




REPUBLIC OF THE PHILIPPINES
DEPARTMENT OF AGRICULTURE
WESTERN VISAYAS
PAROLA, ILOILO CITY

DETAILED ENGINEERING DESIGN PLANS
ESTABLISHMENT OF SIGNE
SOLAR-POWERED IRRIGATION SYSTEM
(HVCDP 2025)

BRGY. SIGNE, IGBARAS, ILOILO

Submitted:


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Engineer V (License No. 0006077)
Chief, R&ED

Recommended:

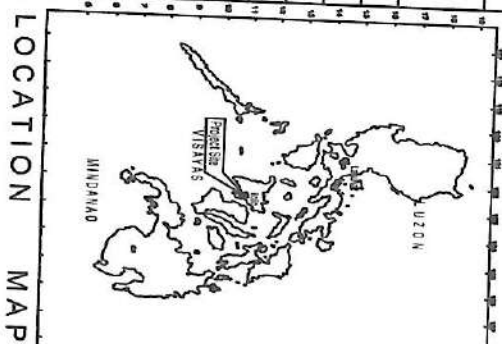

MARIA TERESA P. SOLIS
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Approved:


DENNIS R. ATPIA
Regional Executive, Director

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LIST OF DRAWINGS



PERSPECTIVE VIEW
SCALE: 1:800

TECHNICAL DATA

PUMP: 1 UNIT 4HP SUBMERSIBLE PUMP
INVERTER/CONTROLLER: 1 UNIT 4KW
SOLAR PANEL: 10 SOLAR MODULES (550 WATT-PEAK/MODULE)
TOTAL POWER: 5,500 watt-peak
CONVEYANCE:
10 meters - 3" dia. HDPE PIPE SDR 11 (PE100)
from Pump to Tank
132 meters - 3" dia. HDPE SDR 17 (PE100)
Distribution Pipe.
SERVICE AREA: 3 ha.
DISCHARGE: 40.22 cu.m./hr.

Item No.	Scope of Works	Quantity	Unit
SPL 1	TEMPORARY FACILITY	1.00	lot
B.16 & B.5 and 1-8x8	PROJECT MARKER & SIGNBOARD BILLBOARD (1.4x8)	1.00	lot
B.9	MOBILIZATION/DEMOLITION	1.00	lot
1	WELL DEVELOPMENT (with groundwater/pump testing)	1.00	lot
1	SOLAR PUMP/ARRAY/MOUNTING STRUCTURE	1.00	lot
303	STRUCTURE EXCAVATION (FOR FOUNDATION/PEDESTAL)	2.87	m3
1708	LEVELLING COURSE	0.40	m3
404	REINFORCING STEEL BARS	120.46	kg
414	FORMWORKS	15.36	m2
406	CONCRETE FOUNDATION/PEDESTAL (Class B)	1.92	m3
1705	STRUCTURE BACKFILL	2.70	m3
1	SOLAR POWER MODULE MOUNTING STRUCTURE	1.00	lot
2	SOLAR POWER MODULES (Monocrystalline-550 watt-peak)	1.00	lot
3	INVERTER & CONTROLLER - 4 kW	1.00	unit
4	SOLAR PUMP (SUBMERSIBLE) - 4 HP	1.00	unit
5	INVERTER & CONTROLLER BOX	1.00	lot
803	ELEVATED TANK	2.84	m3
405	STRUCTURE EXCAVATION	0.72	m3
404	CONCRETE WORKS (Class A)	94.32	kg
SPL 2	REINFORCING STEEL BAR	1.00	lot
1201 (e)	STORAGE TANK METAL FRAME	1.00	lot
1602 & 1603	INSTALLATION OF WATER/TANK PIPES, VALVES & FITTINGS	1.00	lot
1705	STRUCTURAL BACKFILL	1.82	m3

REPUBLIC OF THE PHILIPPINES

DEPARTMENT OF AGRICULTURE

WESTERN VISAYAS

PAROLA, ILOILO CITY

ESTABLISHMENT OF

ABILAY SUR SPIS

BRGY. ABILAY SUR, OTON,

ILOILO

SHEET NO. 1

PREPARED BY:

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CHECKED/SUBMITTED BY:

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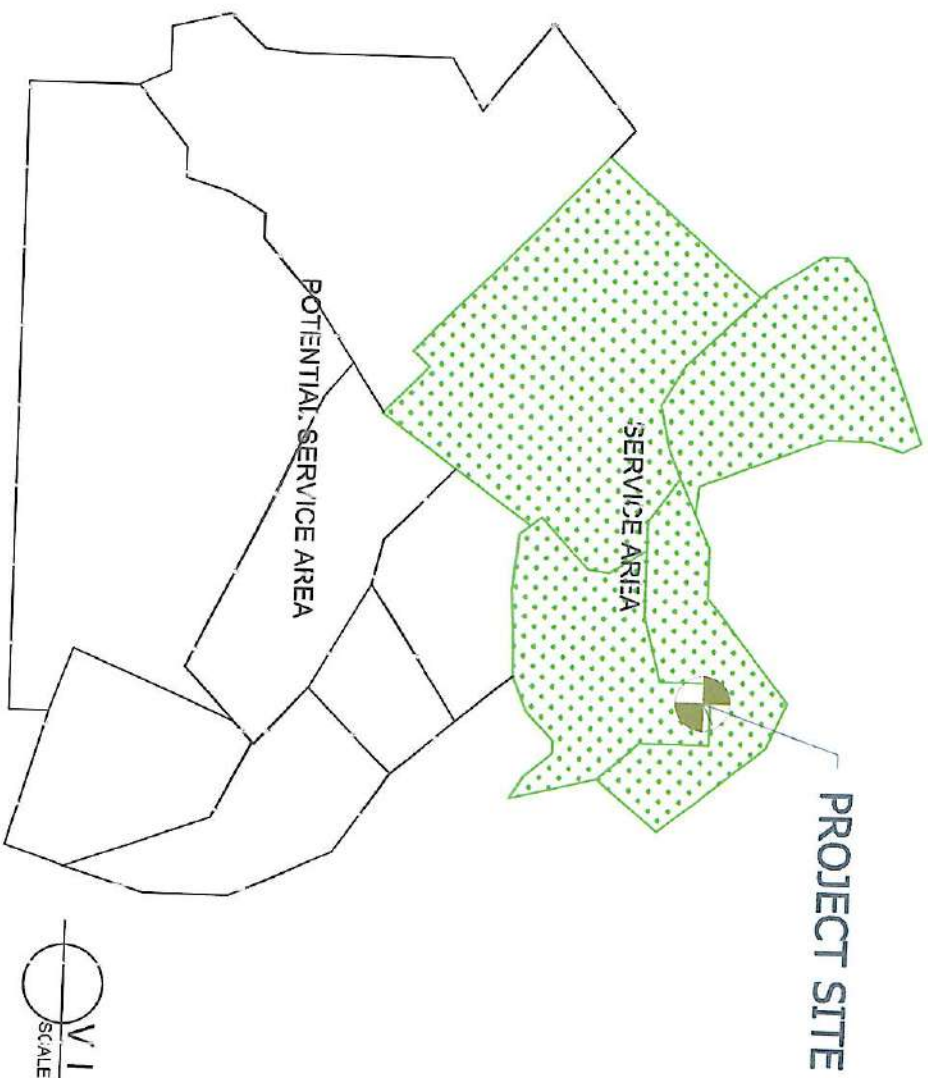
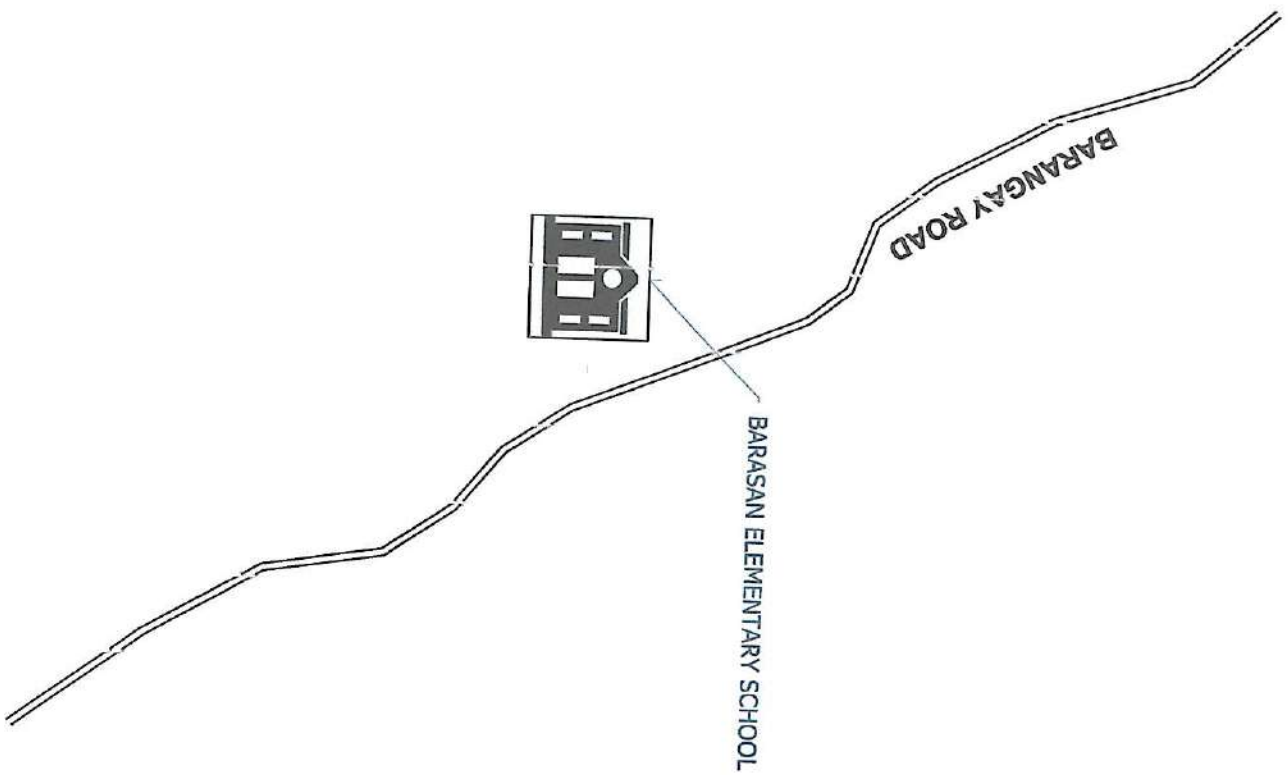
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Project Administrative Director

SHEET NO. 1

PAGE NO. 8



VICINITY MAP
SCALE: N T S

REPUBLIC OF THE PHILIPPINES
DEPARTMENT OF AGRICULTURE
WESTERN VISAYAS
PAROLA, ILOILO CITY

PROJECT NAME & LOCATION:
ESTABLISHMENT OF
ABLAY SUR SPIS

BRGY. ABLAY SUR, OTON,
ILOILO

SHEET CONTENTS:
VICINITY MAP

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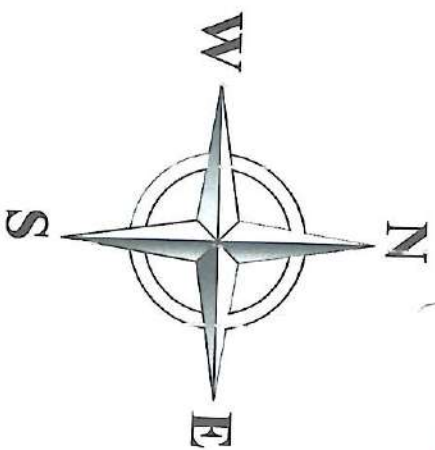
DENIS A. ARPIA
Regional Executive Director

SHEET NO.

1

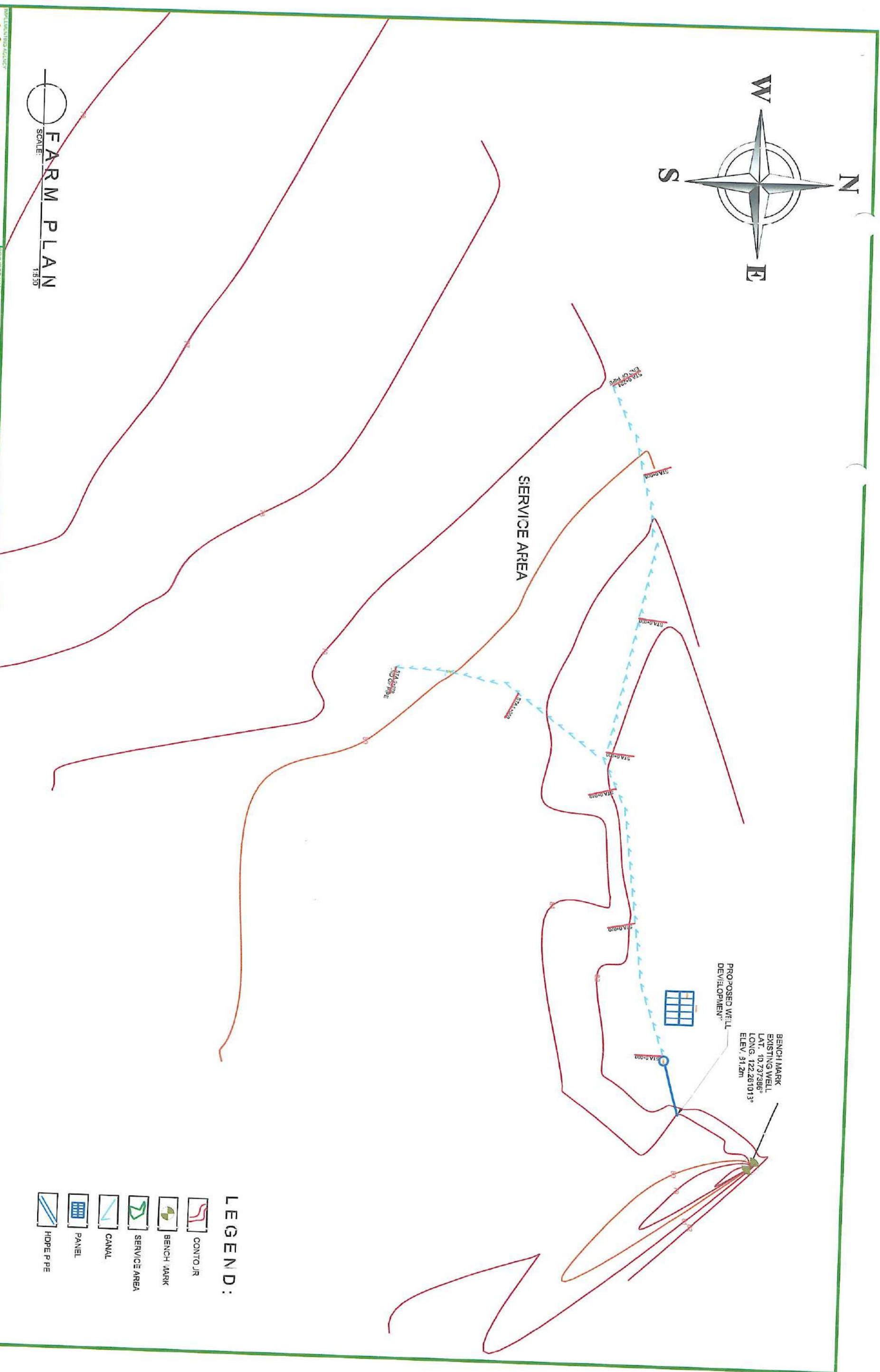
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FARM PLAN
SCALE: 1:500

- LEGEND:**
- CONTOUR
 - BENCH MARK
 - SERVICE AREA
 - CANAL
 - PANEL
 - HOPE PIPE



REPUBLIC OF THE PHILIPPINES
DEPARTMENT OF AGRICULTURE
WESTERN VISAYAS
PAROLA, ILOILO CITY

PROJECT NAME: LOCATION:
ESTABLISHMENT OF
ABLAY SUR SPIS
ILOILO

SHEET CONTAINS:
FARM PLAN

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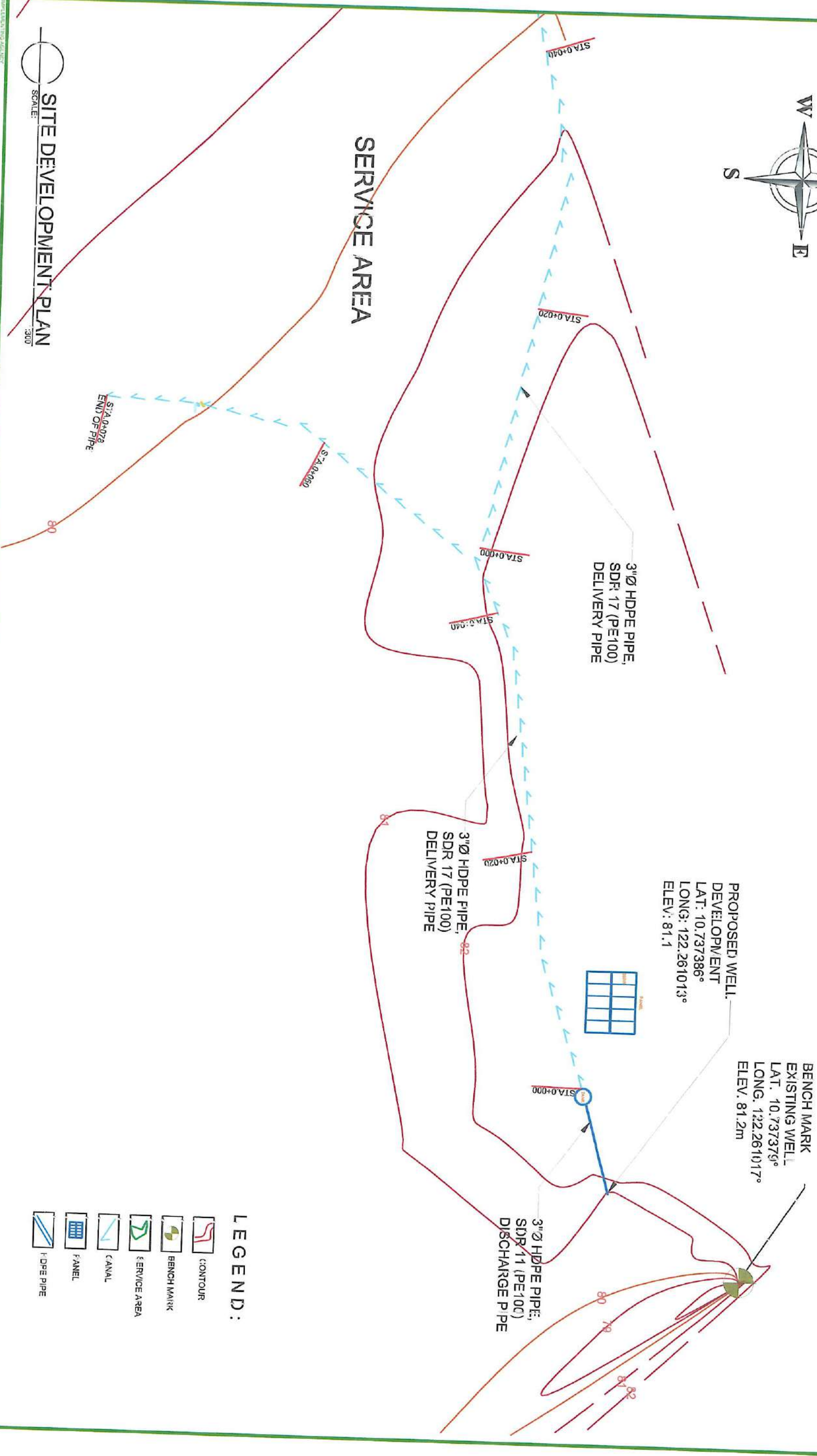
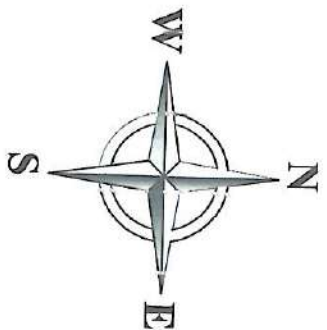
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A

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SITE DEVELOPMENT PLAN
SCALE: 1:300

- LEGEND:
- CONTOUR
 - BENCH MARK
 - SERVICE AREA
 - CANAL
 - PANEL
 - HDPE PIPE

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WESTERN VISAYAS
PAROLA, ILOILO CITY

PROJECT NAME & LOCATION
ESTABLISHMENT OF
ABLAY SUR SPIS

BRGY. ABLAY SUR, OTON,
ILOILO

SHEET CONTENTS
SITE DEVELOPMENT PLAN

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Regional Director

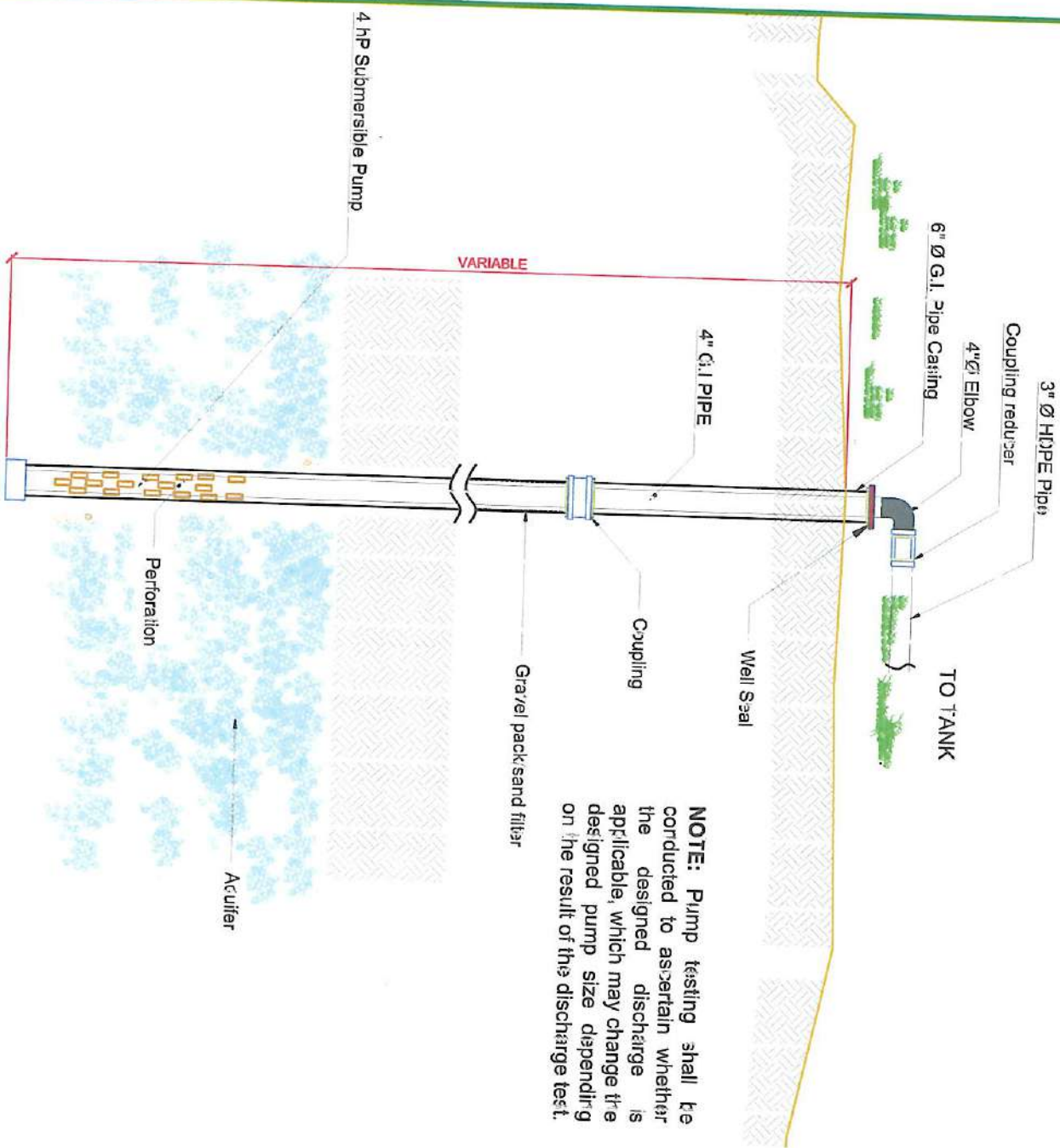
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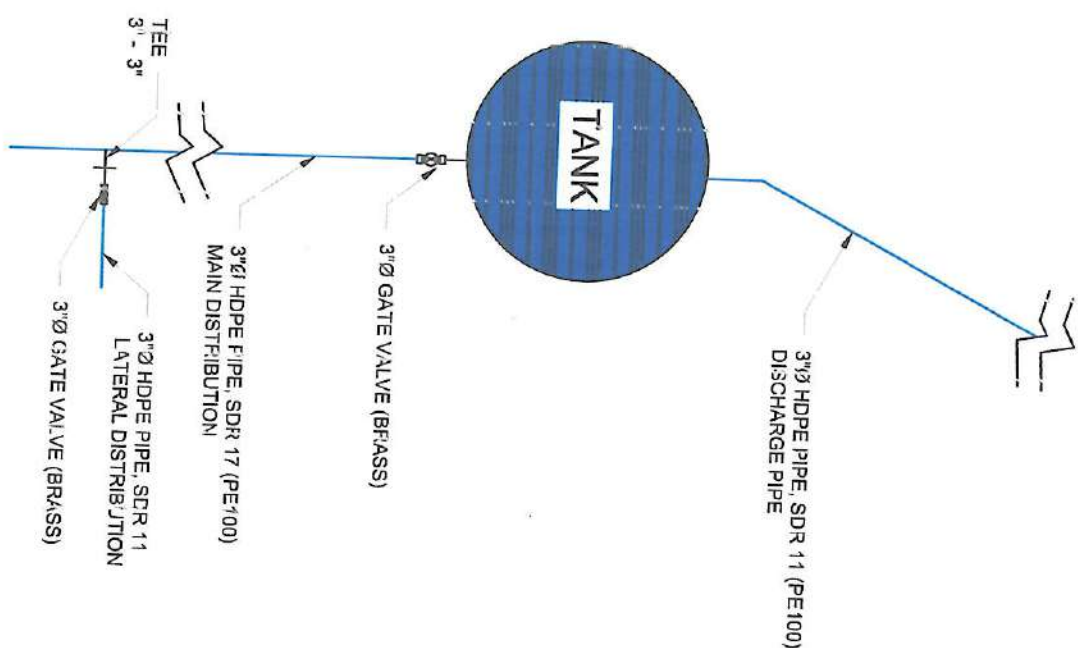


NOTE: Pump testing shall be conducted to ascertain whether the designed discharge is applicable, which may change the designed pump size depending on the result of the discharge test.

Ø	—	GATE VALVE: THREADED
—	—	TEE:
—	—	HDPE PIPE

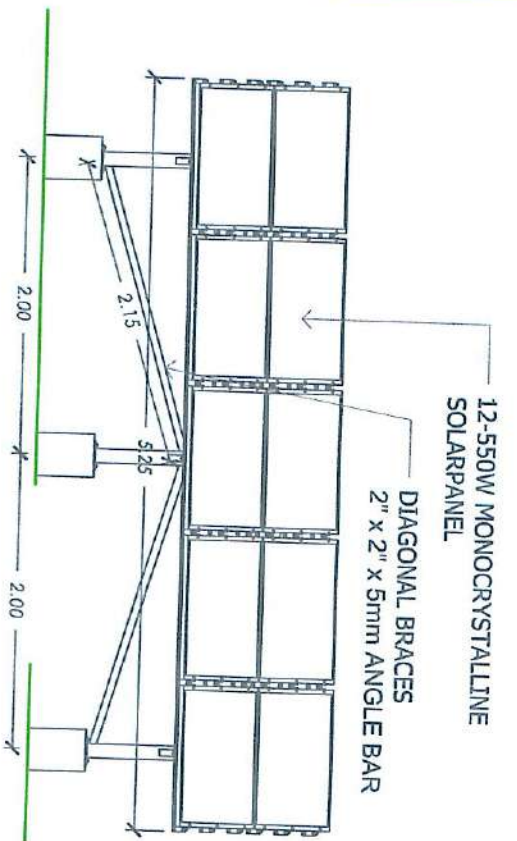
LEGEND

NOTE:
 Discharge Pipe - 3"Ø HDPE Pipe SDR 11 PE100, Irrigation Pipe (30 meters)
 Delivery Pipe - 3"Ø HDPE Pipe SDR 17 PE100, Irrigation Pipe (150 meters)
 with 1 pieces - 3"Ø Gate Valve (Brass).

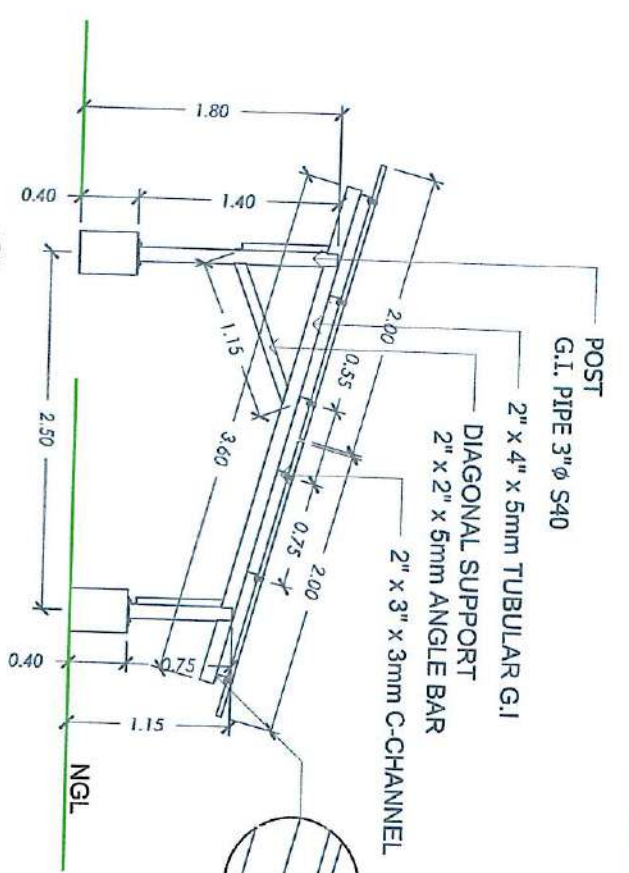


TYPICAL WELL DESIGN
 SCALE: N T S

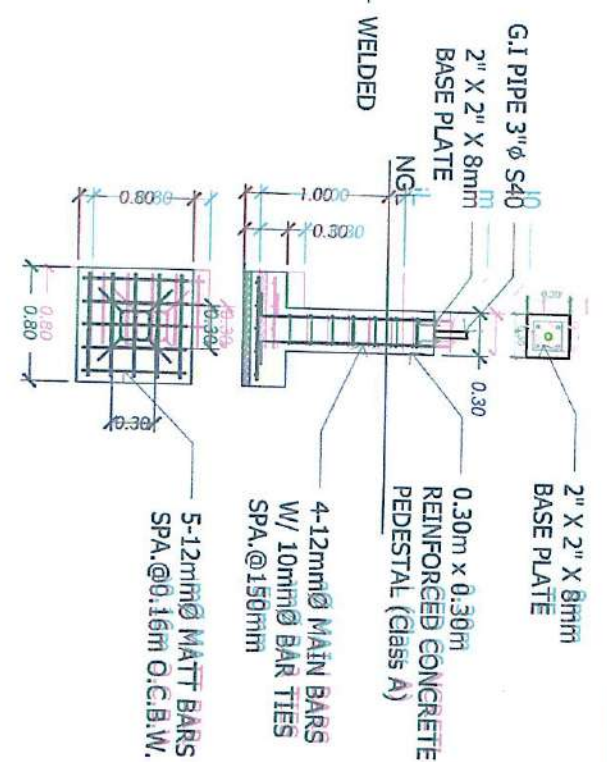
DISTRIBUTION PLAN
 SCALE: N T S



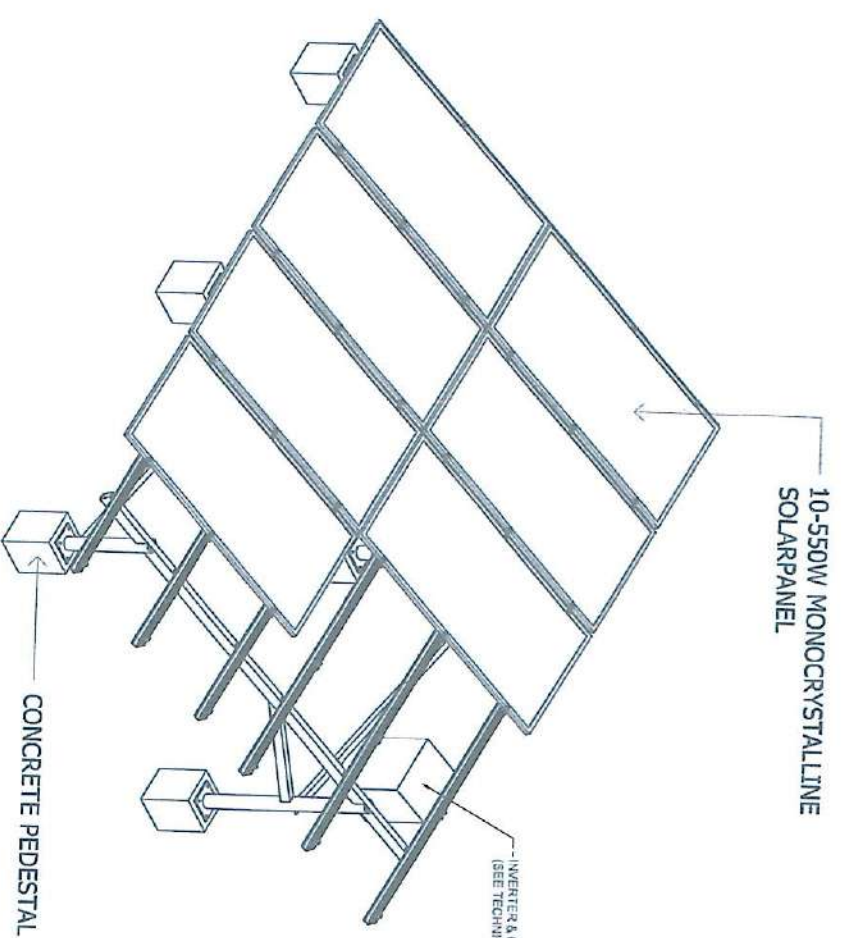
FRONT ELEVATION
SCALE: 1:50



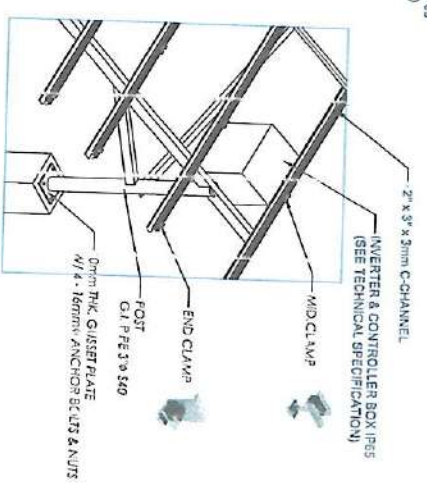
SIDE ELEVATION
SCALE: 1:50



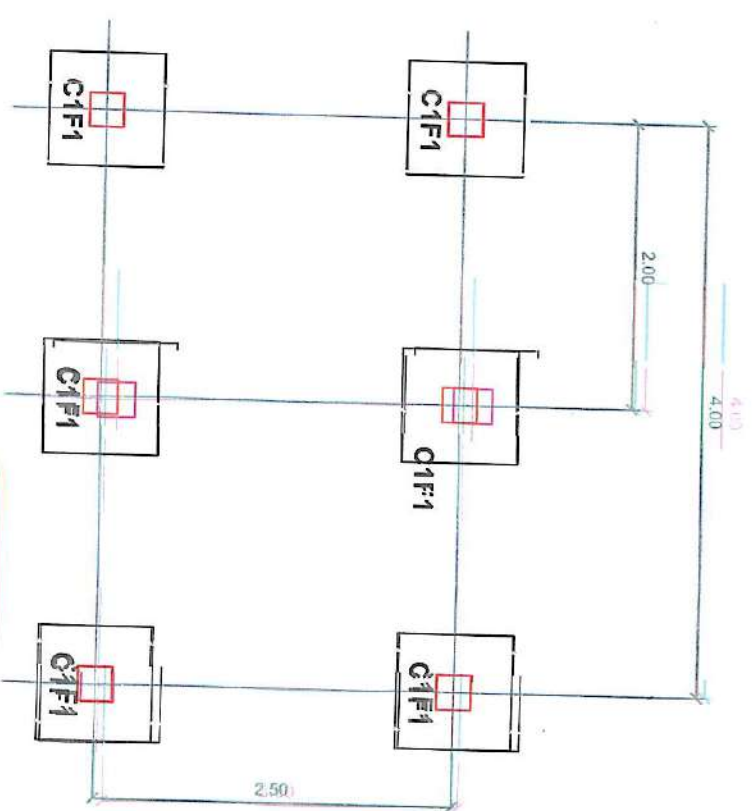
CONCRETE PEDESTAL DETAIL
SCALE: 1:50



ISOMETRIC VIEW
SCALE: 1:50



BLOW-UP SECTION THRU A
SCALE: 1:50



FOUNDATION PLAN
SCALE: 1:50

NOTE:
C1F1 - PV ARRAY



FOUNDATION DETAILS

SCALE: 1 : 30 M



FRONT ELEVATION
SCALE: 1/4" = 1'-0"



SIDE ELEVATION
SCALE 1 : 4.0 M

