

**SITE INSPECTION REPORT OF CF & FD, KMTR OF THE PROJECT
DIVERSION OF SURPLUS WATER FROM THE RAMANATHI RESERVOIR
TO THE JAMBUNATHI SYSTEM OF TANKS.**

The site inspection in the Eco-sensitive Zone of KMTR in Ambasamudram Division at the boundary of Papanasam RF for diversion of surplus water from the Ramanathi Reservoir to the Jambunathi system of tanks by Excavation of New Canal to irrigate 21 tanks in Tenkasi , Alankulam Taluks was carried out on 23.03.2023. During the field inspection, the Deputy Director, Ambasamudram, KMTR, Forest Range Officer, Kadayam and Assistant Executive Engineer, WRD, Kadayam were present.

The proposed canal enters the hillock at LS 50 m where the slope is thickly vegetated and deep cutting of 2 m depth will cause damage to the soil, if canal with retaining wall is taken up. Also, in the DPR, a cascade of canal is proposed to be formed from LS 420m to LS 550m by cutting rocks in steps. This will lead to heavy cutting on a slope more than 30 degrees as shown in Picture 1 and to avoid disturbance to Wildlife and to prevent soil loss, the user agency may explore the option of laying a pipe line from LS 50m to LS 550m. This will also reduce the number of trees to be felled. In the rest of the sections, it is proposed to form closed canal in rock cutting from LS 1375 m to LS 2700 m and open canal with concrete facing from LS 2700 m to LS 2800 m. Two animal passages have been proposed to be constructed across the canal between LS 150m to LS 2700 m and found to be suitable sites for animal crossings.

During the field inspection, indirect evidences of Sambar, Porcupine, Civets, Sloth bear and Leopard were found in this area. The major vegetation is *Tectona grandis*, *Cordia myxa*, *Zizyphus oenoplia* and *Zizyphus mauritiana*.


Conservator of Forests & Field Director,
Kalakad Mundanthurai Tiger Reserve, Tirunelveli.

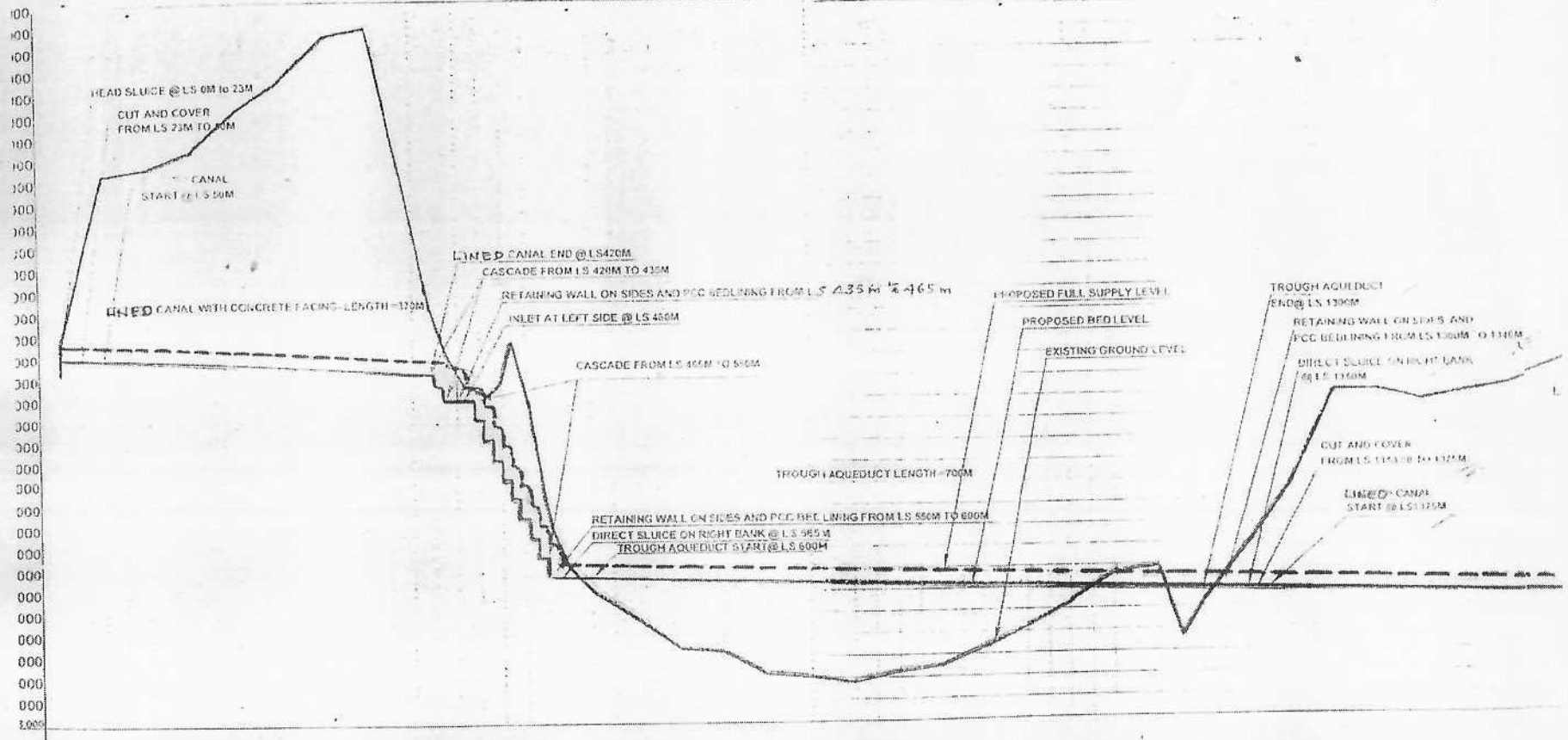
Plate 1. Site inspection by CF&FD, KMTR



Picture 1. The steep slope between LS 50 m to LS 550m wherein pipeline may be laid to avoid disturbance to animal movement in this project.

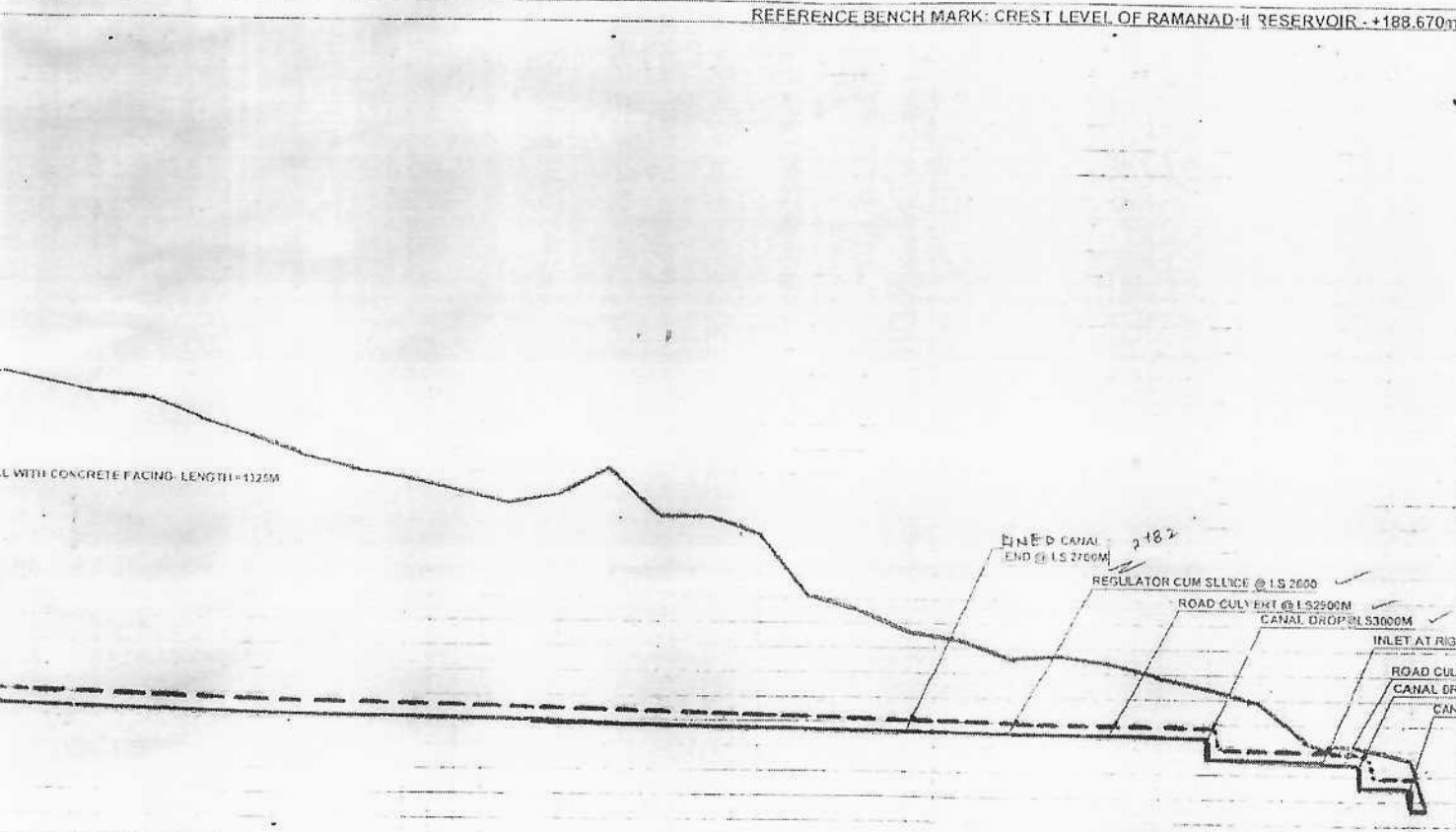
Pic 2. Dense vegetation seen in this area





STATION	ELEVATION
0	193.300
23	191.040
50	190.965
100	190.885
150	190.785
200	190.685
250	190.585
300	190.485
350	190.385
400	190.285
420	190.245
435	189.850
450	190.270
465	189.900
480	189.800
500	189.700
520	189.600
540	189.500
550	189.400
565	189.300
600	171.320
650	171.220
700	171.120
750	171.020
800	170.920
850	170.820
900	170.720
950	170.620
1000	170.520
1050	170.420
1100	170.320
1150	170.220
1200	170.120
1250	170.020
1275	169.970
1300	169.920
1340	169.840
1350	169.820
1375	169.770
1400	169.720
1450	169.620
1500	169.520
1550	169.420
1600	169.320
1650	169.220
1700	169.120

REFERENCE BENCH MARK: CREST LEVEL OF RAMANADHI RESERVOIR - +188.670m



DESCRIPTION	REACH 1A		
	LS 0M TO 2700M	LS 2700M TO 2800M	LS 2800M TO 3215M
BED WIDTH	2.30M	3.70M	4.00M
FSD	1.20M	1.20M	1.20M
FREE BOARD	0.60M	0.60M	0.60M
TBL	FSD + FREE BOARD	FSD + FREE BOARD	FSD + FREE BOARD
SIDE SLOPE	0.25:1	0.25:1	1:1
BEDFALL	1 IN 500	1 IN 1500	1 IN 1500
DISCHARGE	700 CUSECS	200 CUSECS	200 CUSECS

1850	194.825	168.820
1900	194.035	168.720
1950	193.635	168.620
2000	192.055	168.520
2050	190.735	168.420
2100	189.300	168.320
2150	188.200	168.220
2200	187.480	168.120
2250	186.485	168.020
2300	185.505	167.920
2350	186.240	167.820
2400	188.335	167.720
2450	184.555	167.620
2500	184.510	167.520
2550	183.135	167.420
2600	178.150	167.320
2650	176.975	167.220
2700	175.240	167.120
2750	174.495	167.095
2795	173.965	167.060
2800	173.130	167.055/166.905
2850	173.355	166.870
2900	172.820	166.835/166.785
2950	171.715	166.755
3000	170.865	166.720/164.920
3050	169.695	164.885
3100	166.475	164.855
3115	166.040	164.835
3135	165.235	164.830/164.780
3150	166.100	164.770/162.970
3200	165.210	162.935/161.135
3215	161.130	161.125

GOVERNMENT OF TAMILNADU
 WATER RESOURCES DEPARTMENT
 PROJECT PLANNING AND DESIGN DIVISION
 TIRUNELVELI
 NAME OF WORK: OF WORK: DIVERSION
 OF SURPLUS WATER FROM RAMANADHI
 RESERVOIR TO JAMBUNADHI SYSTEM
 OF TANKS AND EXCAVATION OF NEW
 CANAL FROM PADMANABAPERI TANK
 TO PUNGANKULAM AND LOWERDOWN
 TANKS IN TENKASI AND ALANGULAM
 TALUKS OF TIRUNELVELI DISTRICT.
 RAMANADHI-JAMBUNADHI LINK CANAL
 LONGITUDINAL SECTION
 LS 0M TO 3215M
 NOT TO SCALE

Project Planning and Design
 SECTION ENGINEER, P.W.D.
 Section No. 4
 TENKASI

Assistant Executive Engineer
 Assistant Executive Engineer, P.W.D.
 Project Planning and Design
 Sub Division
 Tenkasi - 627 811

Executive Engineer
 Executive Engineer, PWB
 Project Planning and Design
 Division, Tirunelveli-11.