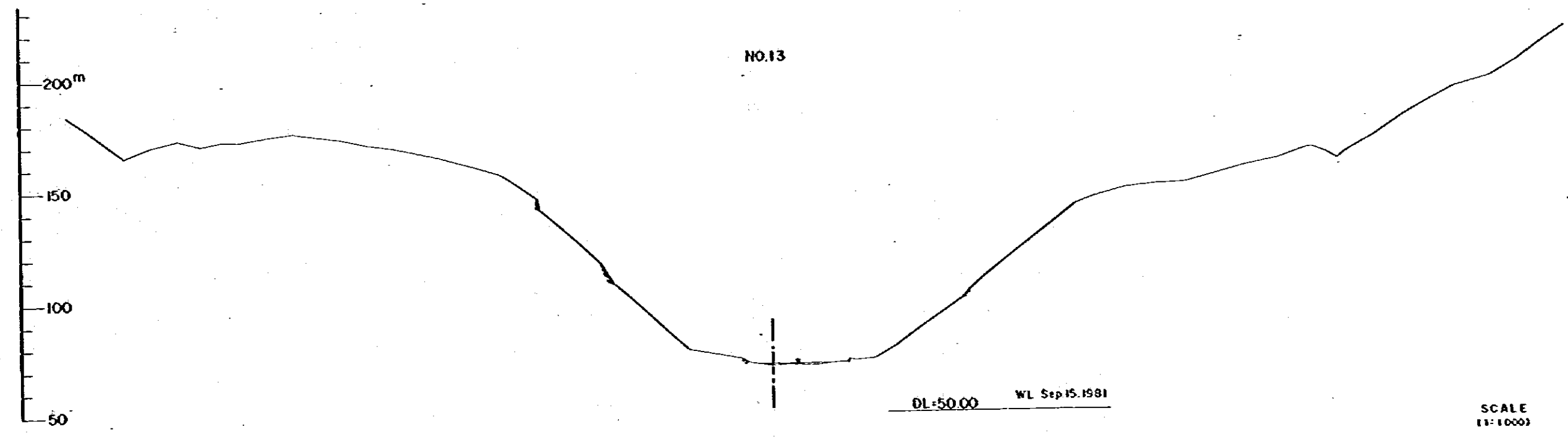
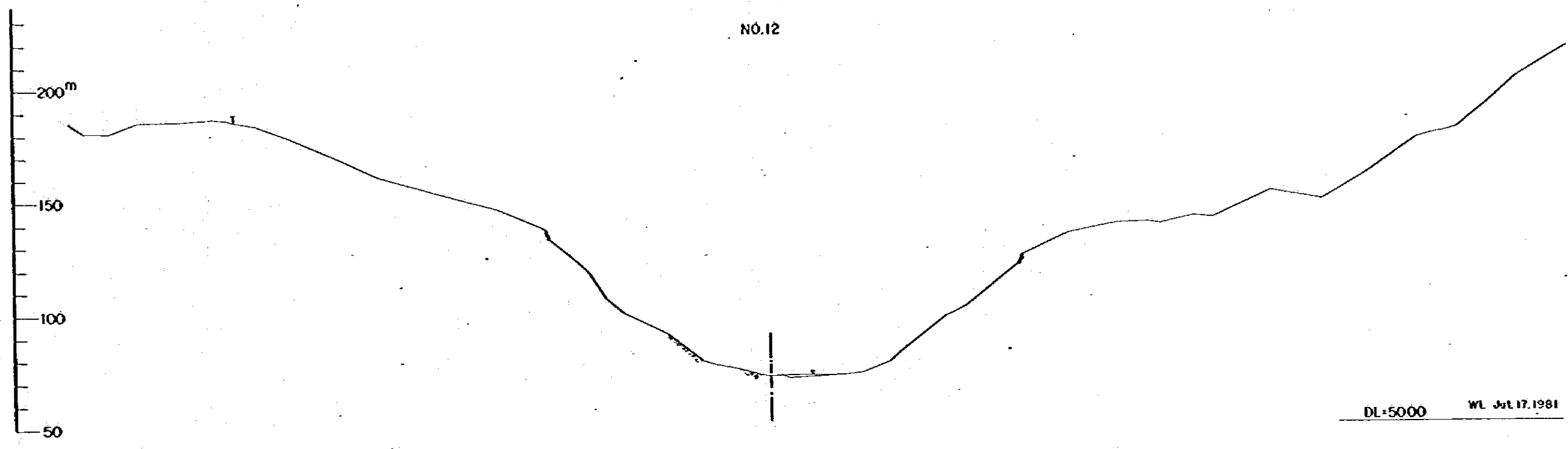
FEASIBILITY STUDY OF TEKAI HYDRO-ELECTRIC
POWER DEVELOPMENT PROJECT

UPPER TEKAI
Cross Section (NO.8, NO.9)

FIGURE 4-8



JAPAN INTERNATIONAL COOPERATION AGENCY
 TOKYO JAPAN
 FEASIBILITY STUDY OF TEKAI HYDRO-ELECTRIC
 POWER DEVELOPMENT PROJECT
 UPPER TEKAI
 Cross Section (NO.10,NO.11)
 FIGURE 4-9

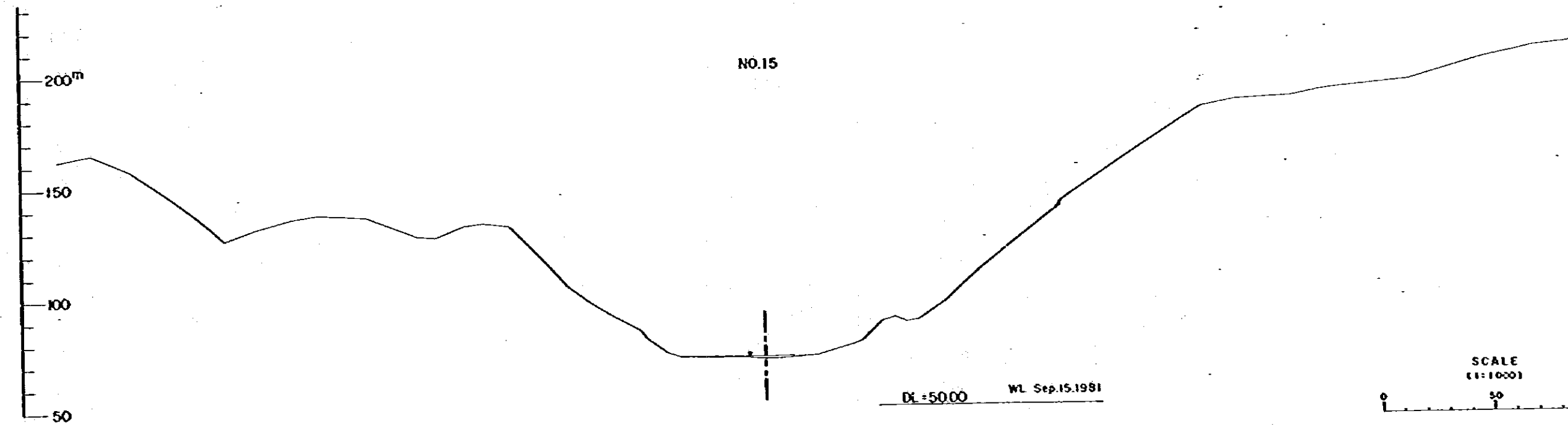
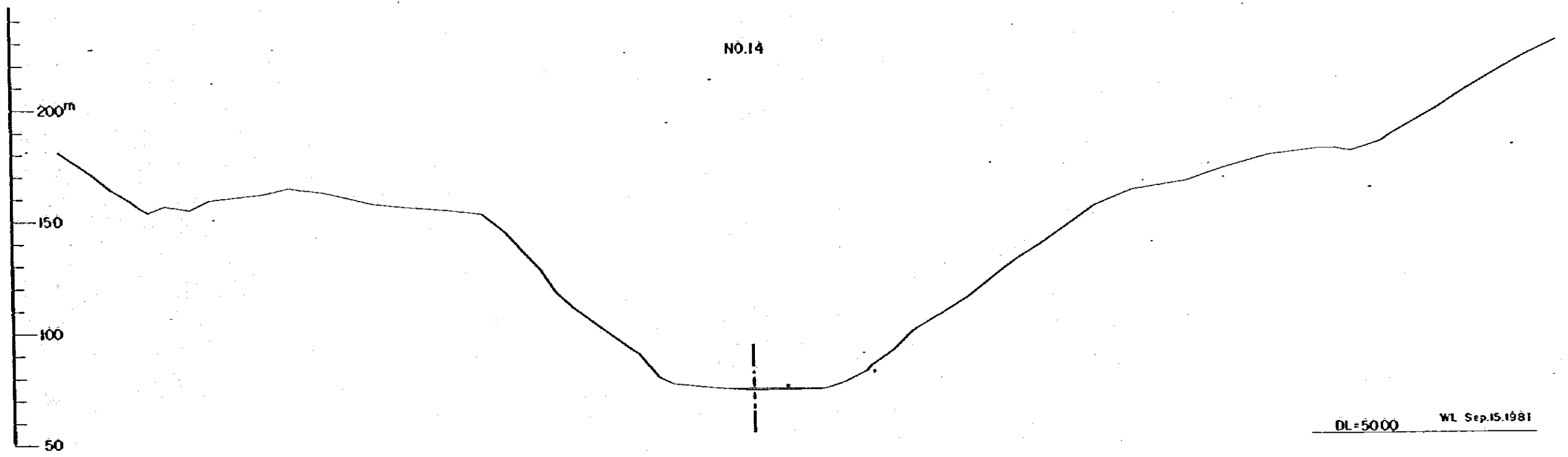


JAPAN INTERNATIONAL COOPERATION AGENCY
TOKYO JAPAN

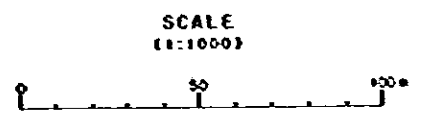
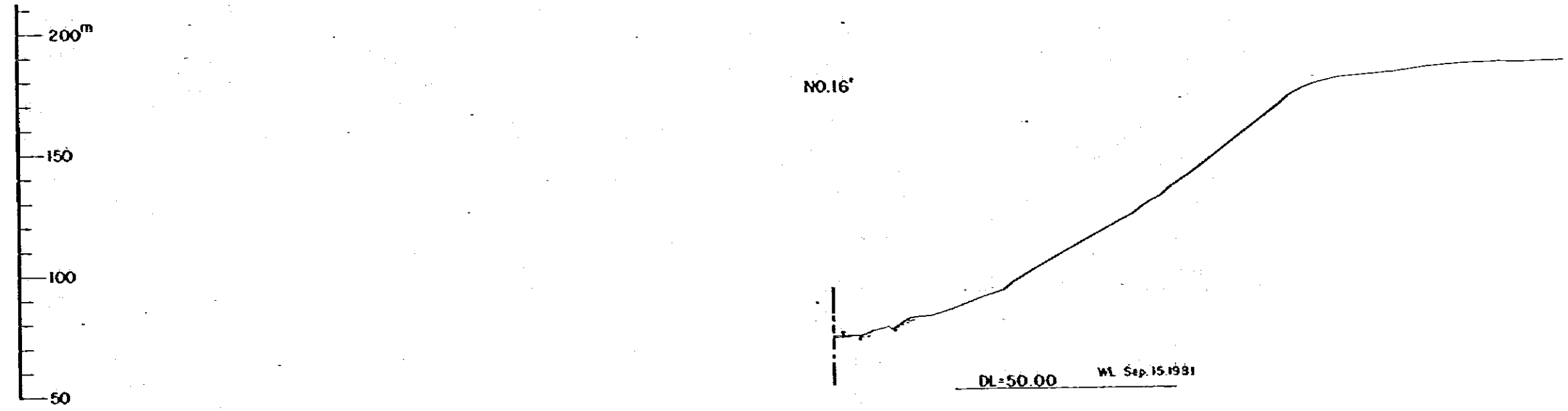
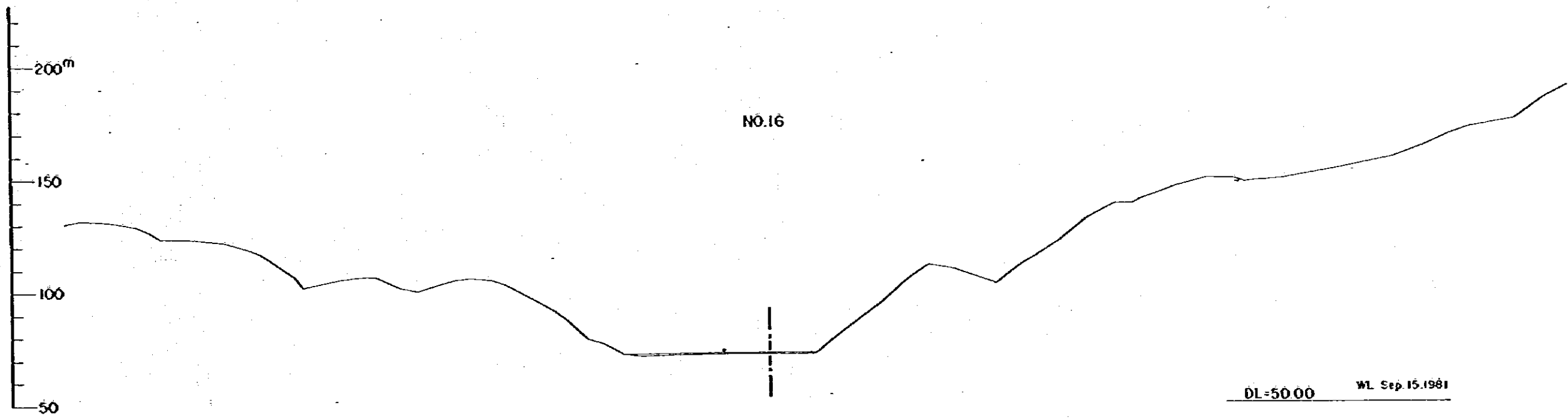
FEASIBILITY STUDY OF TEKAH HYDRO-ELECTRIC
POWER DEVELOPMENT PROJECT

UPPER TEKAI
Cross Section (NO.12, NO.13)

FIGURE 4-10

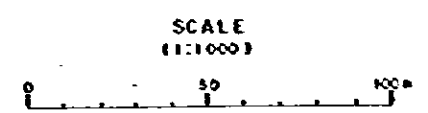
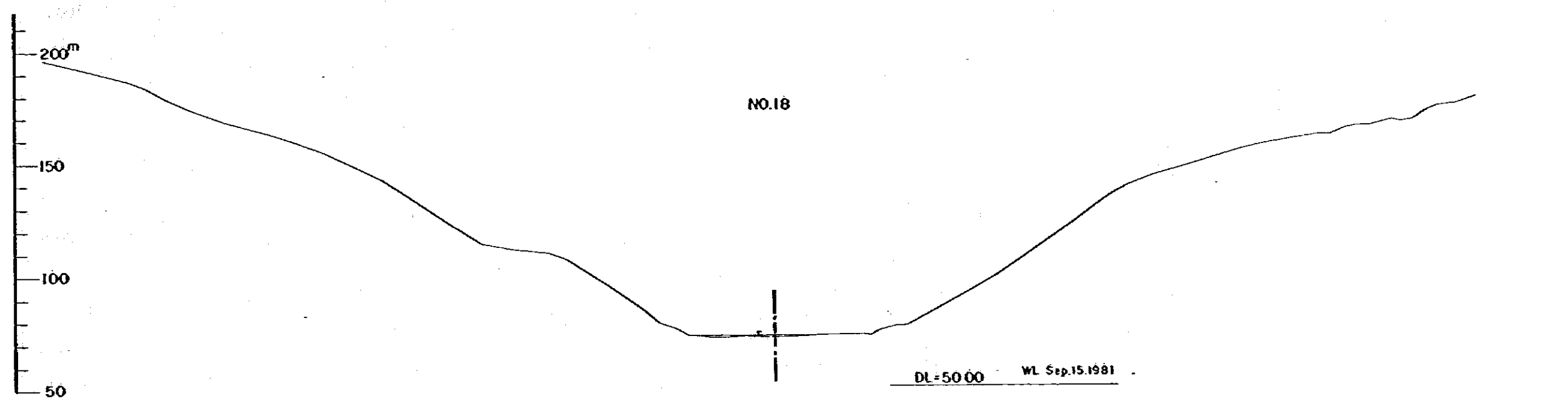
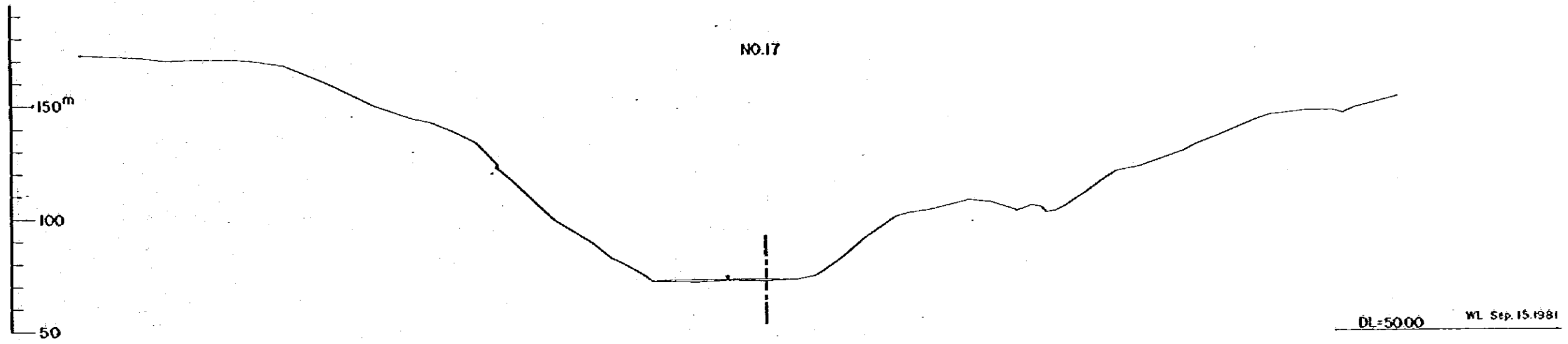


JAPAN INTERNATIONAL COOPERATION AGENCY
 TOKYO JAPAN
 FEASIBILITY STUDY OF TEKAI HYDRO-ELECTRIC
 POWER DEVELOPMENT PROJECT
UPPER TEKAI
 Cross Section (NO.14, NO.15)
 FIGURE 4-11



JAPAN INTERNATIONAL COOPERATION AGENCY
 TOKYO JAPAN
 FEASIBILITY STUDY OF TEKAI HYDRO-ELECTRIC
 POWER DEVELOPMENT PROJECT
UPPER TEKAI
 Cross Section (NO.16, NO.16')

FIGURE 4-12

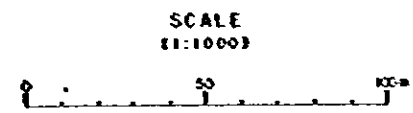
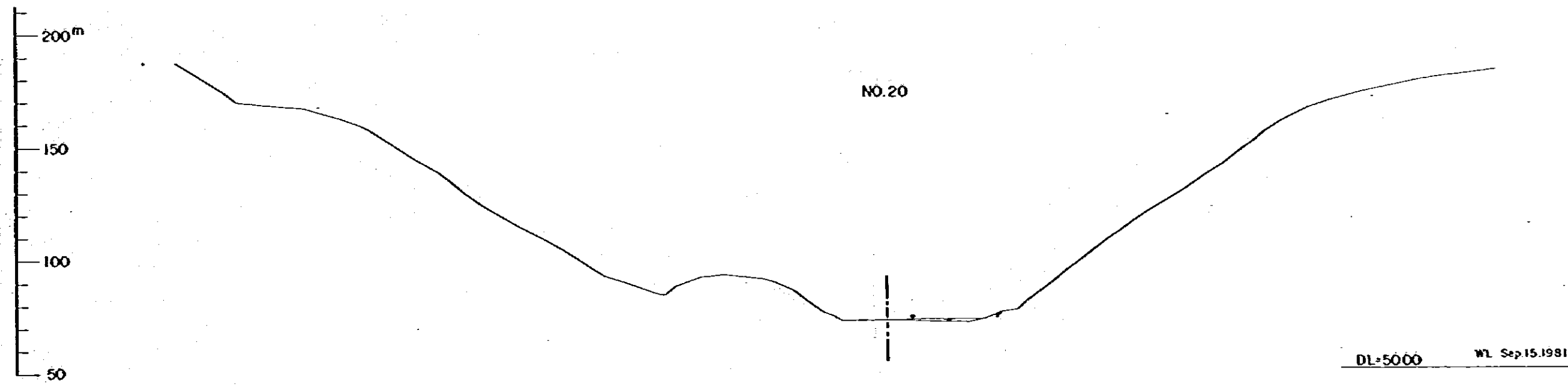
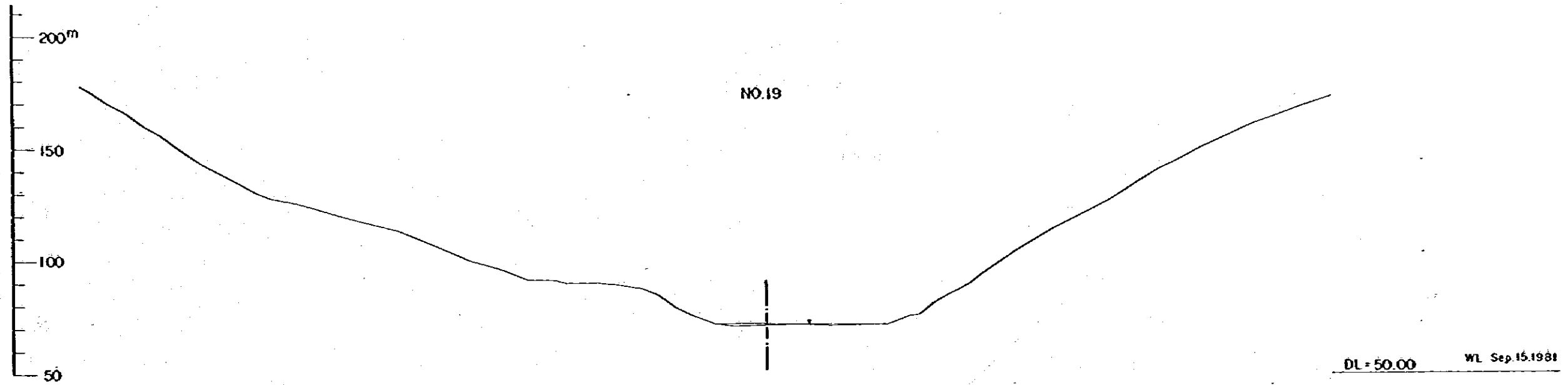


JAPAN INTERNATIONAL COOPERATION AGENCY
TOKYO JAPAN

FEASIBILITY STUDY OF TEKAI HYDRO-ELECTRIC
POWER DEVELOPMENT PROJECT

UPPER TEKAI
Cross Section (NO.17, NO.18)

FIGURE 4-13

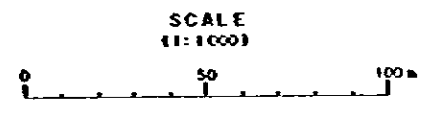
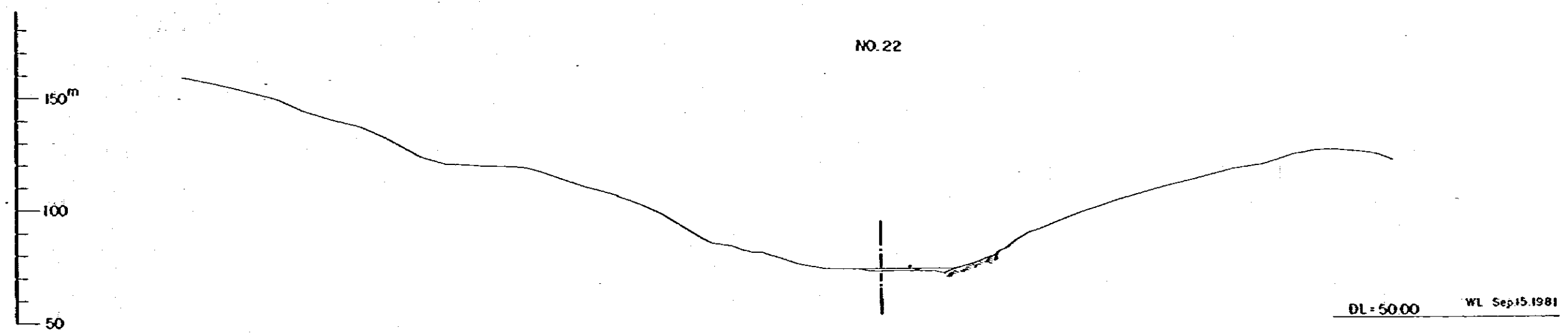
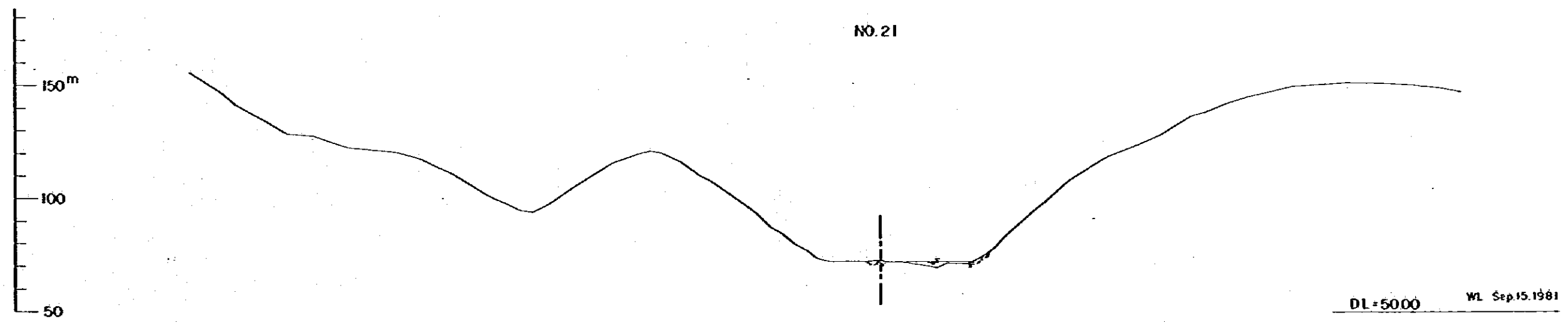


JAPAN INTERNATIONAL COOPERATION AGENCY
TOKYO, JAPAN

FEASIBILITY STUDY OF TEKAI HYDRO-ELECTRIC
POWER DEVELOPMENT PROJECT

UPPER TEKAI
Cross Section (NO.19, NO.20)

FIGURE 4-14

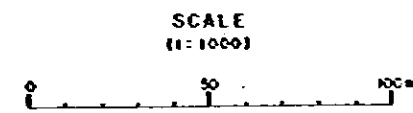
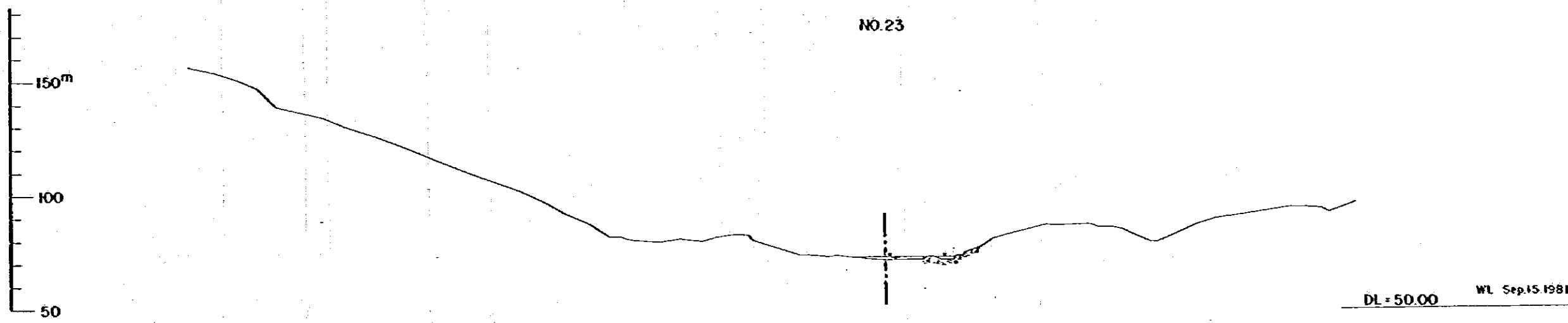


JAPAN INTERNATIONAL COOPERATION AGENCY
TOKYO JAPAN

FEASIBILITY STUDY OF TEKAI HYDRO-ELECTRIC
POWER DEVELOPMENT PROJECT

UPPER TEKAI
Cross Section (NO.21, NO.22)

FIGURE 4-15

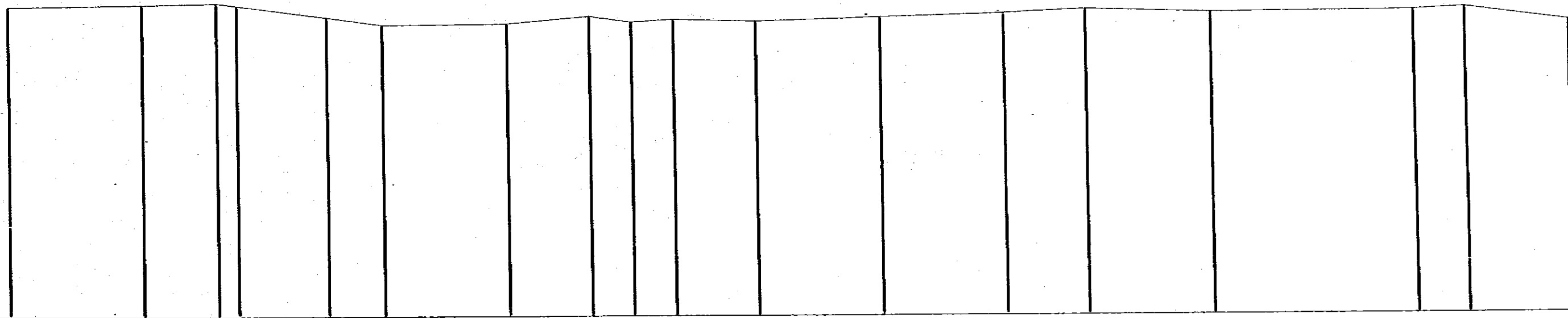
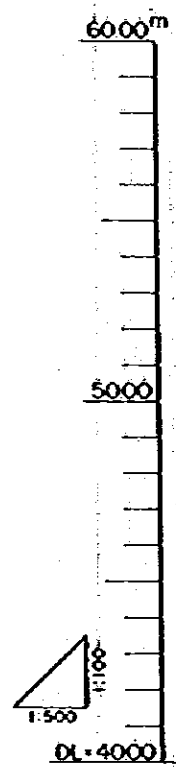


JAPAN INTERNATIONAL COOPERATION AGENCY
 TOKYO JAPAN

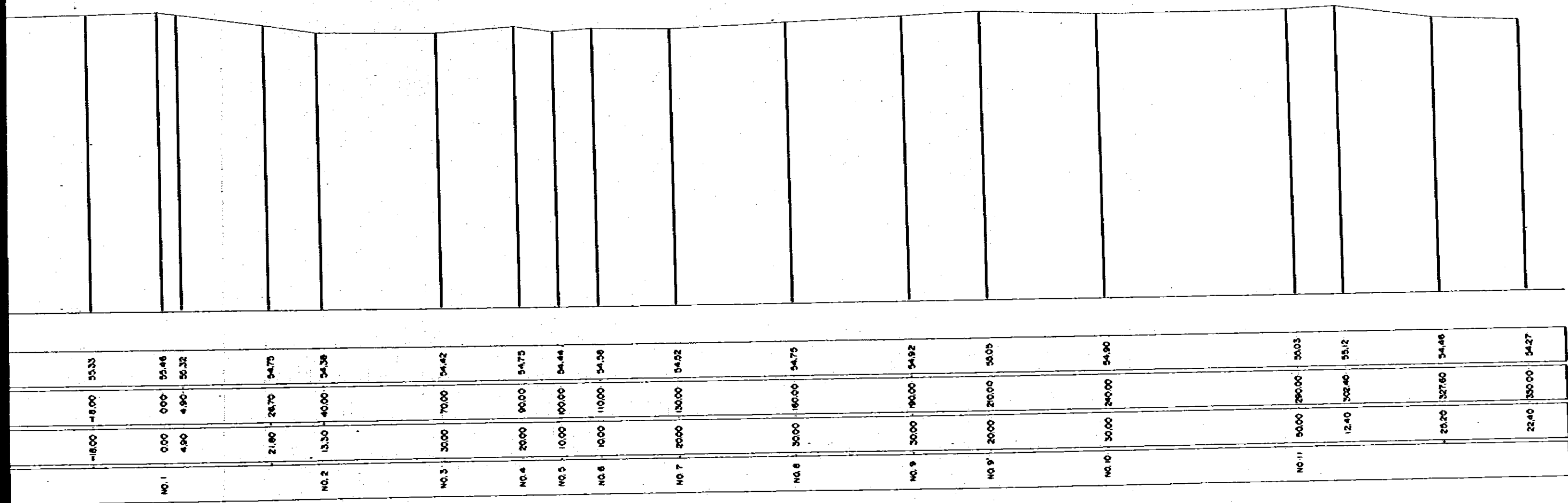
FEASIBILITY STUDY OF TEKAI HYDRO-ELECTRIC
 POWER DEVELOPMENT PROJECT

UPPER TEKAI
 Cross Section (NO. 23)

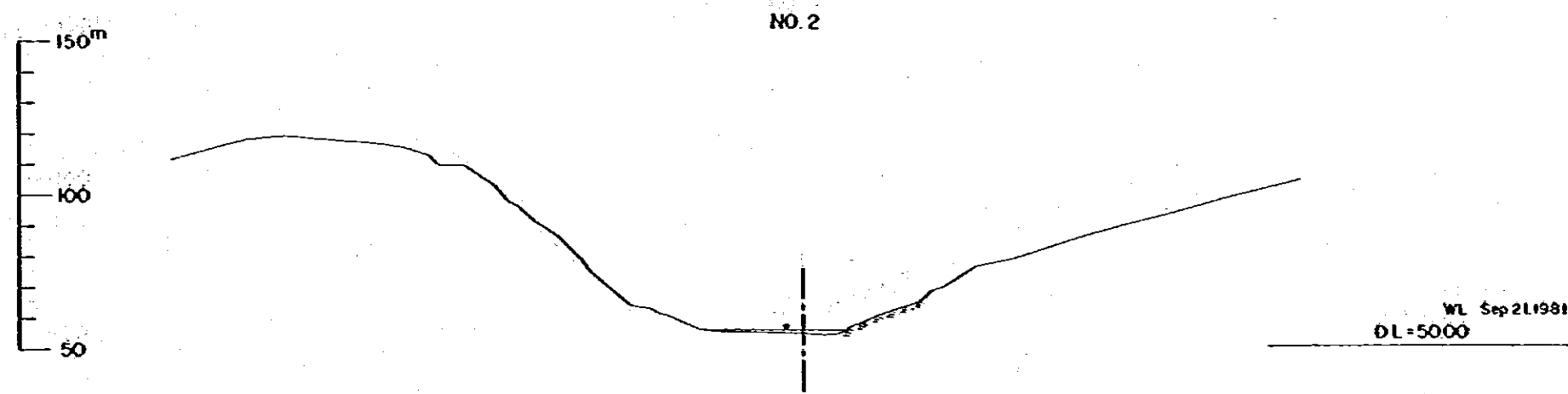
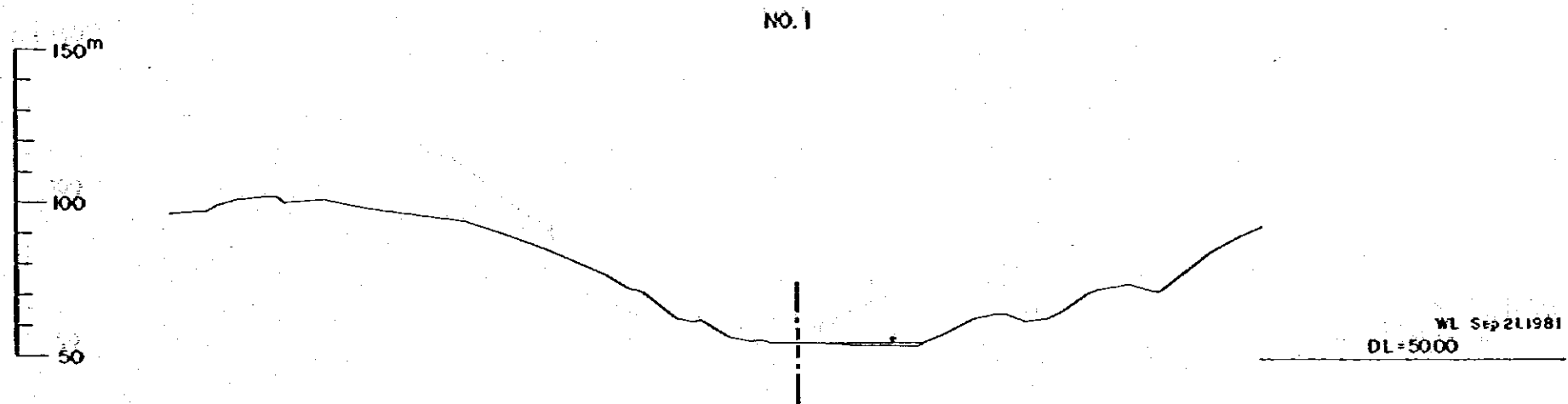
FIGURE 4-16



Station	Distance	Total Distance	Ground Height
NO. 0	-32.00	-50.00	55.32
	-18.00	-8.00	55.33
NO. 1	0.00	0.00	55.46
	4.90	4.90	55.32
	21.80	26.70	54.75
NO. 2	13.30	40.00	54.36
	30.00	70.00	54.42
NO. 3	20.00	90.00	54.75
NO. 5	10.00	100.00	54.44
NO. 6	10.00	110.00	54.58
NO. 7	20.00	130.00	54.52
	30.00	160.00	54.75
NO. 9	30.00	190.00	54.92
NO. 9	20.00	200.00	55.05
NO. 10	30.00	240.00	54.90
NO. 11	50.00	290.00	55.03
	12.40	302.40	55.12
		307.60	55.05



JAPAN INTERNATIONAL COOPERATION AGENCY
 TOKYO JAPAN
 FEASIBILITY STUDY OF TEKAI HYDRO-ELECTRIC
 POWER DEVELOPMENT PROJECT
LOWER TEKAI
 Longitudinal Profiling
 FIGURE 4-12

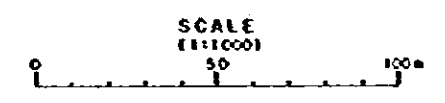
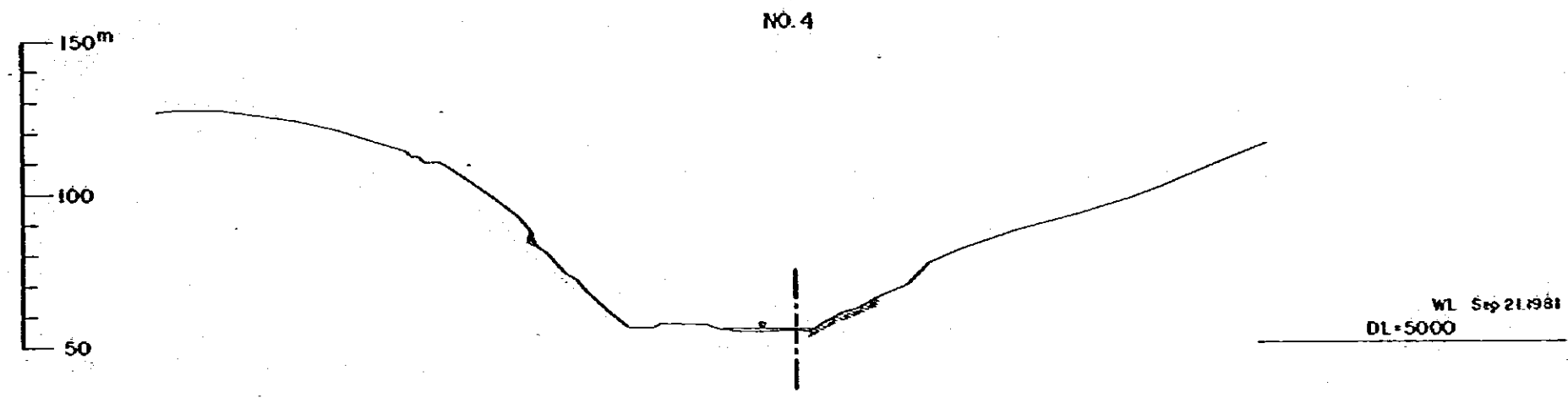
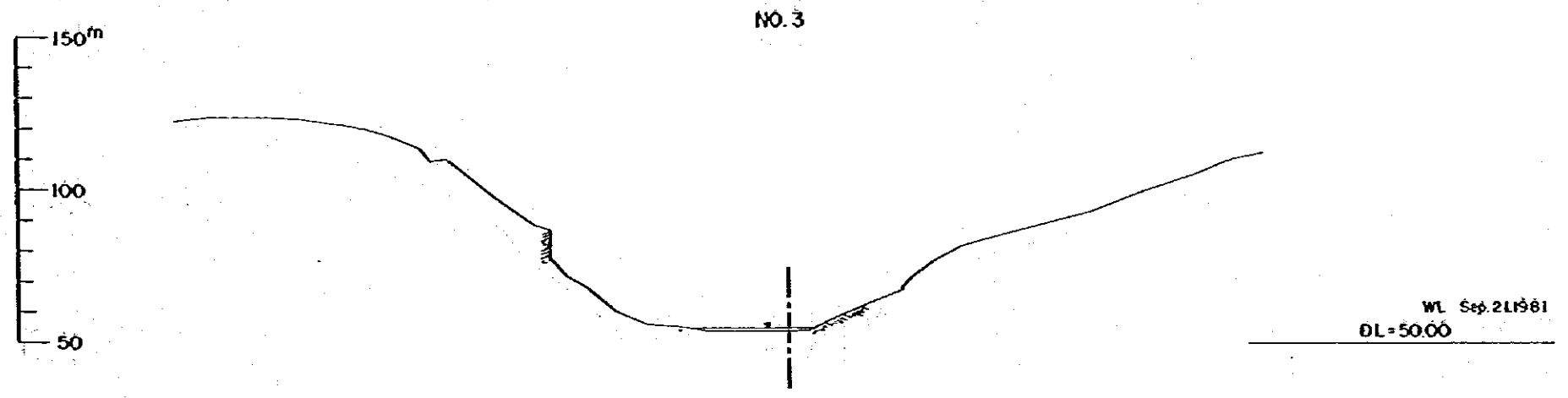


JAPAN INTERNATIONAL COOPERATION AGENCY
TOKYO JAPAN

FEASIBILITY STUDY OF TEXAS HYDRO-ELECTRIC
POWER DEVELOPMENT PROJECT

LOWER TEKAI
Cross Section (NO.1, NO.2)

FIGURE 4-18

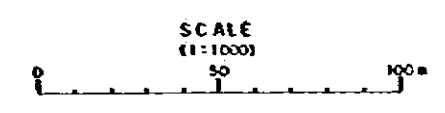
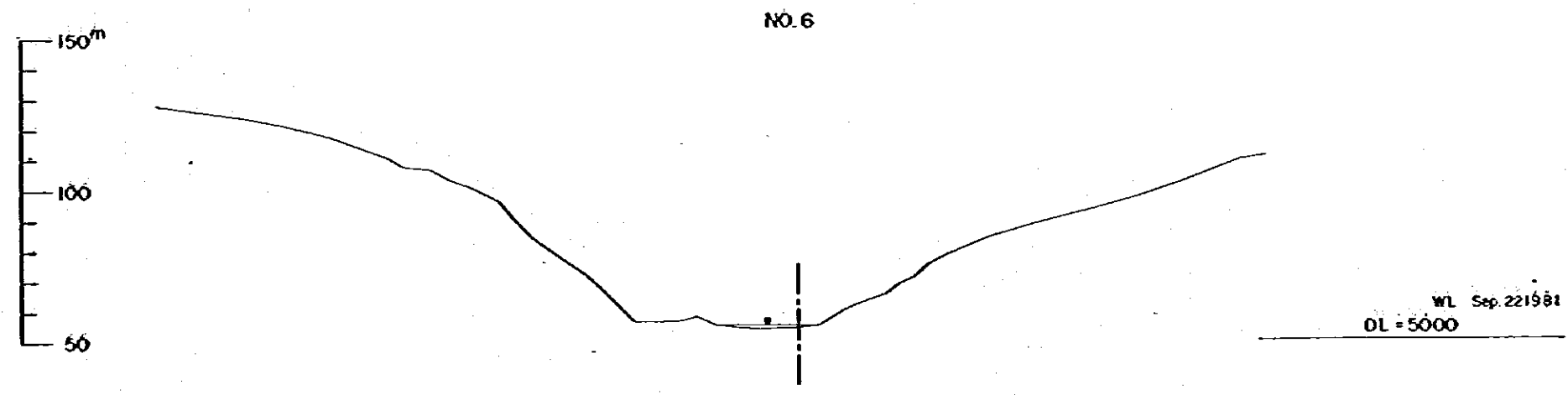
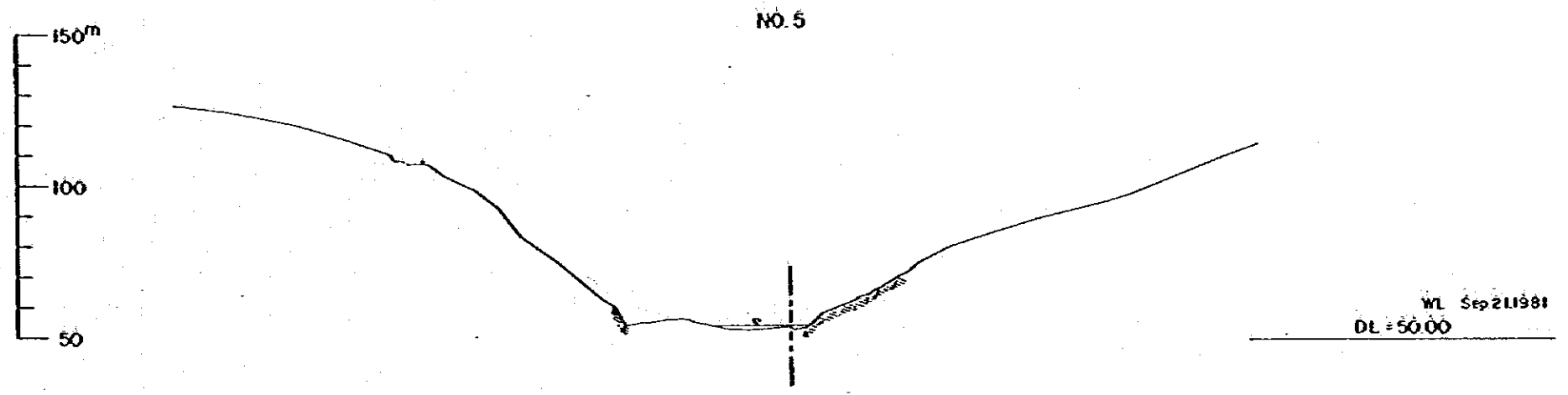


JAPAN INTERNATIONAL COOPERATION AGENCY
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FEASIBILITY STUDY OF TEKAI HYDRO-ELECTRIC
POWER DEVELOPMENT PROJECT

LOWER TEKAI
Cross Section (NO.3, NO.4)

FIGURE 4-19

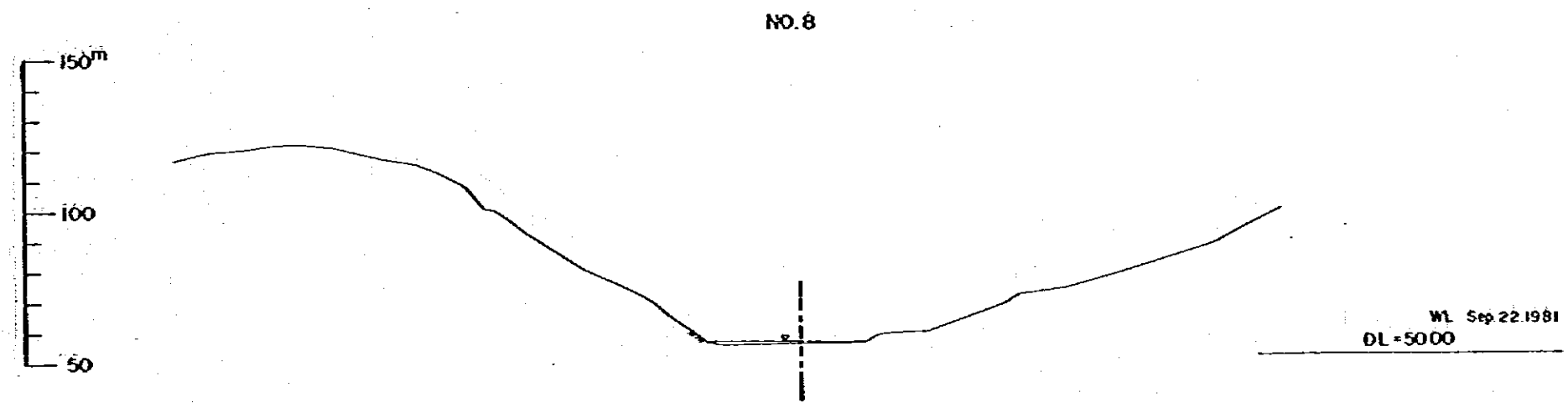
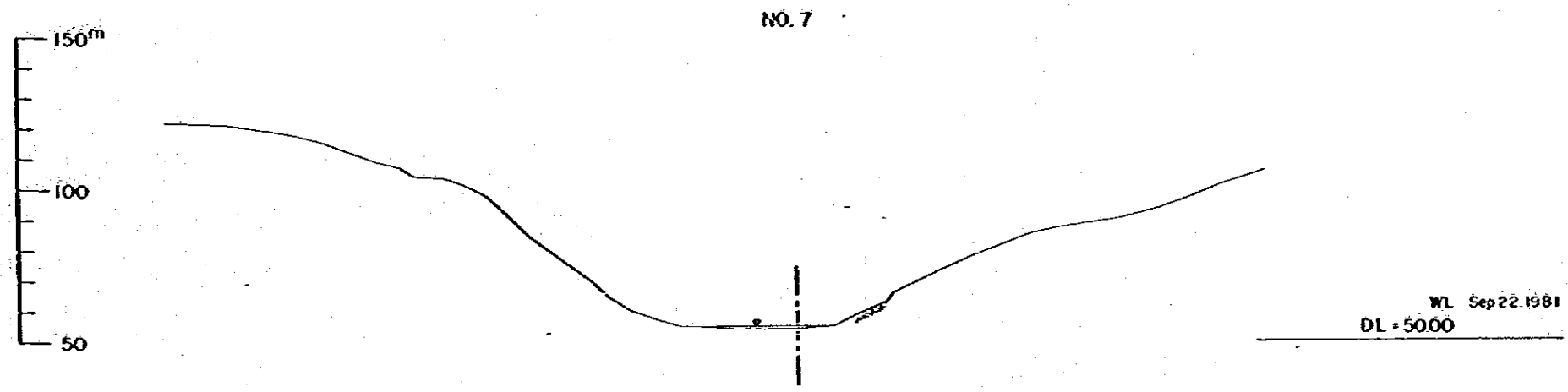


JAPAN INTERNATIONAL COOPERATION AGENCY
TOKYO JAPAN

FEASIBILITY STUDY OF TEKAI HYDRO-ELECTRIC
POWER DEVELOPMENT PROJECT

LOWER TEKAI
Cross Section (NO.5, NO.6)

FIGURE 4-20

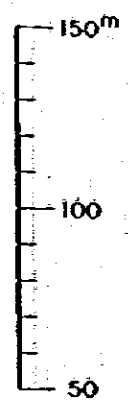


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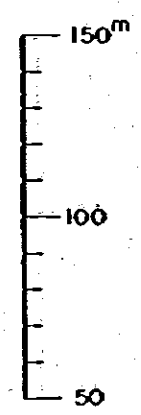
FEASIBILITY STUDY OF TEKAI HYDRO-ELECTRIC
POWER DEVELOPMENT PROJECT

LOWER TEKAI
Cross Section (NO.7, NO.8)

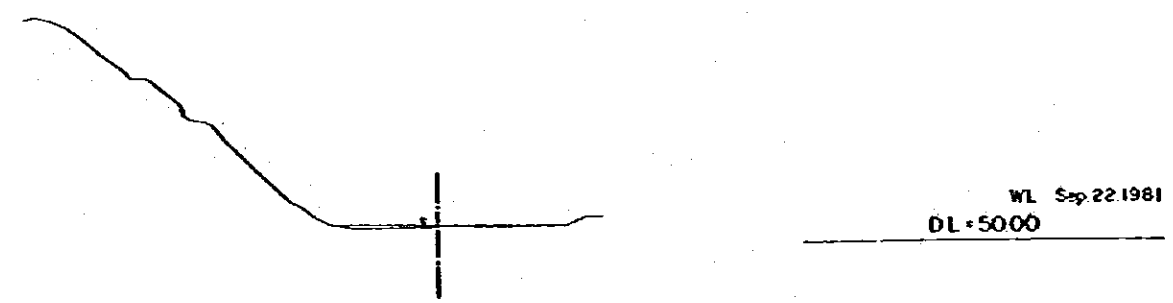
FIGURE 4-21



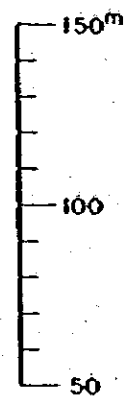
NO.9



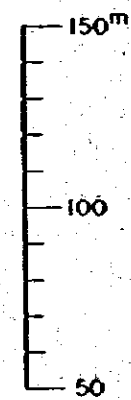
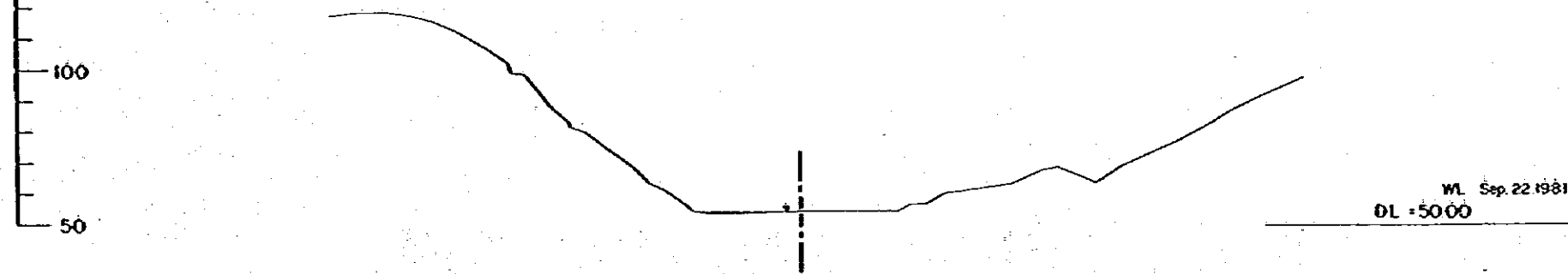
NO.9'



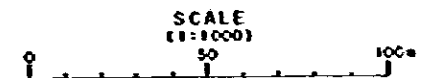
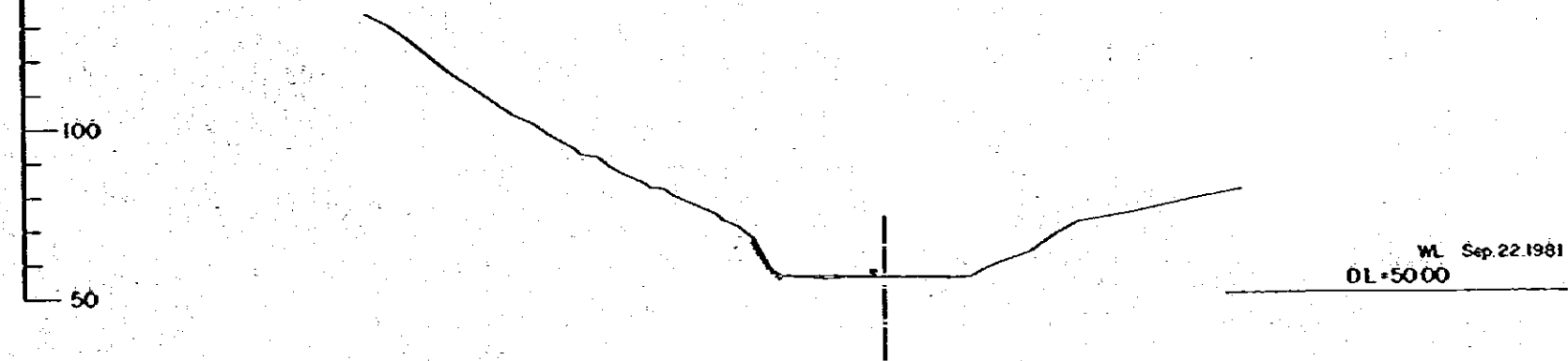
JAPAN INTERNATIONAL COOPERATION AGENCY
TOKYO JAPAN
FEASIBILITY STUDY OF TEKAI HYDRO-ELECTRIC
POWER DEVELOPMENT PROJECT
LOWER TEKAI
Cross Section (NO.9,NO.9')
FIGURE 4-22



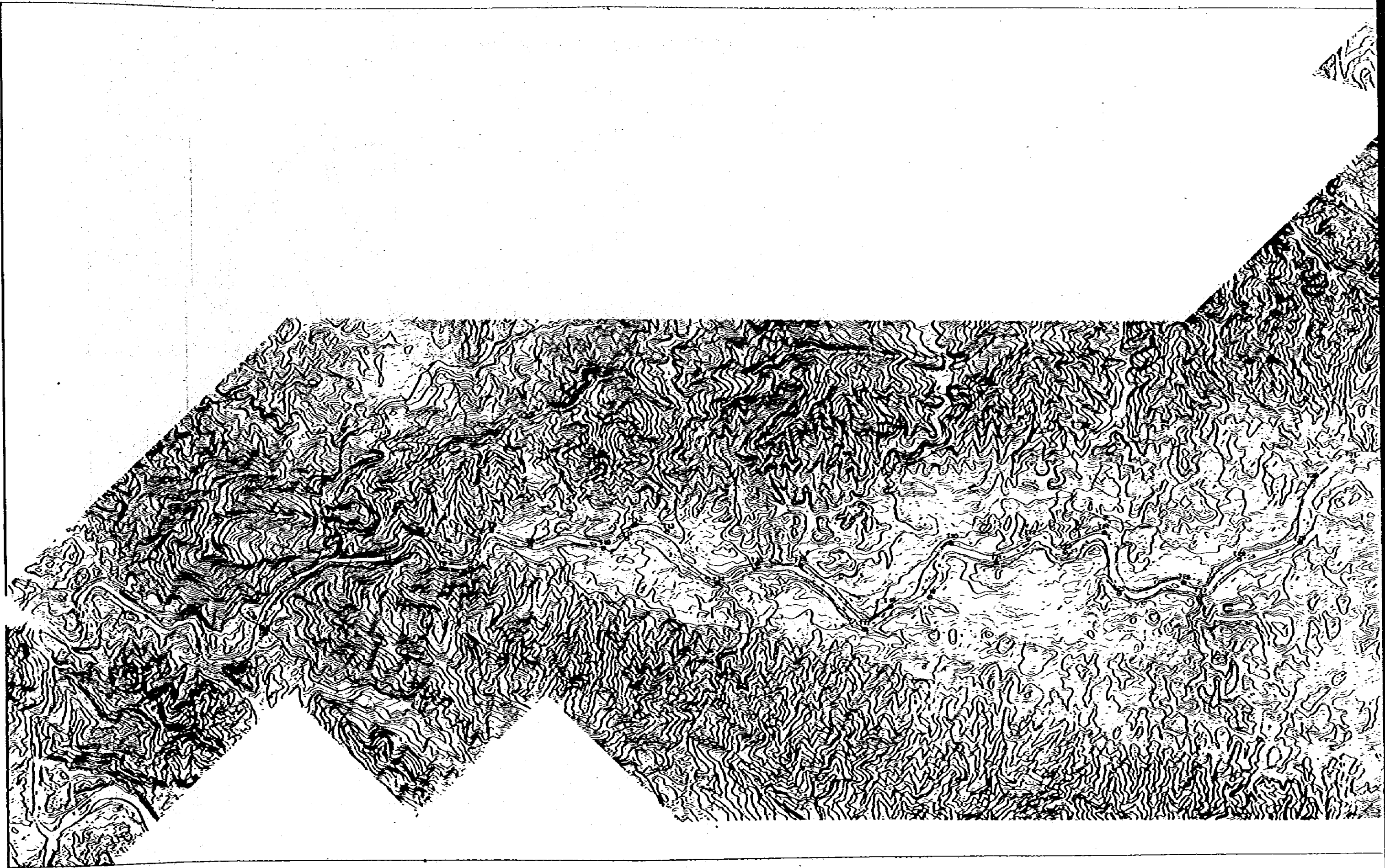
NO.10

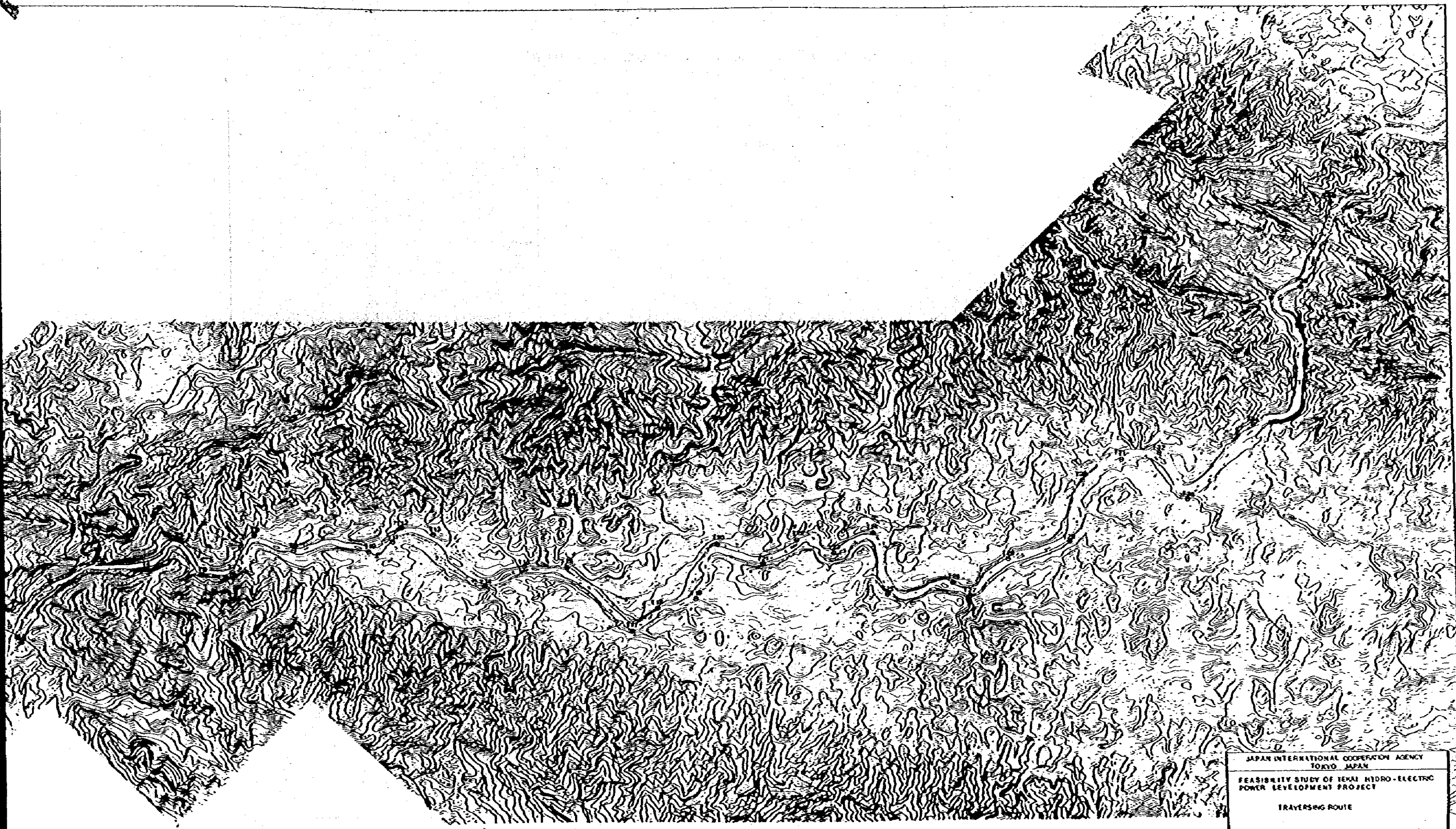


NO.11



JAPAN INTERNATIONAL COOPERATION AGENCY
TOKYO JAPAN
FEASIBILITY STUDY OF TEKAI HYDRO-ELECTRIC
POWER DEVELOPMENT PROJECT
LOWER TEKAI
Cross Section (NO.10, NO.11)
FIGURE 4-23

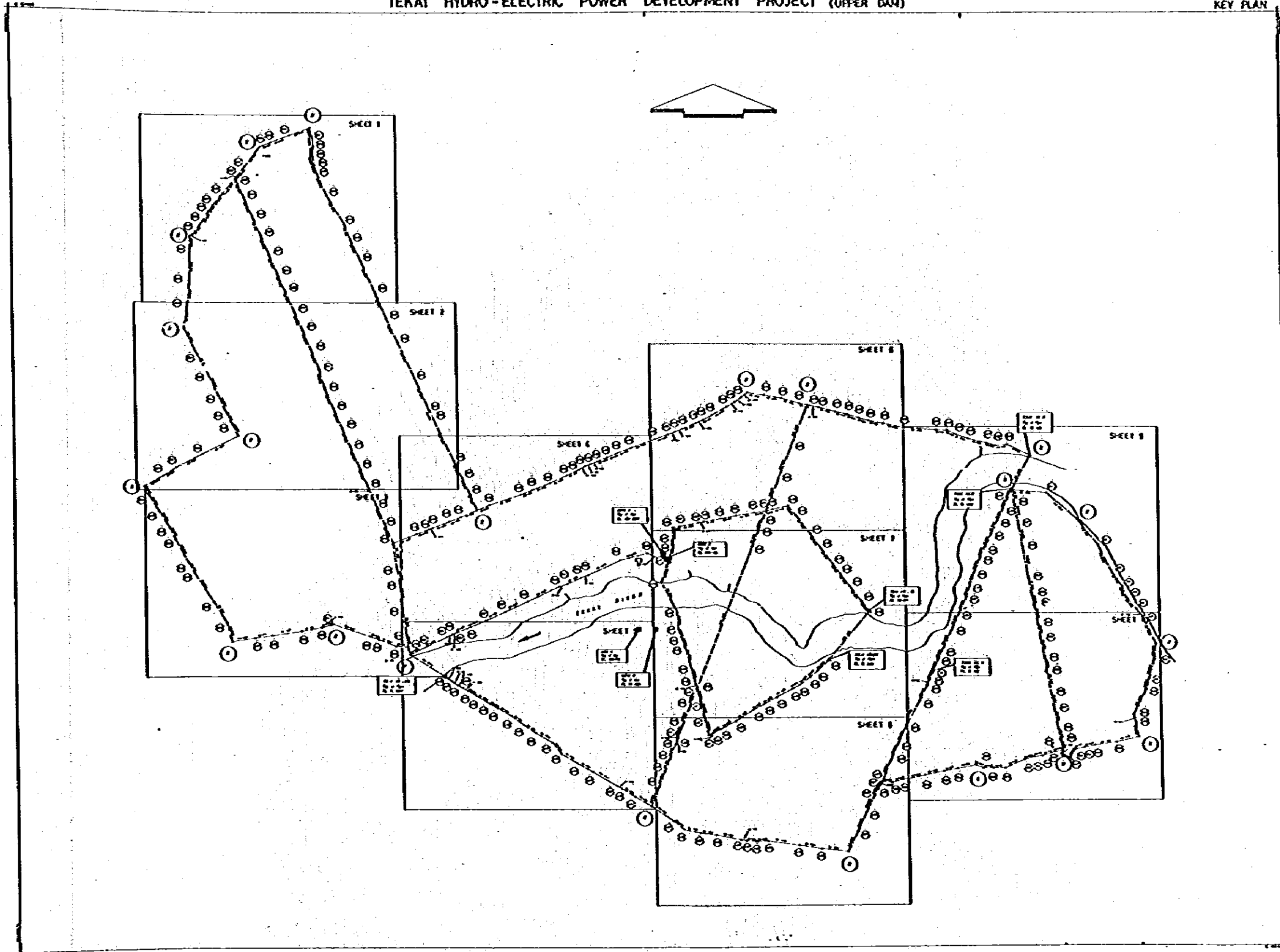




JAPAN INTERNATIONAL COOPERATION AGENCY
TOKYO, JAPAN
FEASIBILITY STUDY OF TEKAL HYDRO-ELECTRIC
POWER DEVELOPMENT PROJECT
TRAVERSING ROUTE
FIGURE 51

TEKAI HYDRO-ELECTRIC POWER DEVELOPMENT PROJECT (UPPER DAM)

KEY PLAN



1. The dam is shown in solid line.
 2. The dam is shown in dashed line.
 3. The dam is shown in solid line with a dashed center.
 4. The dam is shown in solid line with a dashed center.
 5. The dam is shown in solid line with a dashed center.

FIGURE 6-1

TEKAI HYDRO-ELECTRIC POWER DEVELOPMENT PROJECT (UPPER DAM)

SHEET 1

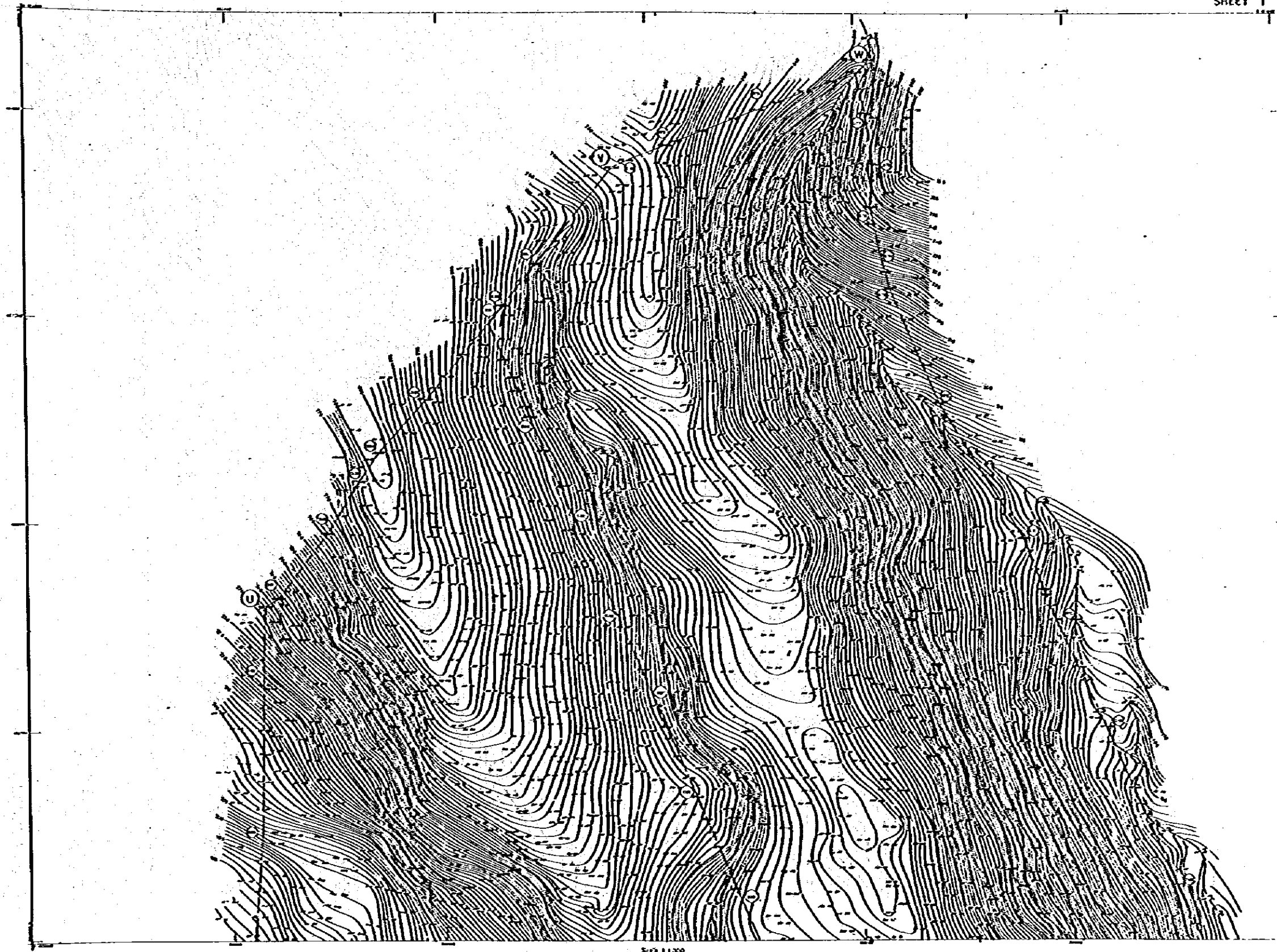
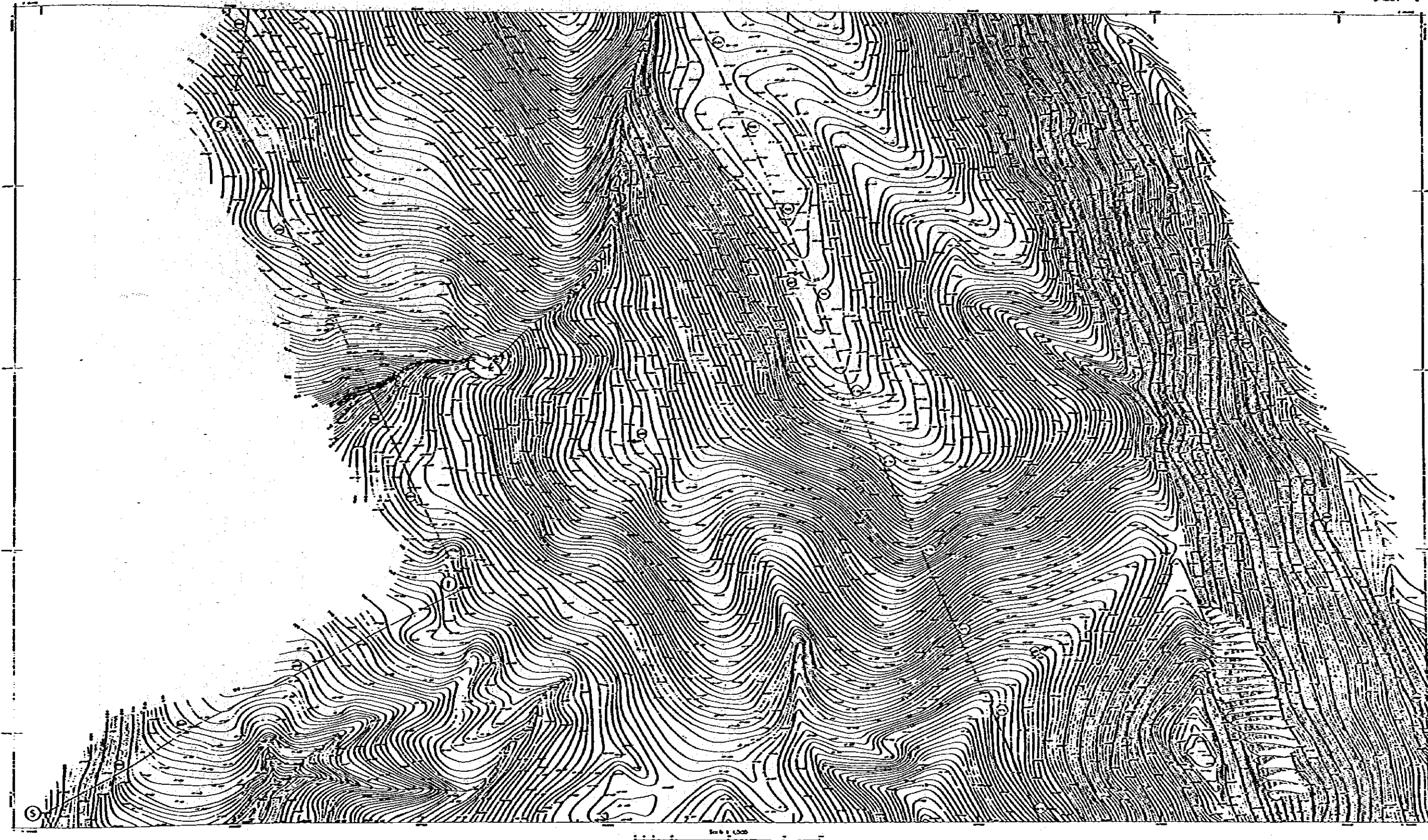
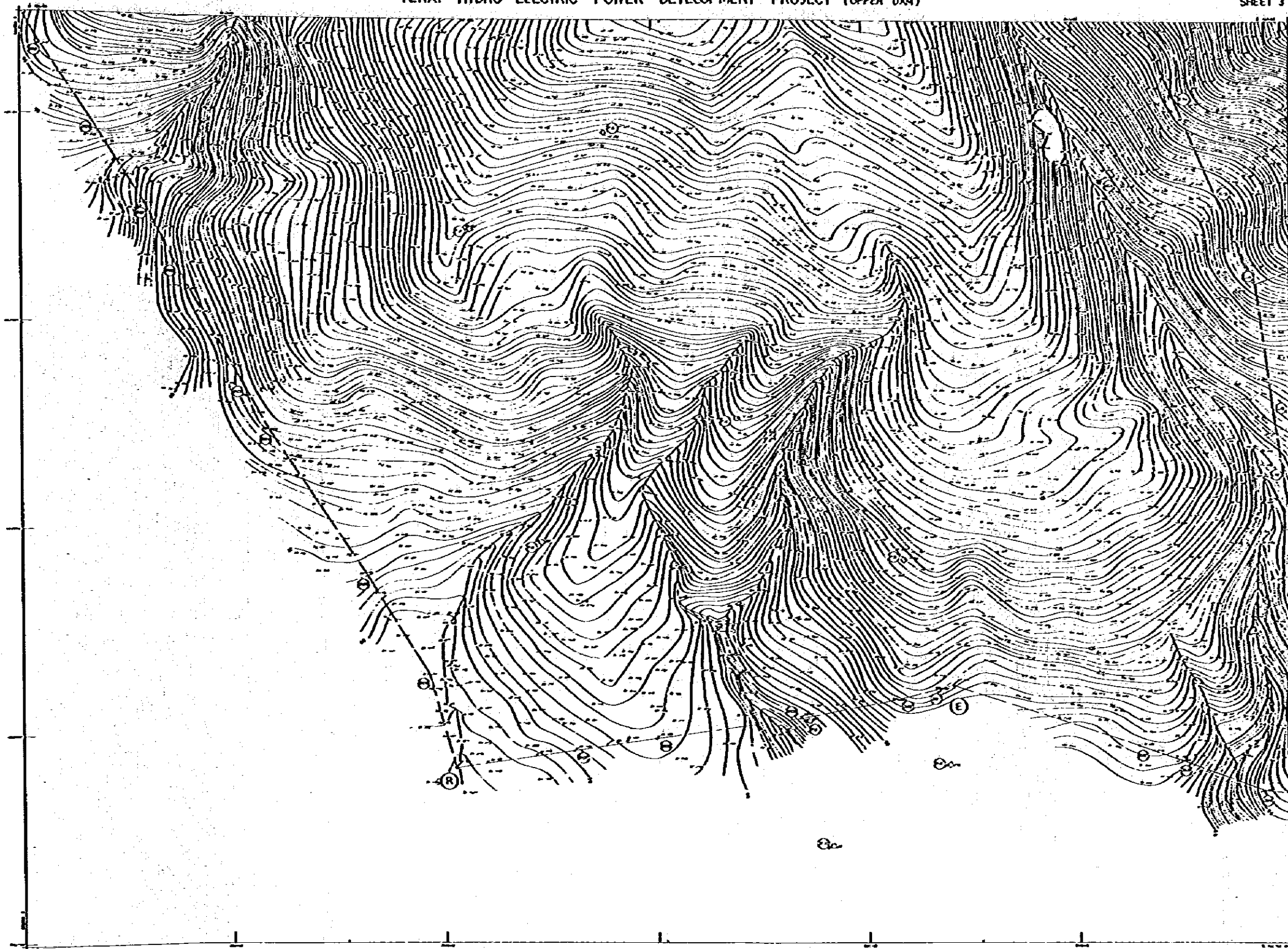


FIGURE 6-2



1000
2000
3000
4000
5000
6000
7000
8000
9000
10000
11000
12000
13000
14000
15000

FIGURE 6-3



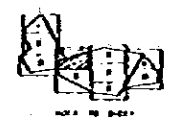
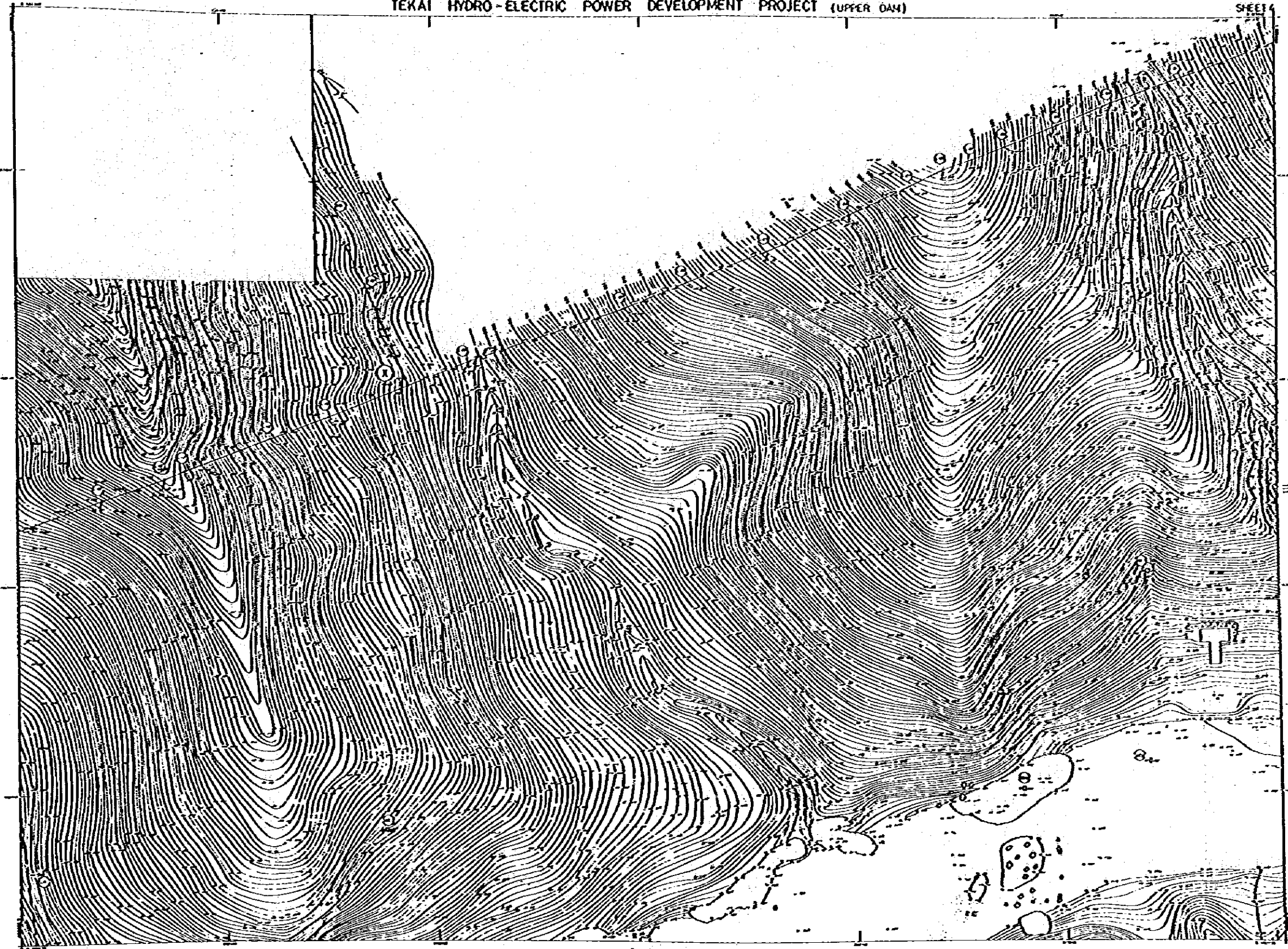
- LEGEND
- 1/4" ROAD
 - 1/2" ROAD
 - 1" ROAD
 - 2" ROAD
 - 3" ROAD
 - 4" ROAD
 - 5" ROAD
 - 6" ROAD
 - 7" ROAD
 - 8" ROAD
 - 9" ROAD
 - 10" ROAD
 - 11" ROAD
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 - 93" ROAD
 - 94" ROAD
 - 95" ROAD
 - 96" ROAD
 - 97" ROAD
 - 98" ROAD
 - 99" ROAD
 - 100" ROAD

TEKAI HYDRO-ELECTRIC POWER DEVELOPMENT PROJECT (UPPER DAM)

FIGURE 6-4

TEKAI HYDRO-ELECTRIC POWER DEVELOPMENT PROJECT (UPPER DAM)

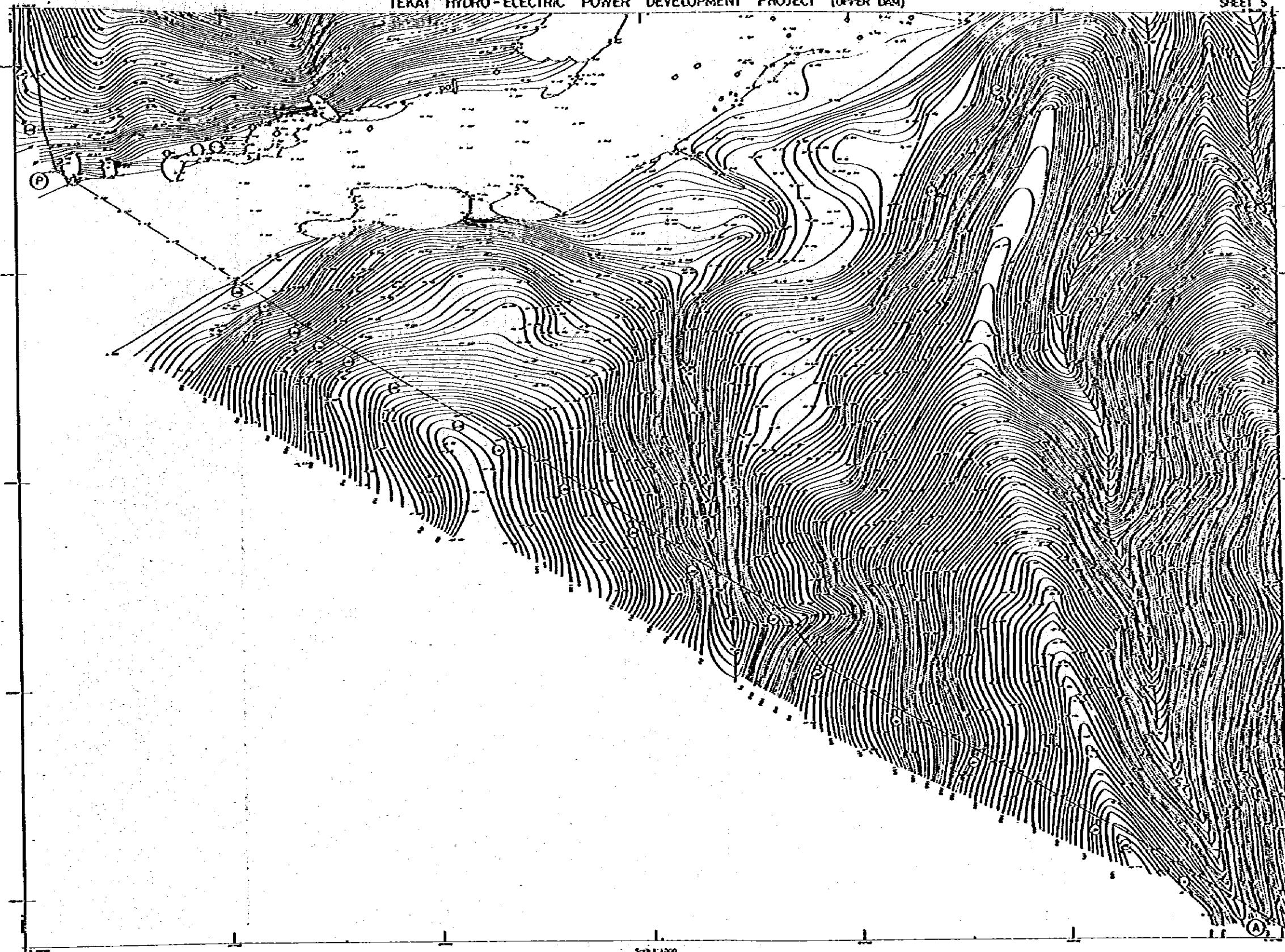
SHEET 4



- LEGEND
- CONTOUR
 - SPOT HEIGHT
 - ROAD
 - RAILROAD
 - WATER COURSE
 - DAM
 - BRIDGE
 - ENCLOSURE
 - SETTLEMENT
 - ...

1:5000

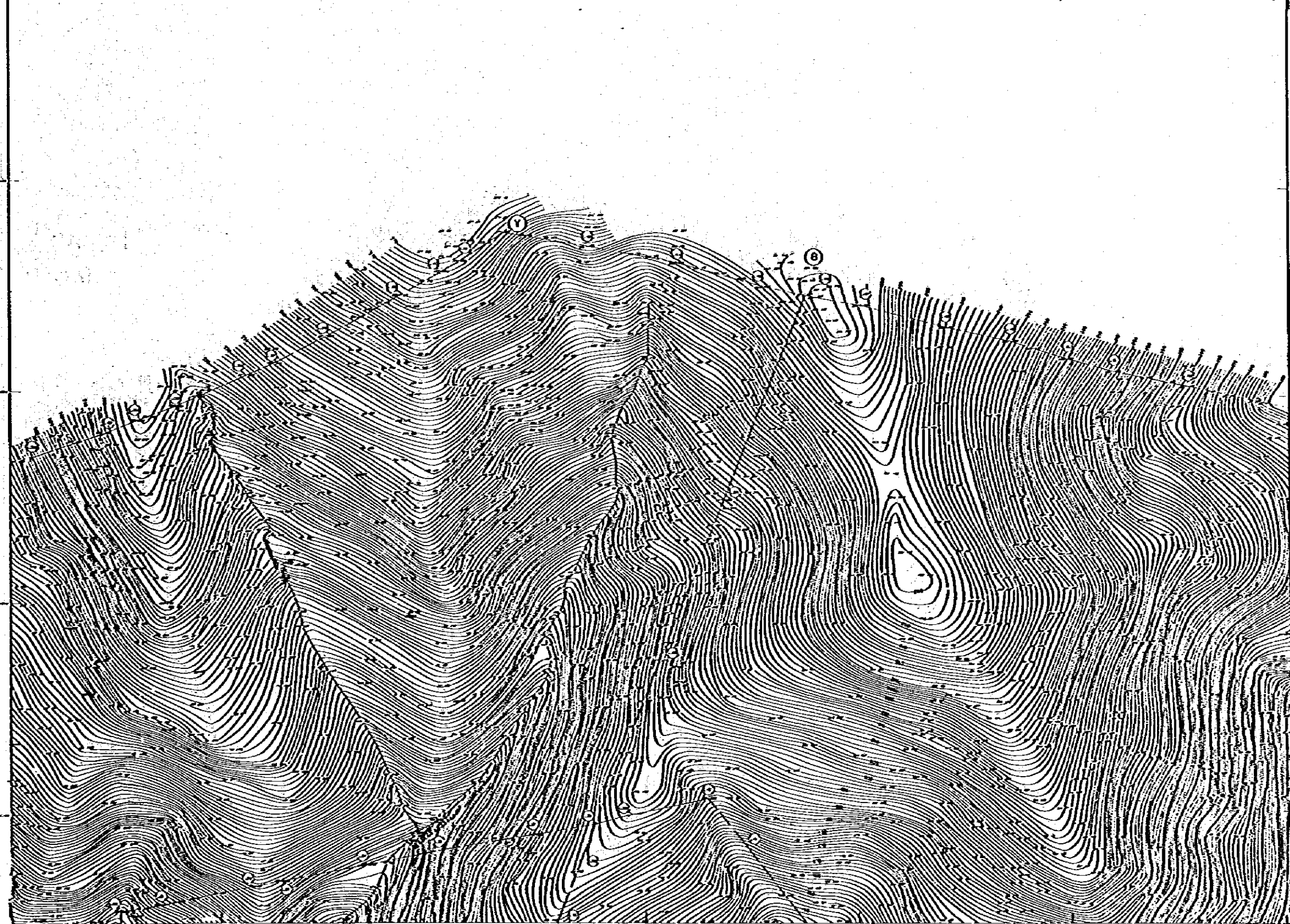
FIGURE 6-5



LEGEND

Contour lines	Contour lines
Major roads	Minor roads
Power lines	Water lines
Canals	Streams
Boundaries	Settlements
...	...

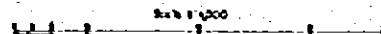
FIGURE 6-6



- 1000
- 950
- 900
- 850
- 800
- 750
- 700
- 650
- 600
- 550
- 500
- 450
- 400
- 350
- 300
- 250
- 200
- 150
- 100
- 50
- 0

1000
950
900
850
800
750
700
650
600
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400
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200
150
100
50
0

FIGURE 6-7



TEKAI HYDRO-ELECTRIC POWER DEVELOPMENT PROJECT (UPPER DAM)

SHEET 7

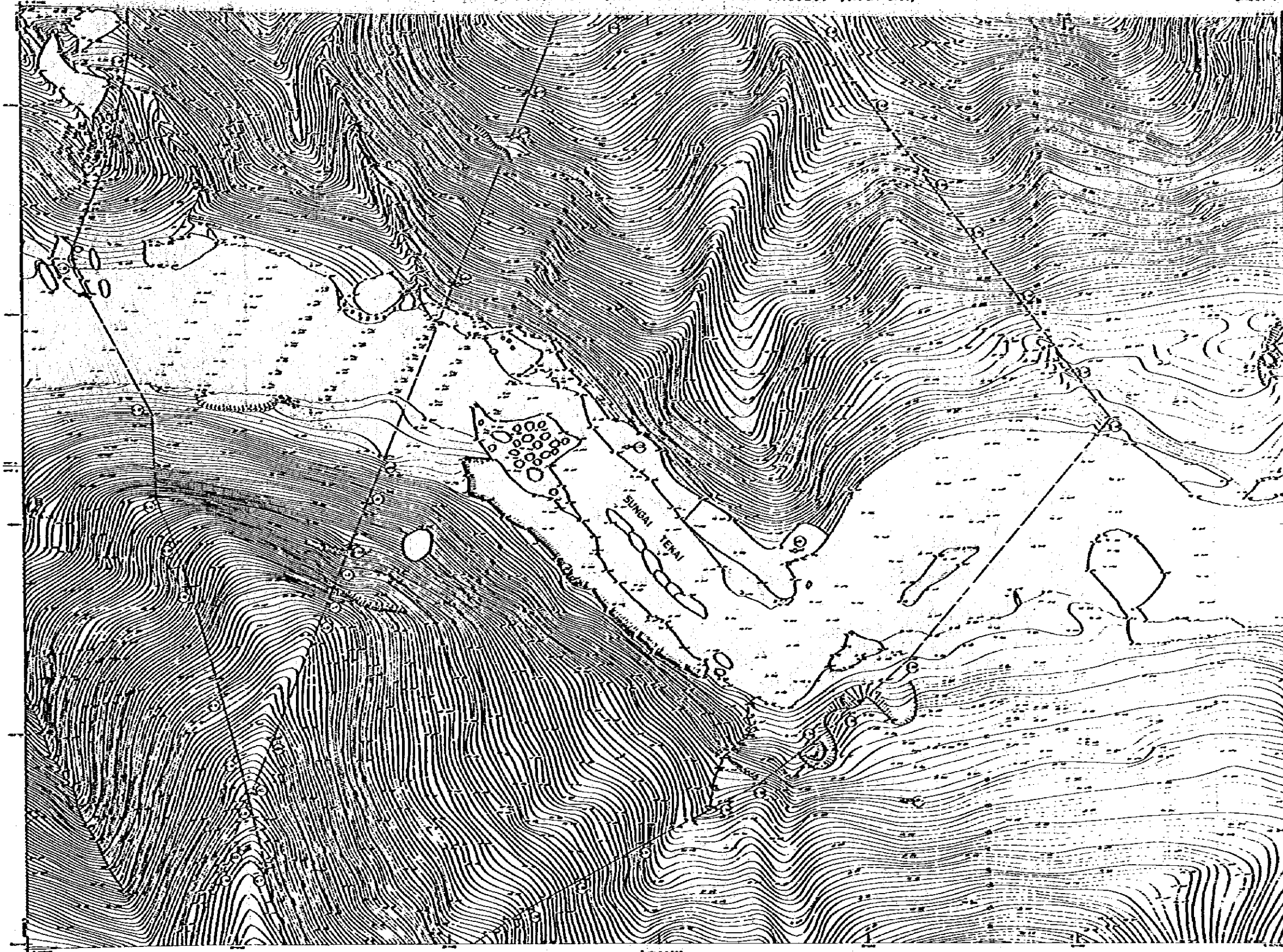
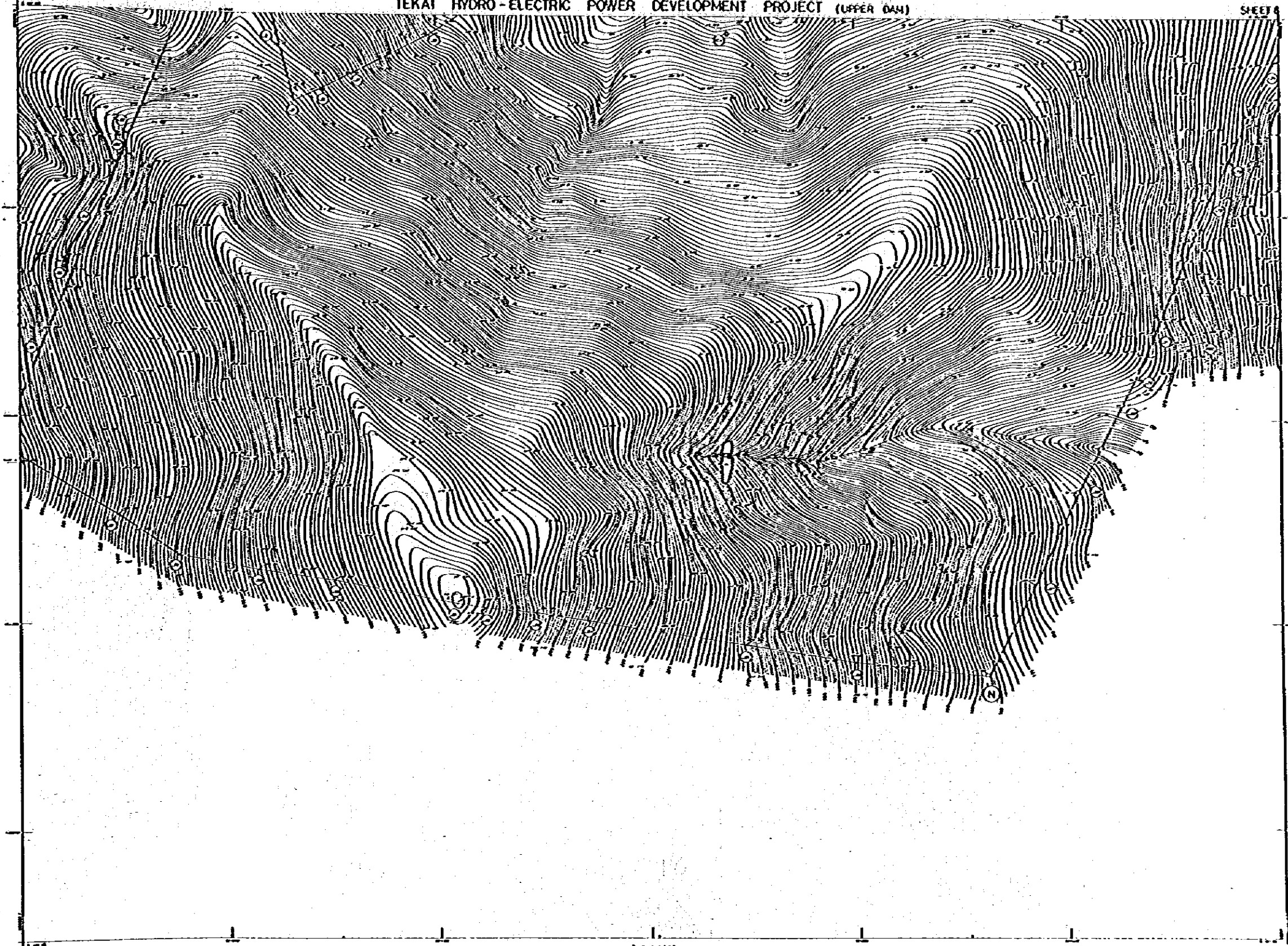


FIGURE 6-8

TEKAI HYDRO-ELECTRIC POWER DEVELOPMENT PROJECT (UPPER DAM)

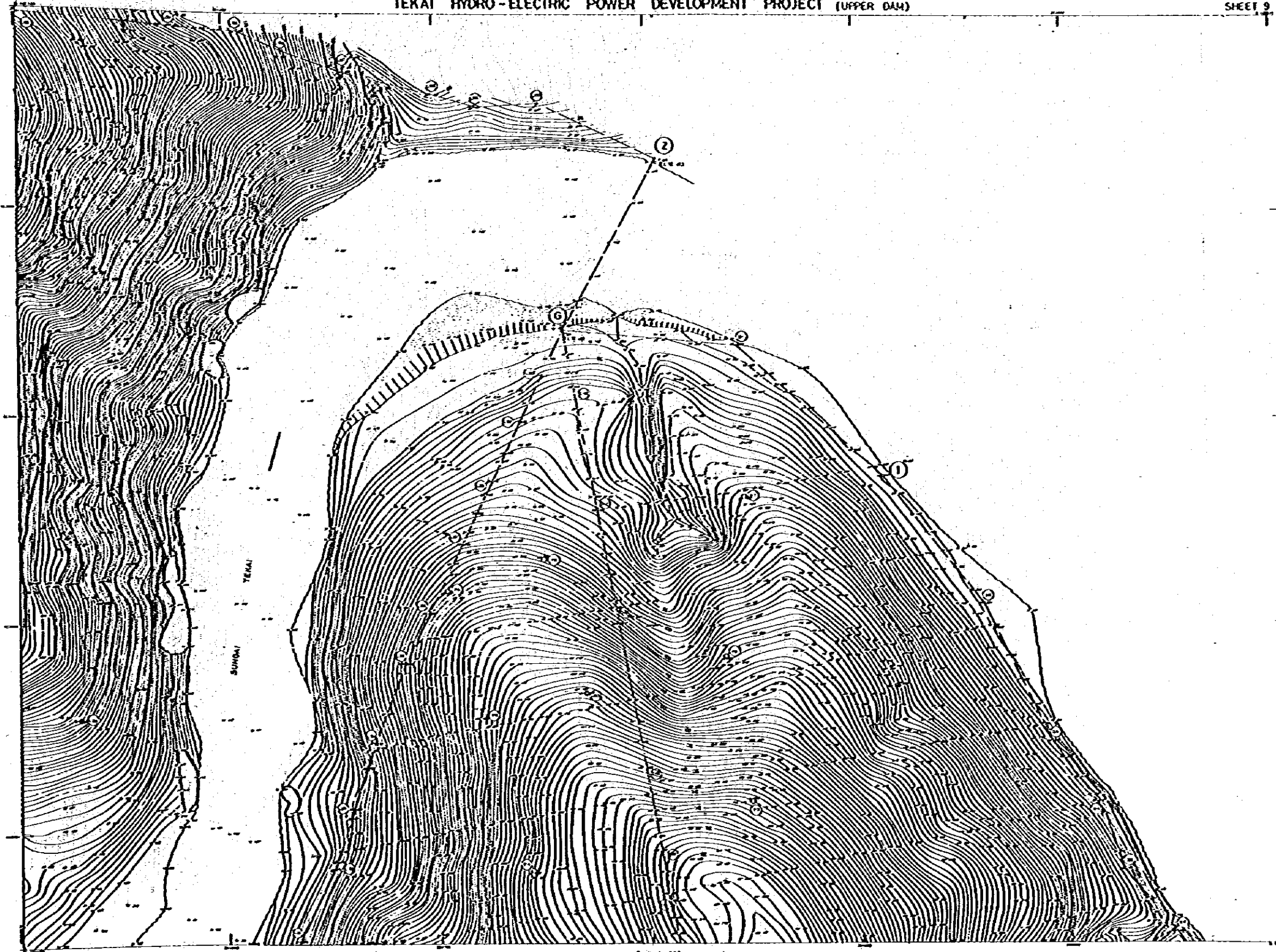
SHEET 4



- RESERVOIR
- ROAD
- RAILWAY
- DAM
- CANAL
- WATER PIPE
- POWER LINE
- TELEPHONE LINE
- PROPERTY LINE
- BOUNDARY

1:1,000
 1:5,000
 1:10,000
 1:25,000
 1:50,000
 1:100,000
 1:250,000
 1:500,000
 1:1,000,000

FIGURE 6-9



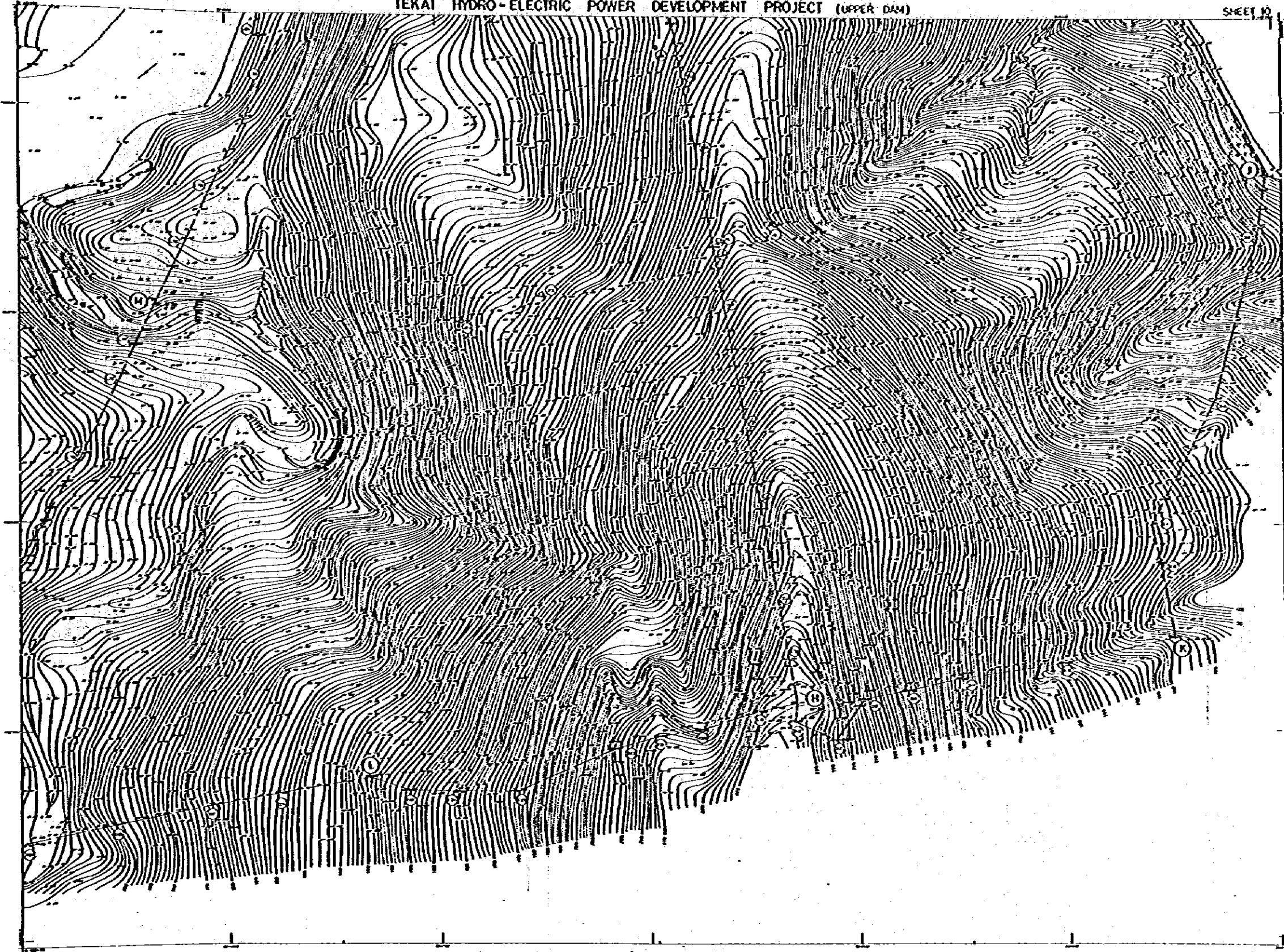
- LEGEND
- 1. DAM
 - 2. RESERVOIR
 - 3. ROAD
 - 4. RAILROAD
 - 5. CANAL
 - 6. STREAM
 - 7. WADI
 - 8. FENCE
 - 9. BOUNDARY
 - 10. SPOT ELEVATION

SUNDAY

FIGURE 6-10

TEKAI HYDRO-ELECTRIC POWER DEVELOPMENT PROJECT (UPPER DAM)

SHEET 10



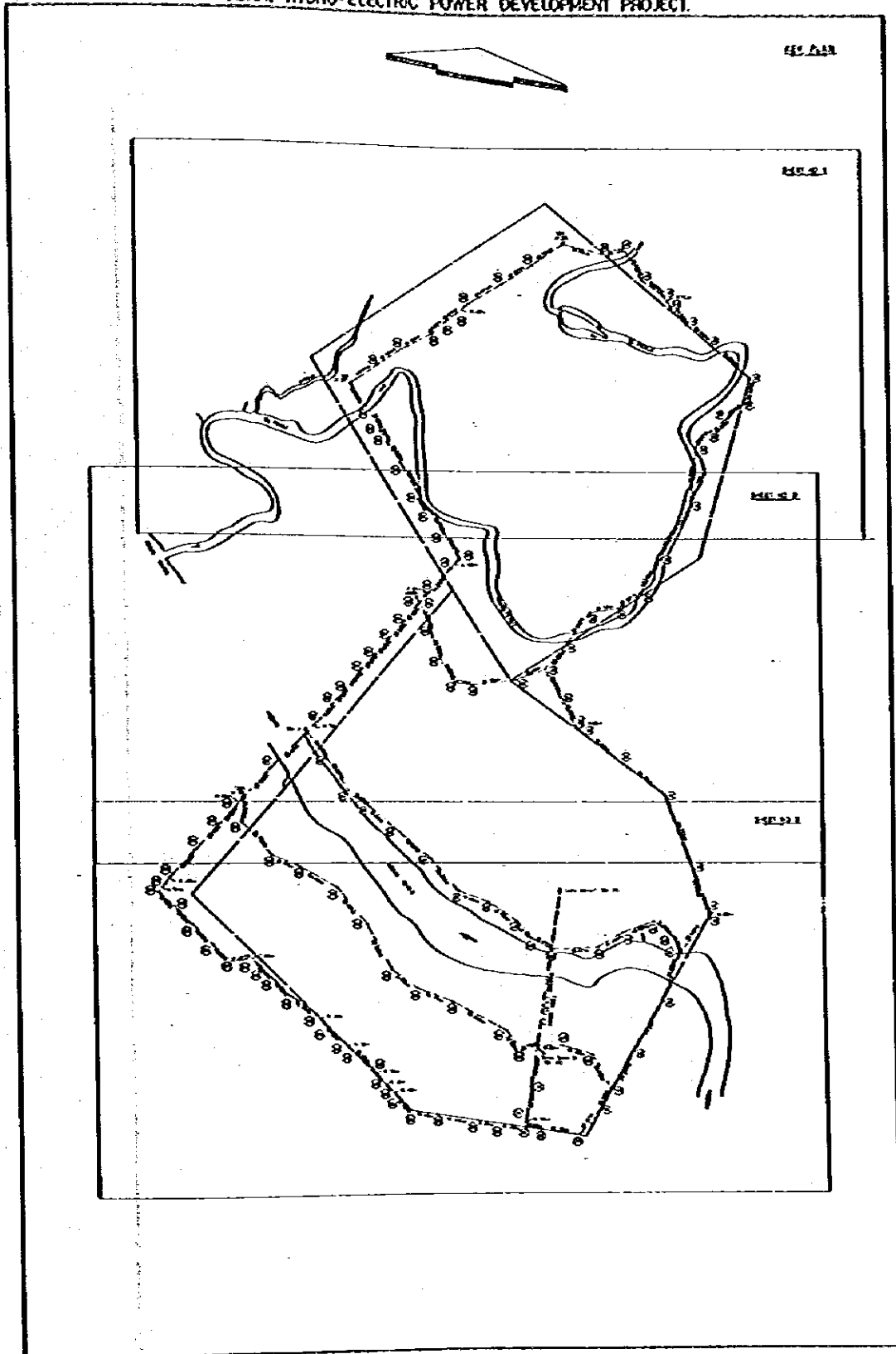
LEGEND

1. Contour Lines
 2. North Arrow
 3. [Symbol]
 4. [Symbol]
 5. [Symbol]
 6. [Symbol]
 7. [Symbol]
 8. [Symbol]
 9. [Symbol]
 10. [Symbol]

1:1000

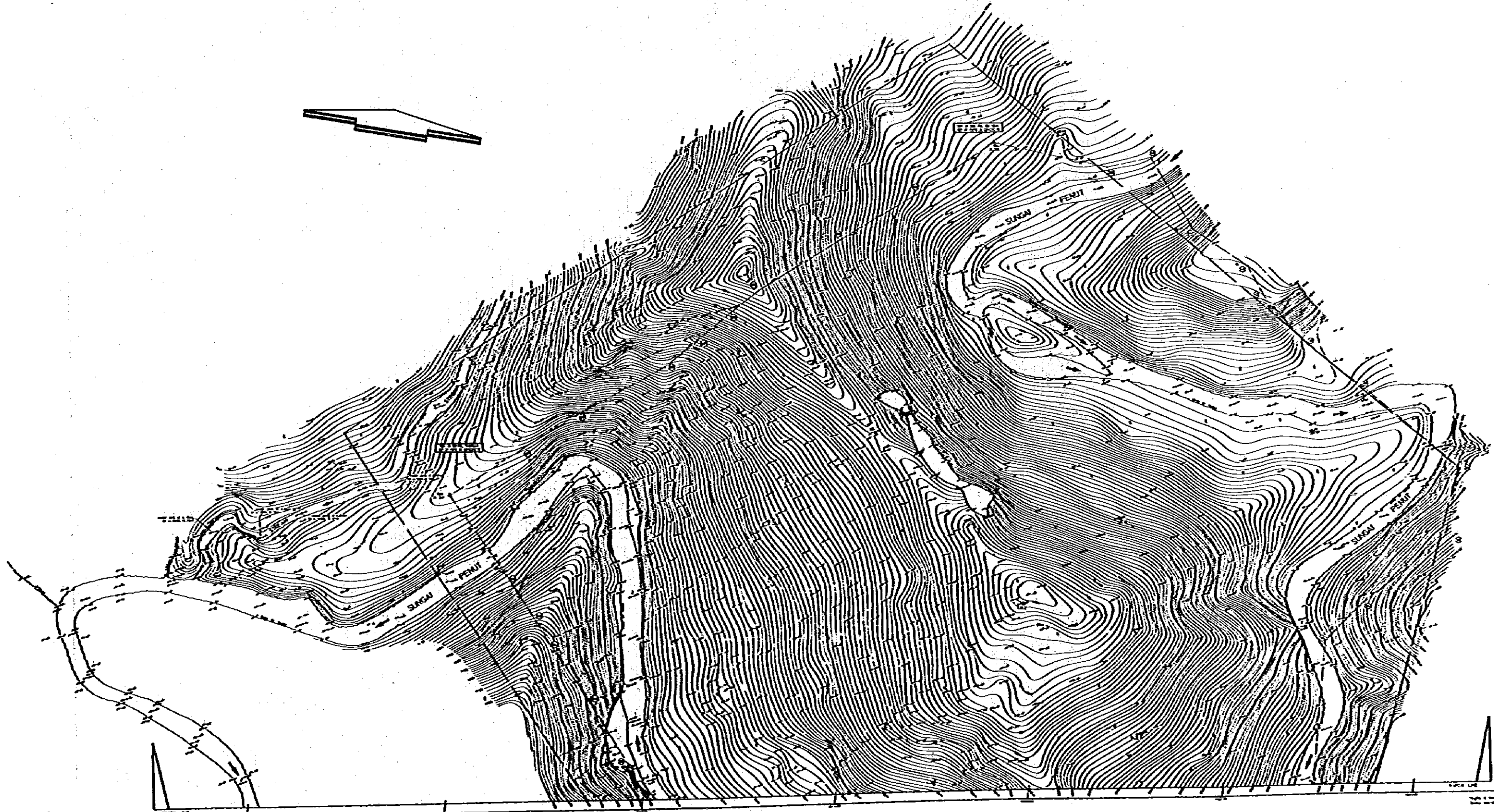
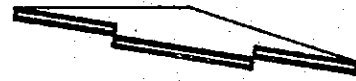
FIGURE 6-11

TEKAI HYDRO-ELECTRIC POWER DEVELOPMENT PROJECT.



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FIGURE 6-12



Scale 1:1000