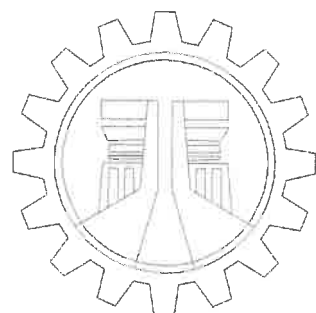




REPUBLIC OF THE PHILIPPINES
DEPARTMENT OF PUBLIC WORKS AND HIGHWAYS
REGIONAL OFFICE VIII
NORTHERN SAMAR SECOND DISTRICT ENGINEERING OFFICE
Brgy. Burabud, Laoang Northern Samar

C.Y. 2024 PROJECT
DETAILED ENGINEERING DESIGN PLAN FOR
REPAIR/ REHABILITATION OF SLOPE PROTECTION OF MANAYBANAY BRIDGE
ABUTMENT B, BRGY. MANAYBANAY, MAPANAS , NORTHERN SAMAR.

SUBMITTED

FRANCIS Y. TAÑALA
CHIEF MAINTENANCE SECTION

DATE:

RECOMMENDED :

ATTY. ARTHUR ERIC L. SABONG
ASSISTANT DISTRICT ENGINEER

DATE:

APPROVED :

CHARLITO S. CARLOSOS
DISTRICT ENGINEER

DATE:

INDEX OF SHEETS

1. TITLE PAGE.
2. GENERAL NOTES, INDEX OF SHEETS
3. LOCATION MAP
4. STANDARD DETAILS OF PROJECT BILLBOARD/SIGNBOARD.
5. PLAN VIEW, ELEVATION
6. DETAIL OF GROUTED RIPRAP, WEEPHOLE DETAIL

GENERAL NOTES

DIMENSIONS

- a. STATIONS ARE GIVEN IN KILOMETERS WITH OR WITHOUT DECIMALS.
- b. RADII, ELEVATIONS, FLOOD LEVELS, ETC, ARE GIVEN IN METERS WITH OR WITHOUT DECIMALS.
- c. UNLESS OTHERWISE SHOWN, ALL DISTANCES ARE IN METERS.

STATIONING

- a. THE ROAD STATIONS ARE RELATIVE TO THE CENTERLINE OF THE ROAD.
- b. ALL STATIONS ALONG ROAD CENTERLINE ARE RECKONED FROM NATIONAL ROADS

DPWH STANDARD BILLBOARD :

DPWH STANDARD BILLBOARD MUST BE FABRICATED AND INSTALLED PRIOR TO COMMENCEMENT OF WORK AND MUST CONTAIN INFORMATION REGARDING THE PROJECT AND INSTALLED AT THE START AND END OF THE PROJECT.

THIS PLAN WILL SERVE ONLY AS GUIDE IN THE IMPLEMENTATION PARTICULARLY IN THE PRE-CONSTRUCTION STAGE. IT IS ALSO SUBJECTED TO AN AS-STAKED SURVEY TO BE CONDUCTED JOINTLY BY THE DIRECT IMPLEMENTING OFFICE AND THE CONTRACTOR AND SUBSEQUENTLY PLAN SHALL BE PREPARED AND SUBMITTED FOR APPROVAL.

GROUTED RIPRAP

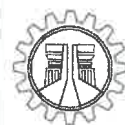
THIS ITEM SHALL CONSIST OF THE FURNISHING AND PLACING OF RIPRAP WITH OR WITHOUT GROUT AS THE CASE MAYBE, WITH OR WITHOUT FILTER BACKING, FURNISHED AND CONSTRUCTED IN ACCORDANCE WITH THIS SPECIFICATIONS AND TO THE LINES AND GRADES AND DIMENSIONS SHOWN ON THE PLANES.

STONES FOR RIPRAP SHALL BE CLASS A- STONES RANGING FROM A MINIMUM OF 15KG TO A MAXIMUM OF 25KG WITH AT LEAST 50 PERCENT OF THE STONES WEIGHING MORE THAN 20KG. MORTAR FOR GROUTED RIPRAP SHALL CONSIST OF SAND, CEMENT, AND WATER CONFORMING TO THE REQUIREMENTS GIVEN UNDER ITEM 405.

ALL WALLS OF THE ABUTMENTS SHALL BE PROVIDED WITH WEEPHOLES. UNLESS OTHERWISE SHOWN ON THE PLANS OR AS DIRECTED BY THE ENGINEER, THE WEEPHOLES SHALL BE PLACED HORIZONTALLY AT THE LOWEST POINTS WHERE FREE OUTLETS FOR WATER CAN BE OBTAINED AND SHALL BE SPACED AT NOT MORE THAN 2M CENTER TO CENTER IN STAGGERED MANNER. THE LENGTH OF THE WEEPHOLES PIPE MATERIAL ACCEPTED BY THE ENGINEER. WEEPHOLES MUST BE PROVIDED WITH FILTER BAGS AS SPECIFIED PROVISIONS OR AS DIRECTED BY THE ENGINEER, AND SHALL BE INCIDENTAL PAY ITEM 505

SUMMARY OF QUANTITIES

ITEM NO.	DESCRIPTION	QUANTITY	UNIT	
PART B	OTHER GENERAL REQUIREMENT			
B.5	PROJECT BILLBOARD/ SIGNBOARD	2.00	Each	
B.8(2)	TRAFFIC MANAGEMENT	1.00	L.S.	
PART C	EARTHWORK			
101(1)	REMOVAL OF STRUCTURES AND OBSTRUCTIONS		Sq.M.	
PART D	DRAINAGE & SLOPE PROTECTION STRUCTURES			
505(2)a	GROUTED RIPRAP		Cu.M.	



REPUBLIC OF THE PHILIPPINES
DEPARTMENT OF PUBLIC WORKS AND HIGHWAYS
REGIONAL OFFICE VIII
**NORTHERN SAMAR SECOND
DISTRICT ENGINEERING OFFICE**
Brgy. Burebudy, Licaoang Northern Samar

PROJECT NAME AND LOCATION:

REPAIR/ REHABILITATION OF SLOPE
PROTECTION OF MANAYBANAY BRIDGE
ABUTMENT B, BRGY. MANAYBANAY,
MAPANAS, NORTHERN SAMAR.

SHEET CONTENTS:

GENERAL NOTES
SUMMARY OF QUANTITIES

DRAFTED/ PREPARED:

AIVAN KEIR C. SALAZAR
ENGINEER
DATE:

REVIEWED:

NICANOR L. MEJOS, JR.
ENGINEER
DATE:

SUBMITTED:

FRANCISCO Y. TAÑALA
CHIEF ENGINEERING SECTION
DATE:

RECOMMENDED:

ATTY. ARTHUR ERIC L. SABONG
ASSISTANT DISTRICT ENGINEER
DATE:

APPROVED:

CHARLITO S. CARLOS
DISTRICT ENGINEER
DATE:

SET NO.

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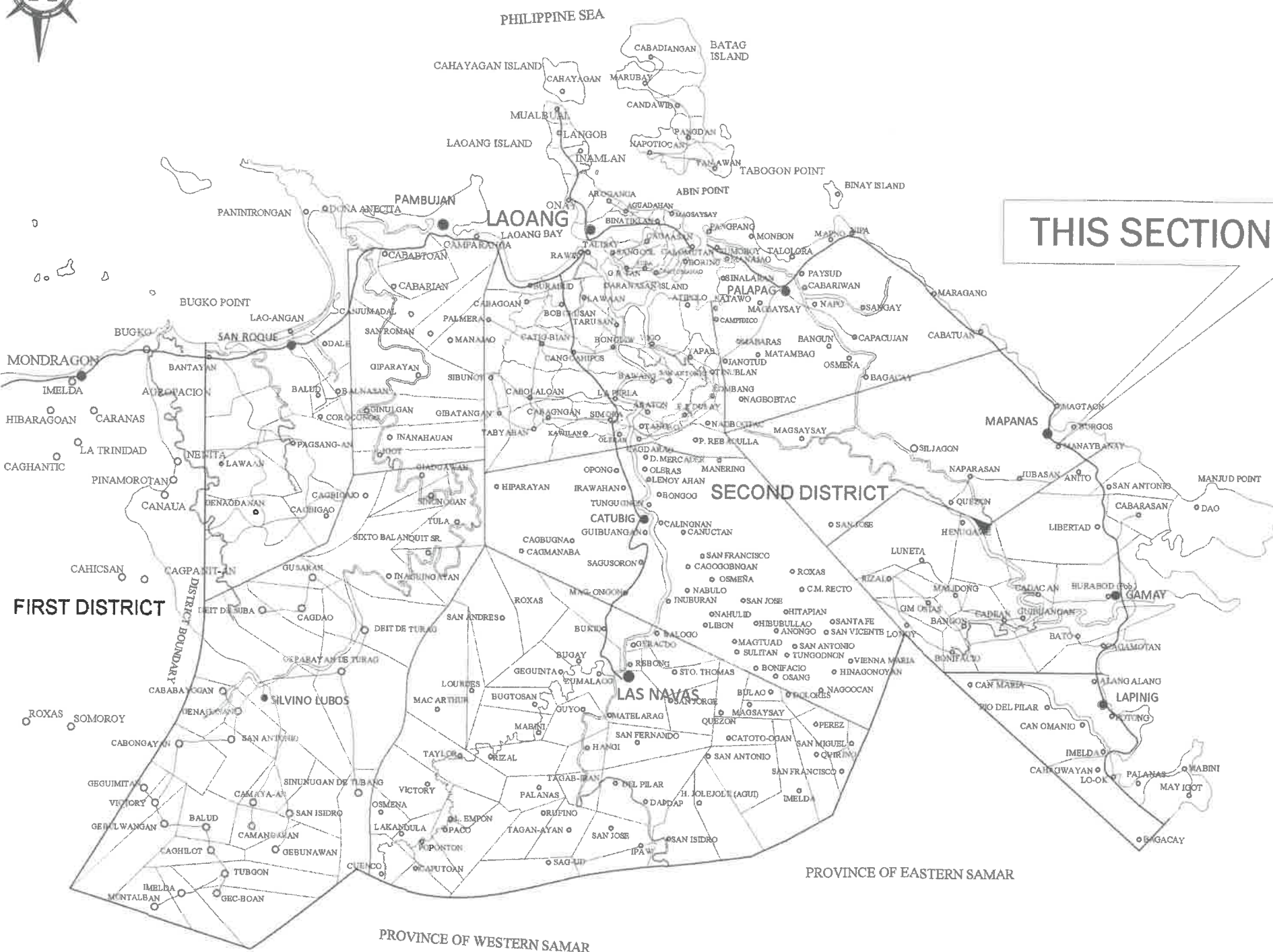
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LEGEND :

	Length:
BANTAYAN (BNDRY.)-RAWIS ROAD	23.771 km.
SAN ROQUE-CABABTOAN OLD ROAD	7.378 km.
RAWIS-CATUBIG ROAD	18.987 km.
CATUBIG-LAS NAVAS ROAD	11.557 km.
LAOANG-CALOMOTAN ROAD	6.487 km.
PANGPANG-PALAPAG-MAPANAS-GAMAY-LAPINIG-ARTECHE (BNDRY) ROAD	73.50 km.
Pangpang-Palapag	5.5 km.
Palapag-Mapanas	27 km.
Mapanas-Gamay	15 km.
Gamay-Lapinig	9 km.
Lapinig-Arteche (Bndry), Eastern Samar	17 km.
Total	73.50 km.
Total Length of National Road	141.68 km.

THIS SECTION



- CONGRESSIONAL DISTRICT BOUNDARY
- SECONDARY ROADS (FMR)
- MUNICIPAL BOUNDARY
- BARANGAY BOUNDARY
- RIVERS/CREEKS
- MUNICIPALITY
- BARANGAY

MAP OF NORTHERN SAMAR SECOND ENGINEERING DISTRICT



REPUBLIC OF THE PHILIPPINES
DEPARTMENT OF PUBLIC WORKS AND HIGHWAYS
REGIONAL OFFICE VIII
NORTHERN SAMAR SECOND
DISTRICT ENGINEERING OFFICE
Brgy. Burabud, Laoang Northern Samar

PROJECT NAME AND LOCATION:

REPAIR/REHABILITATION OF SLOPE
PROTECTION OF MANAYBANAY BRIDGE
ABUTMENT B, BRGY. MANAYBANAY,
MAPANAS, NORTHERN SAMAR.

SHEET CONTENTS:

LOCATION MAP

DRAFTED/ PREPARED:

AIWAN KEIR C. SALAZAR
ENGINEER II
DATE:

REVIEWED:

NICANOR L. MEJOS, JR.
ENGINEER I
DATE:

SUBMITTED:

FRANCISCO Y. TANALA
CHIEF, MAINTENANCE SECTION
DATE:

RECOMMENDED:

ATTY. ARTHUR ERIC L. SABONG
ASSISTANT DISTRICT ENGINEER
DATE:

APPROVED:

CHARLITO S. CARLOS
DISTRICT ENGINEER
DATE:

SET NO.

B
1 2

SHEET NO.

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Road Name: 1. Pangpang-Palapag-Mapanas-Gamay-Lapinig-Arteche (Bndry.) Road
2. San Policarpo-Arteche-Lapinig Road

Station Limit From: 1. K0797+381 To K0850+610 (S00037SM)
2. K0851+376 To K0867+820 (S00060SM)

TOTAL LENGTH: 53.285 Km.
TOTAL LENGTH: 17.260 Km.

Beginning of Road Section
K0797+381



End of Road Section
K0867+820
(Boundary)

1
S 4

STRAIGHT LINE DIAGRAM

NOT TO SCALE



REPUBLIC OF THE PHILIPPINES
DEPARTMENT OF PUBLIC WORKS AND HIGHWAYS
REGIONAL OFFICE VIII
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Brgy. Burebud, Lasing Northern Samar

PROJECT NAME AND LOCATION:

REPAIR/ REHABILITATION OF SLOPE
PROTECTION OF MANAYBANAY BRIDGE
ABUTMENT B, BRGY. MANAYBANAY,
MAPANAS, NORTHERN SAMAR.

SHEET CONTENTS:

STRAIGHT LINE DIAGRAM

DRAFTED/ PREPARED:

AIVAN KEIR C. SAMAZAR
ENGINEER
DATE:

REVIEWED:

NICANOR L. MEJOS, JR.
ENGINEER
DATE:

SUBMITTED:

FRANCISCO Y. TAÑALA
CHIEF, MAINTENANCE SECTION
DATE:

RECOMMENDED:

ATTY. ARTHUR ERIC L. GABONG
ASSISTANT DISTRICT ENGINEER
DATE:

APPROVED:

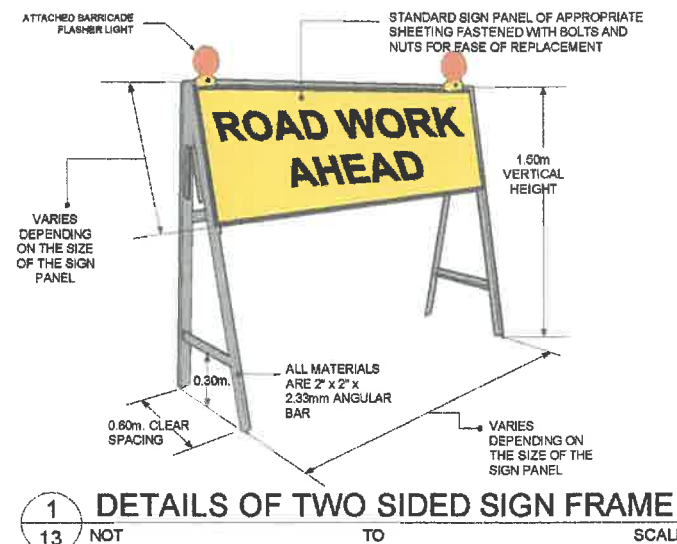
CHARLITO S. CARLOS
DISTRICT ENGINEER
DATE:

SET NO.

B
2 2

SHEET NO.

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ROAD WORK SITE TEMPORARY SIGNAGE		SIGNAGE DESCRIPTION			
		SIGN NO.	SIZE (mm) (WIDTH X HEIGHT)	LETTERS/SYMBOLS	BACKGROUND
ADVANCE WARNING SIGN					
	ROADWORK AHEAD (T1-2)	T1-2	1800 x 600	LINE 1-BLACK 200 DM LINE 2-BLACK 160 DM	YELLOW REFLECTORIZED
	END ROADWORK (T2-18, T2-17)	T2-16	1800 x 600	LINE 1-BLACK 200 DM LINE 2-BLACK 160 DM	YELLOW REFLECTORIZED
	WORKMEN AHEAD (Symbolic) (T1-5)	T1-5	900 x 600	BLACK	RED / ORANGE REFLECTORIZED
REGULATORY SIGN					
	SPEED RESTRICTION (R4-1)	R4-1	600 x 800	BLACK 240 DN CIRCLE 600 DIA. RED	WHITE REFLECTORIZED RED CIRCLE-REFLECTORIZED
	PREPARE TO STOP (T1-18)	T1-18	900 x 600	LINE 1-WHITE 120 DM LINE 2-WHITE 120 DM LINE 3-WHITE 120 DM REFLECTORIZED	RED REFLECTORIZED
TEMPORARY HAZARD MARKER					
	TEMPORARY HAZARD MARKER (T5-5)	T5-5	600 x 600 TYPE B-3	CHEVRONS BLACK 194 WIDE AT 45°	YELLOW REFLECTORIZED
	TRAFFIC CONE	TC			ORANGE WHITE REFLECTORIZED
	TRAFFIC CONE W/ FLASHER LIGHT	TCL			ORANGE WHITE REFLECTORIZED

STANDARD TEMPORARY SIGNAGE DETAIL

2440mm (8 ft)

1220 (4 ft)

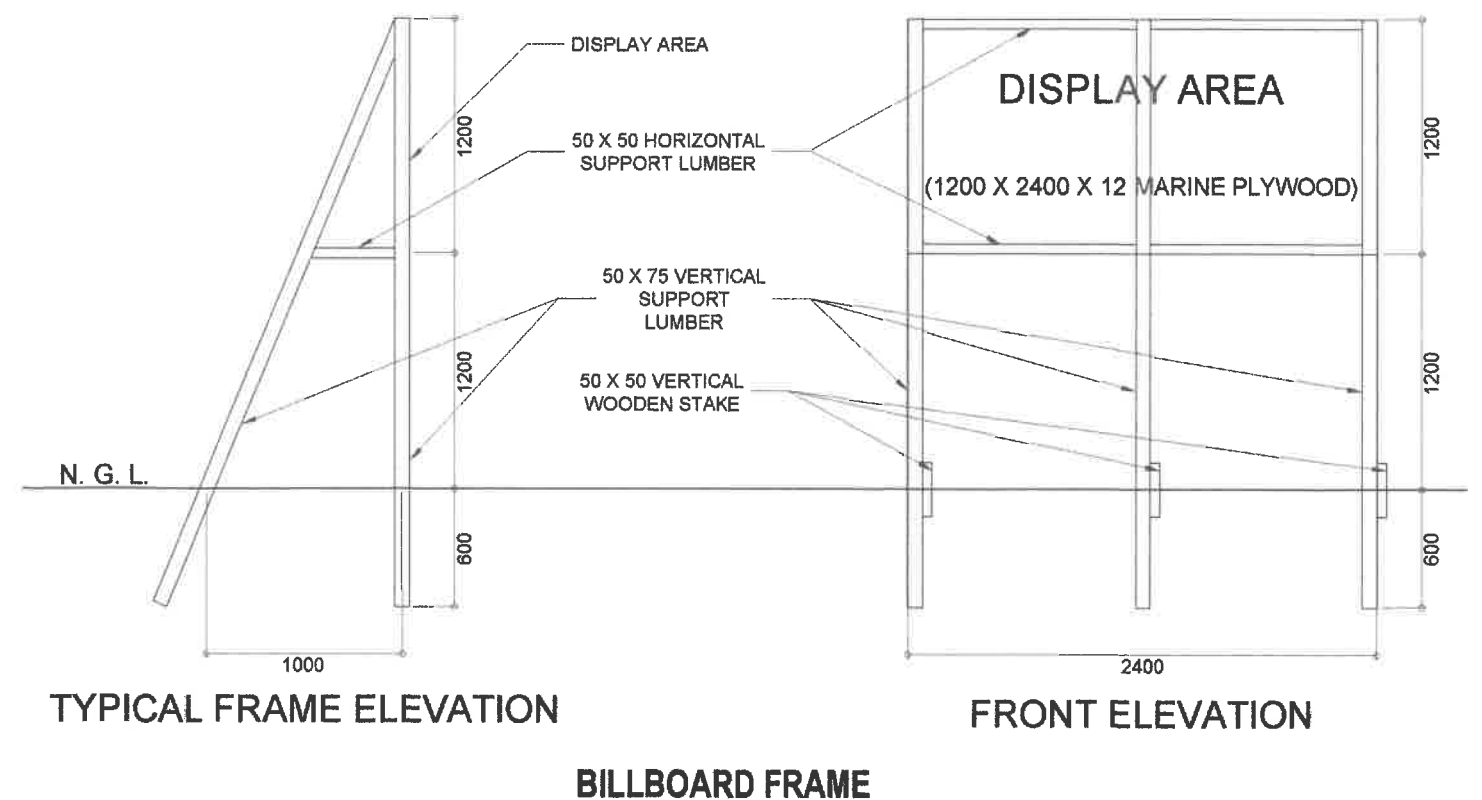
THIS IS WHERE YOUR TAXES GO

NAME OF PROJECT :
LOCATION :
NAME OF CONTRACTOR :
DATE STARTED :
CONTRACT COMPLETION DATE :
CONTRACT COST :
IMPLEMENTING OFFICE :
SOURCE OF FUND :

Department of Public Works and Highways
TEXT 2020 or CALL (02)195-02 for any concern on this project
www.dphh.gov.ph

DPWH STANDARD PROJECT BILLBOARD

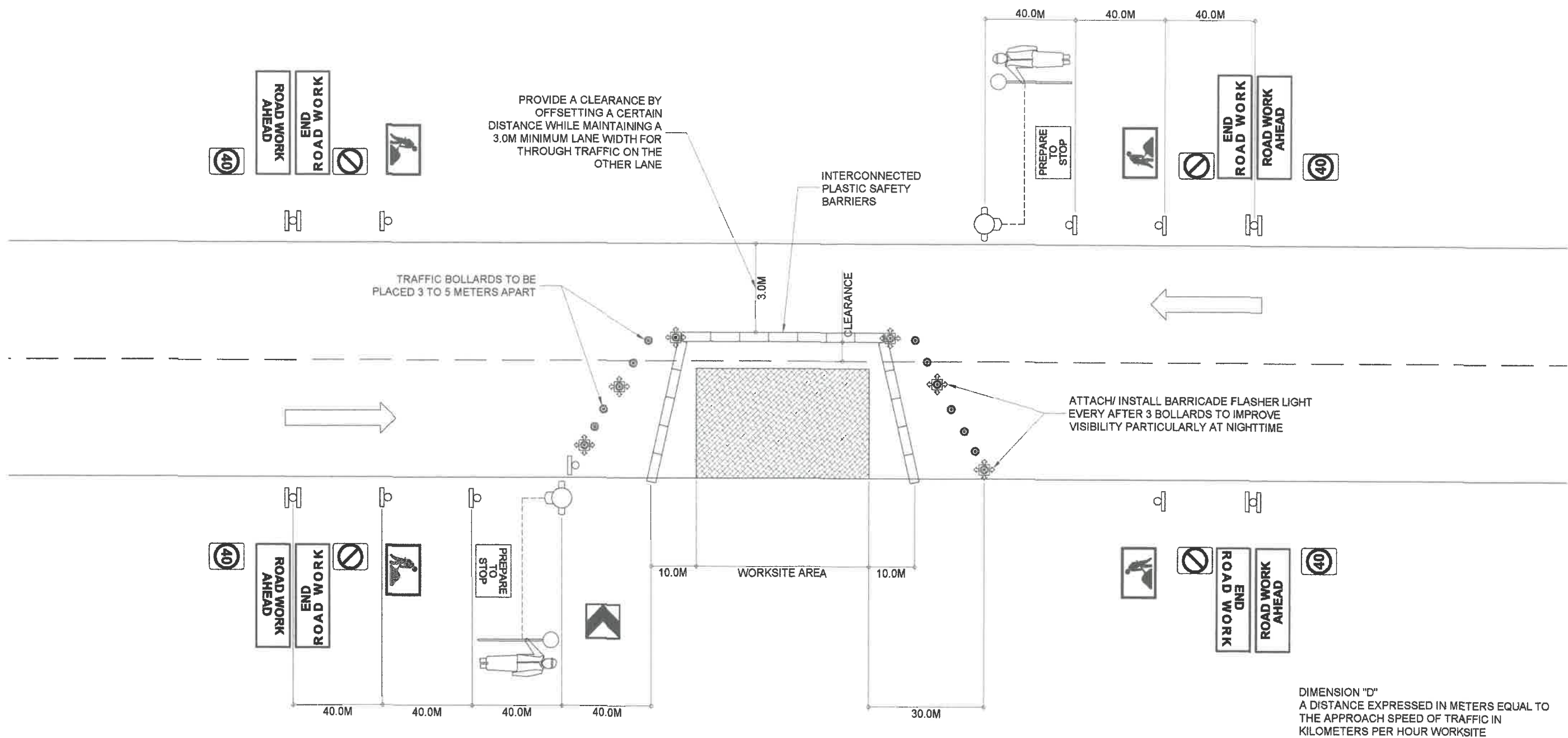
NOTE :
INSTALLATION OF BILLBOARD SHALL CONFORM WITH DEPARTMENT ORDER NO. 11, SERIES OF 2022, REVISED GUIDELINES ON THE INSTALLATION OF PROJECT BILLBOARDS.



3B STANDARD DETAIL OF PROJECT BILLBOARD

S 12 SCALE: AS SHOWN

 REPUBLIC OF THE PHILIPPINES DEPARTMENT OF PUBLIC WORKS AND HIGHWAYS REGIONAL OFFICE VIII NORTHERN SAMAR SECOND DISTRICT ENGINEERING OFFICE Brgy. Burebud, Lasing Northern Samar		PROJECT NAME AND LOCATION:	SHEET CONTENTS:	DRAFTED/ PREPARED:	REVIEWED:	SUBMITTED:	RECOMMENDED:	APPROVED:	SET NO.	SHEET NO.
		REPAIR/ REHABILITATION OF SLOPE PROTECTION OF MANYABANAY BRIDGE ABUTMENT B, BRGY. MANYABANAY, MAPANAS, NORTHERN SAMAR.	STANDARD TEMPORARY SIGNAGE DETAIL STANDARD DETAIL OF PROJECT BILLBOARD	AIVAN KEIR C. SALAZAR ENGINEER I DATE:	NICANOR L. MEJOS, JR. ENGINEER II DATE:	FRANCIS Y. TAÑALA DISTRICT MAINTENANCE SECTION DATE:	ATTY. ARTHUR ERIC L. SABONG ASSISTANT DISTRICT ENGINEER DATE:	CHARLITO S. CARLOS DISTRICT ENGINEER DATE:	C 1 1	5 7



E
S 10 **TRAFFIC MANAGEMENT LAYOUT**
SCALE: AS SHOWN



REPUBLIC OF THE PHILIPPINES
DEPARTMENT OF PUBLIC WORKS AND HIGHWAYS
REGIONAL OFFICE VIII
NORTHERN SAMAR SECOND DISTRICT ENGINEERING OFFICE
Brgy. Burebud, Lasing Northern Samar

PROJECT NAME AND LOCATION:

REPAIR/ REHABILITATION OF SLOPE PROTECTION OF MANAYBANAY BRIDGE ABUTMENT B, BRGY. MANAYBANAY, MAPANAS, NORTHERN SAMAR.

SHEET CONTENTS:

TRAFFIC MANAGEMENT LAYOUT

DRAFTED/ PREPARED:

AIVAN KEIR C. SALAZAR
ENGINEER II
DATE:

REVIEWER:

NICANOR L. MEJOS, JR.
ENGINEER III
DATE:

SUBMITTED:

FRANCIS RAY TAÑALA
SUPER. MAIN DIVISION SECTION
DATE:

RECOMMENDED:

ATTY. ARTHUR L. SABONG
ASSISTANT DISTRICT ENGINEER
DATE:

APPROVED:

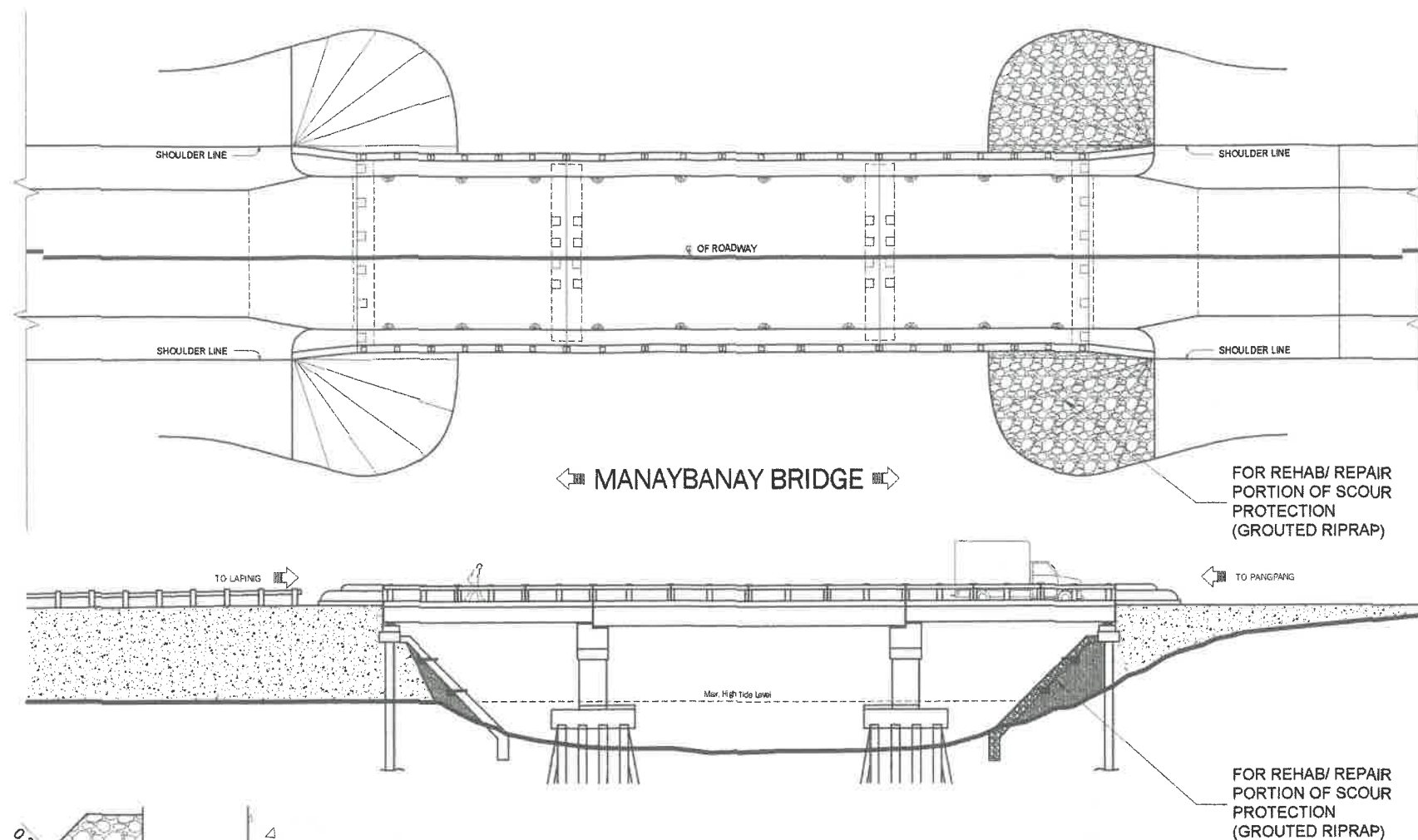
CHARLITO S. CARLOS
DISTRICT ENGINEER
DATE:

SET NO.

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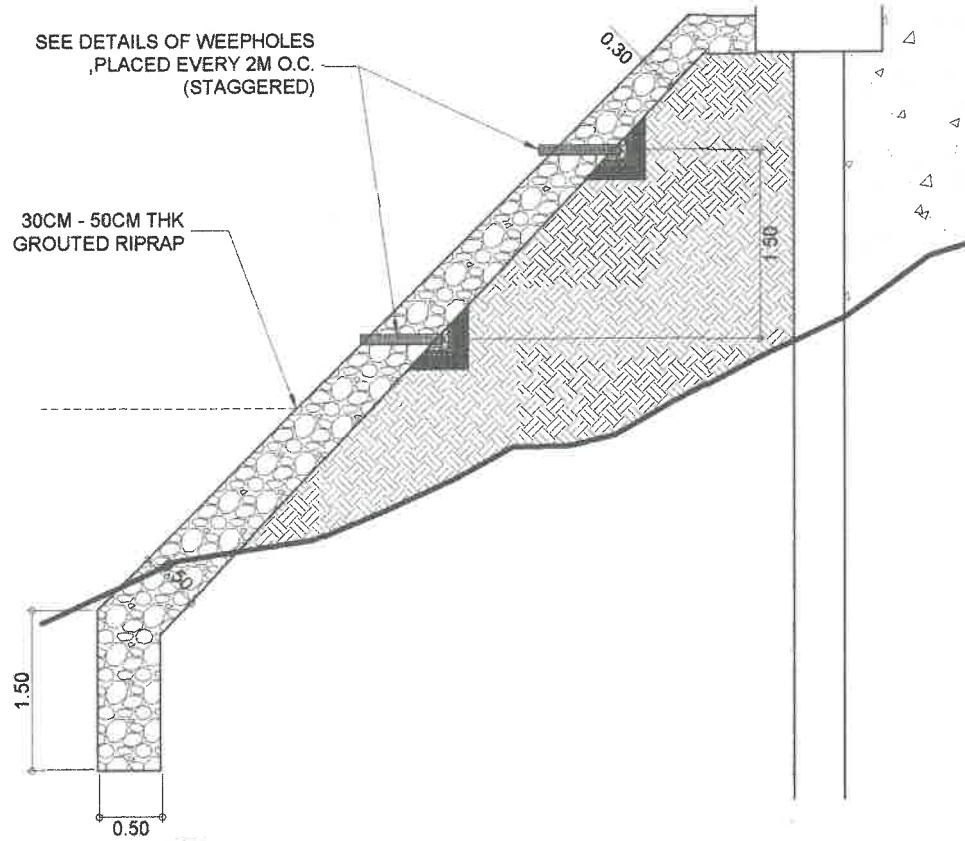
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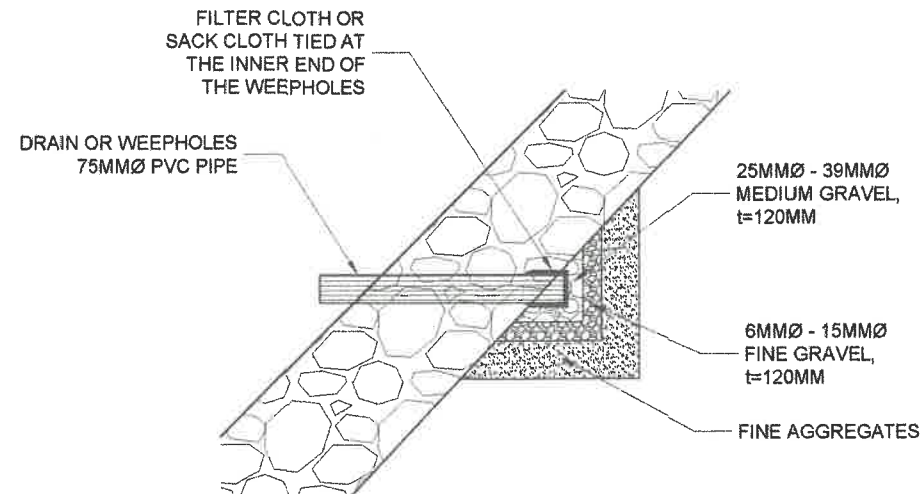
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PLAN & ELEVATION OF MANAYBANAY BRIDGE
SCALE: 1: 300

SEE DETAILS OF WEEPHOLES
, PLACED EVERY 2M O.C.
(STAGGERED)

30CM - 50CM THK
GROUTED RIPRAP



2
S 7
DETAIL OF GROUTED RIPRAP (SCOUR PROTECTION)
SCALE: 1: 60



2
S 7
DETAIL OF WEEPHOLES
SCALE: 1: 20

REPUBLIC OF THE PHILIPPINES DEPARTMENT OF PUBLIC WORKS AND HIGHWAYS REGIONAL OFFICE VIII NORTHERN SAMAR SECOND DISTRICT ENGINEERING OFFICE Brgy. Burebud, Laoang Northern Samar	PROJECT NAME AND LOCATION: REPAIR/ REHABILITATION OF SLOPE PROTECTION OF MANAYBANAY BRIDGE ABUTMENT B, BRGY. MANAYBANAY, MAPANAS, NORTHERN SAMAR.	SHEET CONTENTS: PLAN & SECTION OF MANAYBANAY BRIDGE DETAIL OF GROUTED RIPRAP (SCOUR PROTECTION) DETAIL OF WEEPHOLES	DRAFTED/ PREPARED: AIVAN KEIR S. SALAZAR ENGINEER II DATE: _____	REVIEWED: NICANOR L. MEJOS, JR. ENGINEER III DATE: _____	SUBMITTED: FRANCISCO Y. TANALA DEPT. MAINTENANCE SECTION DATE: _____	RECOMMENDED: ATTY. ARTHUR ERIC L. SABONG ASSISTANT DISTRICT ENGINEER DATE: _____	APPROVED: CHARLITO S. CARLOS DISTRICT ENGINEER DATE: _____	SET NO. SHEET NO. E 7 1 7
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