क्षेत्रीय कार्यालय - अगरतला
राष्ट्रीय राजमार्ग एवं अवसंरचना विकास निगम लिमिटेड
(सड़क परिवहन और राजमार्ग मंत्रालय, भारत सरकार)
Regional Office - Agartala
National Highways & Infrastructure Development Corporation Limited
(Ministry of Road Transport & Highways, Govt. of India)
BUILDING INFRASTRUCTURE - BUILDING THE NATION
BHARATMALA ROAD TO PROSPERITY
सार्वजनिक क्षेत्र का उपक्रम
A PUBLIC SECTOR UNDERTAKING

NHIDCL/RO_Agt/T/RR/2023_24/706/368 Date: 16.08.2023

Corrigendum No. V

To,

All Prospective bidders

Name of the Work- Special Repair Work Protection Work at selected stretches on NH_08 from Km 375.000 to Km 397.000 in the state of Tripura in FY 2023_24 on Percentage Rate Basis.

Tender ID- 2023_NHIDC_760030_1

The indicative Drawings of Bamboo Palisading, Retaining Wall etc. is enclosed for reference.

Yours faithfully

16/8/23
(R.K. Singh)
Dy. General Manager (P)

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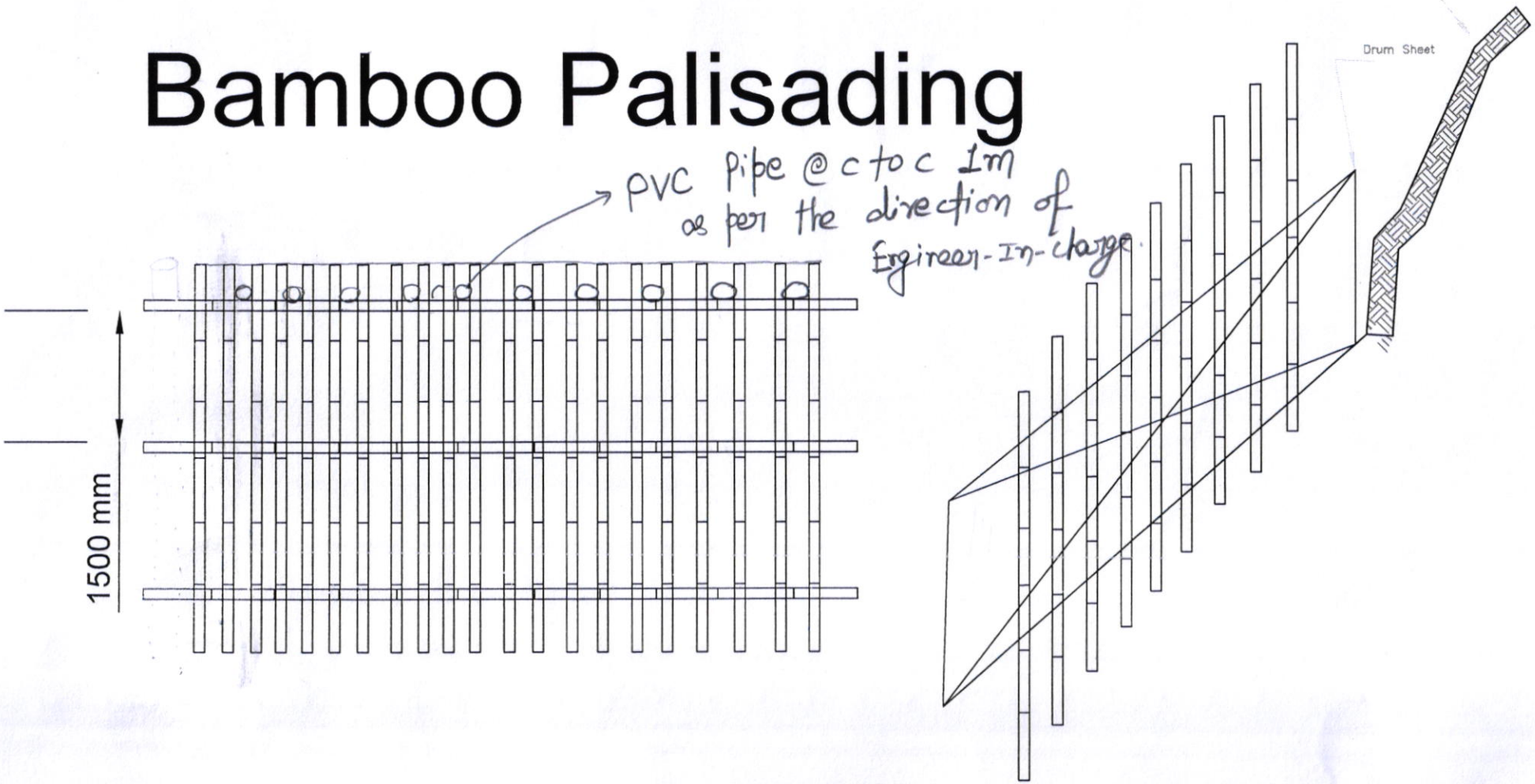
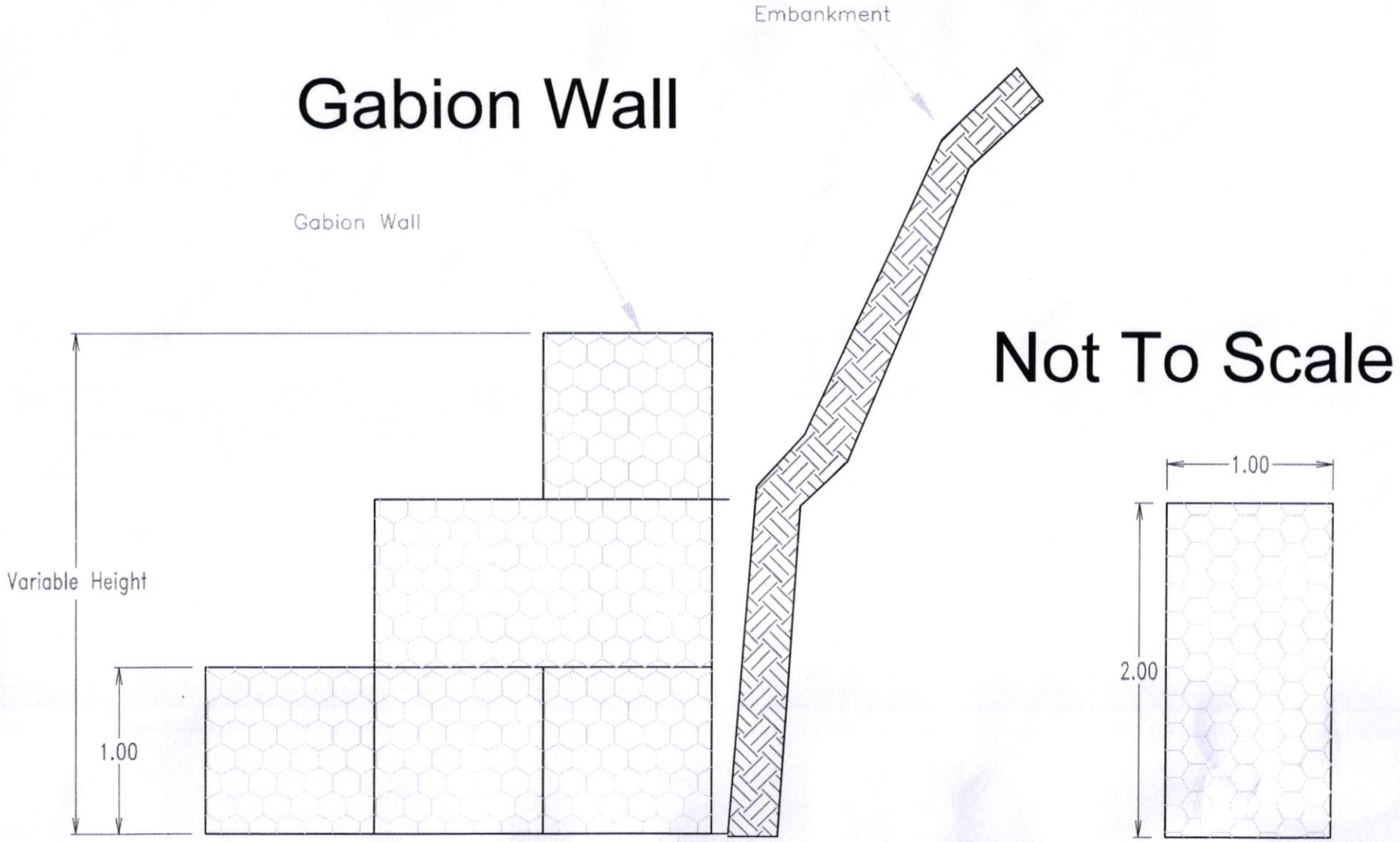
3rd Floor, UD Bhawan, Near Ravindra Bhawan, Sakuntala Road, Tripura-799001
E-mail : edp-agartala@nhidcl.com

Bamboo Palisading

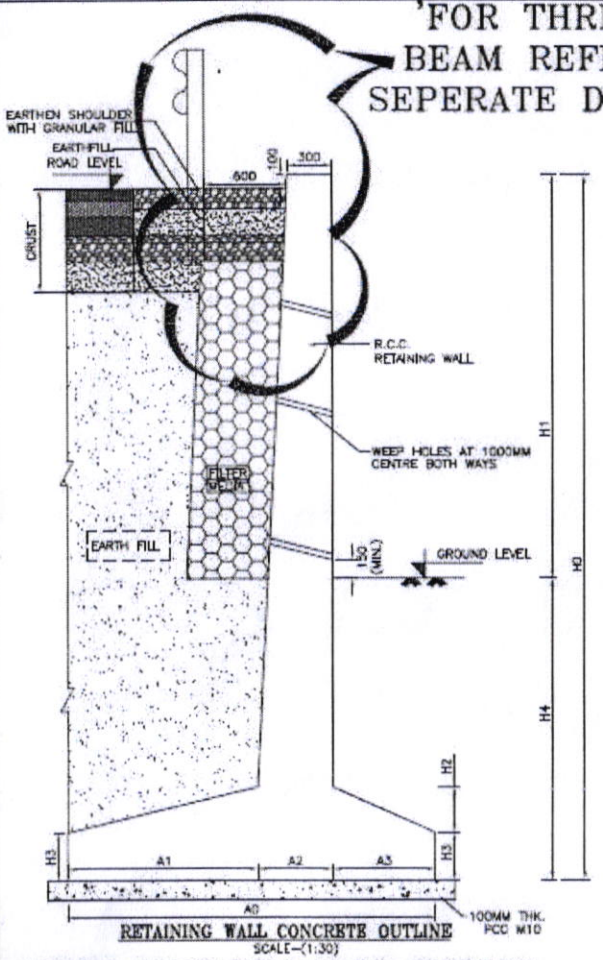


Not To Scale

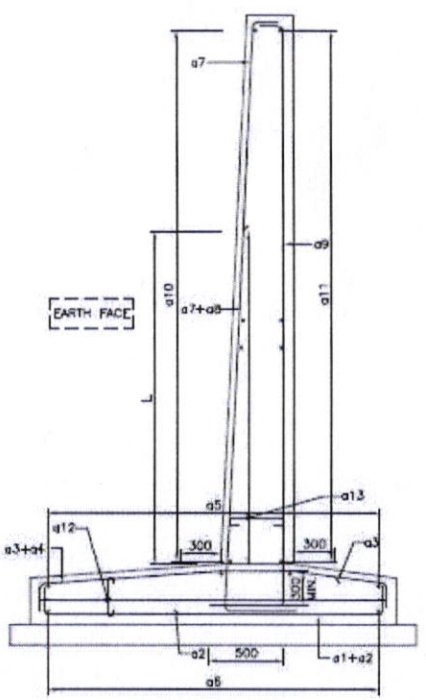
Gabion Wall


Embankment
Gabion Wall
Variable Height
1.00
Not To Scale
1.00
2.00

'FOR THRIE BEAM REFER SEPERATE DWG.'



RETAINING WALL CONCRETE OUTLINE
SCALE–(1:30)



RETAINING WALL
SHOWING REINFORCEMENT
SCALE–(1:30)

NOTES:

1. ALL DIMENSIONS ARE IN MILLIMETRES UNLESS OTHERWISE SPECIFIED.
2. DIMENSIONS ARE NOT TO BE SCALED AND ONLY WRITTEN DIMENSIONS TO BE FOLLOWED.
3. THIS DRAWING SHOULD BE READ IN CONJUNCTION WITH RELEVANT DRAWING.
4. GRADE OF CONCRETE SHALL BE
   RETAINING WALL – M35 (R.C.C.)
5. SIZE OF COARSE AGGREGATE --- 20MM DOWN.
6. CLEAR COVER TO REINFORCEMENT SHALL BE
   EARTH–FACE –75MM
   NON–EARTH FACE –50MM
7. GRADE OF UNTENSIONED STEEL SHALL BE Fe 500D CONFIRMING TO IS:1786
8. LAPPING OF REINFORCEMENT SHALL BE AVOIDED AS FAR AS POSSIBLE. IN CASE LAPPING OF BARS BECOMES UNAVOIDABLE.
   MINIMUM LAP LENGTH OF REINFORCEMENT BARS SHALL BE
   36 X DIA OF BAR (WHEN LESS THAN 25% OF BARS ARE LAPPED AT ONE LOCATION.
   42 X DIA OF BAR (WHEN LESS THAN 25% TO 33% OF BARS ARE LAPPED AT ONE LOCATION.
   50 X DIA OF BAR (WHEN LESS THAN 33% TO 50% OF BARS ARE LAPPED AT ONE LOCATION.
   DEVELOPMENT LENGTH (ibnet)
   $ibnet = \alpha.l\ (\alpha = 1.0)$
   $f_b = k\phi$
   k = 40 FOR M30 (FE 500D)
   k = 36 FOR M35 (FE 500D)
   k = 34 FOR M40 (FE 500D)
9. PROPETIES OF BACK FILL ASSUMED IN THE DESIGN OF WING WALL ARE:
   - ANGLE OF INTERNAL FRICTION (γ SAT) – 30°
   - ANGLE OF WALL FRICTION – 20°
   - DRY DENSITY OF SOIL – 2000 KG/M³
10. 75 mm DIA. PVC PIPES (HEAVY DUTY) FILLED WITH NO–FINE CONCRETE SHALL BE PROVIDED AT 1M C/C HORIZONTALLY AS WELL AS VERTICALLY AS WEEP HOLES IN RETAINING WALL.
11. 600MM THICK STANDARD FILTER SHALL BE PROVIDED IMMEDIATELY BEHIND THE RETAINING WALL FOR FULL WIDTH.
12. SIDES OF THE EXCAVATED PITS SHOULD BE SUITABLY PROTECTED TO ENSURE THE SAFETY OF THE EXISTING STRUCTURES AROUND.
13. NET SAFE BEARING CAPACITY OF 12T/m2 IS TAKEN IN DESIGN AS PER GEOTECHNICAL REPORT,IF NOT FOUND SO THEN DESIGNER THEN DESIGNER SHOULD BE INTIMATED BEFORE EXECUTION.
14. BEARING CAPACITY AT FOUNDATION LEVEL SHALL BE CONFIRMED BEFORE EXECUTION.
15. BACKFILL MATERIAL SHOULD CONFIRM TO CL 305.2 OF MOST SPECIFICATION AND EARTH CUSHION EMBANKMENT SHOULD BE CONSTRUCTED IN ACCORDENCE TO SECTION 300 OF MOST SPECIFICATION.
17. WEEP HOLES SHALL BE PROVIDED 150MM (MIN.*) ABOVE LOW WATER LEVEL (LWL) OR LOWEST GROUND LEVEL (LGL) WHICHEVER IS HIGHER.
18. THE EXPANSION GAP IN RETAINING SHALL BE PROVIDED,SO THAT SPACING BETWEEN EXP. GAP SHALL NOT EXCEED 25M.

TABLE–1 T–TYPE RETAINING WALL DIMENSIONS

SCALE–(1:100)

TOTAL HEIGHT (H0)	A1	A2	A3	A0	H1	H2	H3	H4	L
MM	MM	MM	MM	MM	MM	MM	MM	MM	MM
UP TO 3000	1800	450	750	3000	1000	300	300	2000	1700
3000 TO 4000	2300	600	1200	4100	2000	250	350	2000	2250
4000 TO 5000	3000	650	1350	5000	3000	400	400	2000	2600
5000 TO 6000	3550	750	2000	6300	4000	450	400	2000	3100
6000 TO 7000	4200	900	2500	7600	5000	450	450	2000	3550
7000 TO 8000	4800	1000	2800	8600	6000	450	550	2000	4000
8000 TO 9000	5500	1000	3000	9500	7000	450	550	2000	4500

TABLE–2 REIFORCEMENT DETAIL OF T–TYPE RETAINING WALL

HEIGHT (H1)	a1	a2	a3	a4	a5	a6	a7	a8	a9	a10	a11	a12/13
UP TO 3000	12#@220c/c	10#@220c/c	10#@220c/c	12#@220c/c	10#@250c/c	10#@250c/c	12#@220c/c	10#@220c/c	12#@220c/c	10#@250c/c	10#@250c/c	NOT USED
3000 TO 4000	16#@210c/c	10#@2100c/c	10#@210c/c	12#@210c/c	10#@200c/c	10#@200c/c	12#@210c/c	12#@210c/c	12#@210c/c	10#@200c/c	10#@200c/c	NOT USED
4000 TO 5000	16#@220c/c	12#@220c/c	10#@220c/c	16#@220c/c	12#@200c/c	12#@200c/c	16#@220c/c	12#@220c/c	12#@220c/c	12#@200c/c	10#@200c/c	10#@220(L)&200(T)c/c (BOTHWAYS STAGGERED)
5000 TO 6000	16#@175c/c	16#@175c/c	16#@175c/c	16#@1750/c	12#@200c/c	12#@200c/c	16#@175c/c	16#@175c/c	12#@175c/c	12#@200c/c	10#@200c/c	10#@175(L)&200(T)c/c (BOTHWAYS STAGGERED)
6000 TO 7000	16#@150c/c	16#@150c/c	16#@150c/c	16#@150c/c	12#@200c/c	12#@200c/c	16#@150c/c	16#@150c/c	16#@150c/c	12#@200c/c	12#@200c/c	10#@150(L)&200(T)c/c (BOTHWAYS STAGGERED)
7000 TO 8000	20#@200c/c	20#@200c/c	20#@200c/c	20#@200c/c	12#@150c/c	12#@150c/c	20#@200c/c	20#@200c/c	16#@200c/c	12#@150c/c	12#@150c/c	10#@200(L)&150(T)c/c (BOTHWAYS STAGGERED)
8000 TO 9000	20#@150c/c	20#@150c/c	20#@150c/c	25#@150c/c	16#@150c/c	16#@150c/c	25#@150c/c	20#@150c/c	20#@150c/c	16#@150c/c	16#@150c/c	10#@150c/c (BOTHWAYS STAGGERED)

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