



**FUNDED BY: THE EUROPEAN UNION**  
MORNE FORTUNE, CASTRIES ST. LUCIA

DEPT OF FORESTRY VISITORS CENTER DEVELOPMENT  
LOCATED AT BENDALS, ANTIGUA

The Consortium of Caribbean Architects and Planners  
Ltd, CS Consulting Engineers Ltd,  
Kelvin Swanston's Company.



TECHNICAL ASSISTANCE FOR THE DESIGN AND SUPERVISION OF SLM-BASED ECOSYSTEM AND BIODIVERSITY RESTORATION INITIATIVES, IN ST. KITTS AND NEVIS, AND ANTIGUA AND BARBUDA

CLIENT:

O ECS COMMISSION  
MORNE FORTUNE,  
CASTRIES ST. LUCIA

PROJECT:  
DEPT OF FORESTRY  
NURSERY - VISITORS  
CENTER

LOCATION:

BENDALS, ANTIGUA

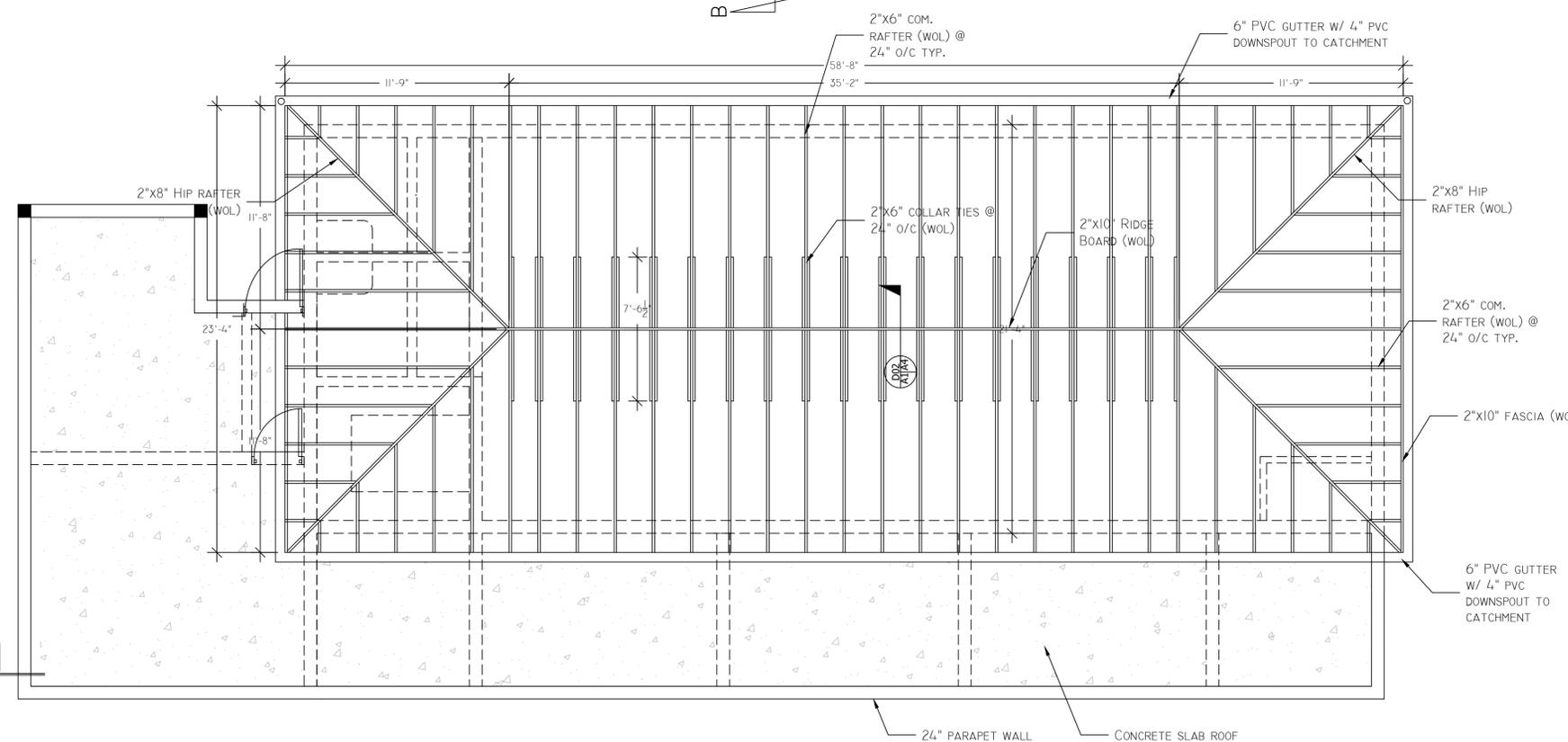
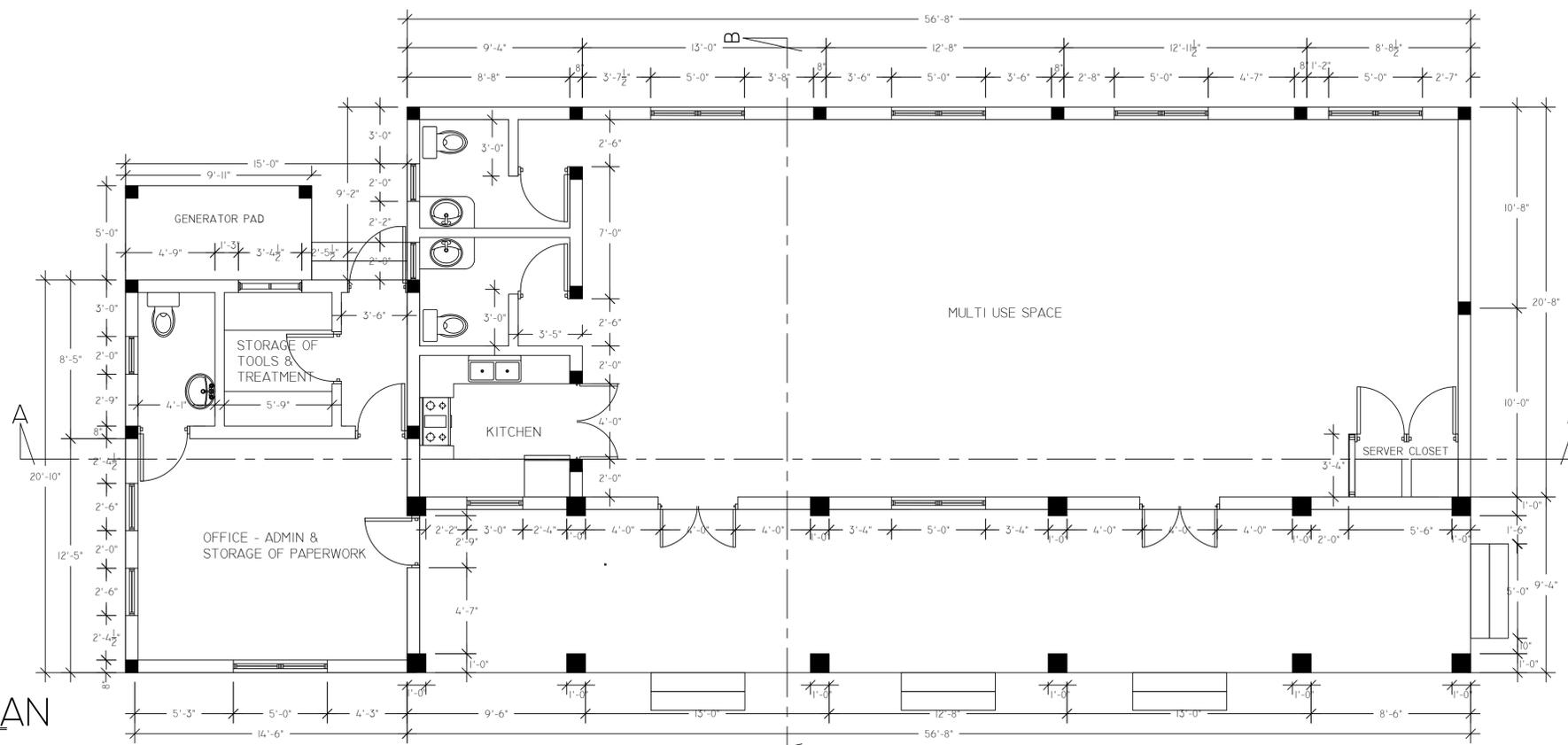
SHEET:

A01 - FLOOR & ROOF  
PLAN

NOTES

Scale:  
1/4" = 1'-0"

Date:  
11th May/2023



**ROOF FRAMING PLAN**  
SCALE: 1/4" = 1'-0"

**FLOOR PLAN**  
SCALE: 1/4" = 1'-0"

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SHEET:

A02 - BUILDING  
ELEVATIONS

NOTES

THE HEIGHT OF FLOOR SLABS SHALL NOT BE LESS THAN 12 INCHES ABOVE FINISHED GRADE

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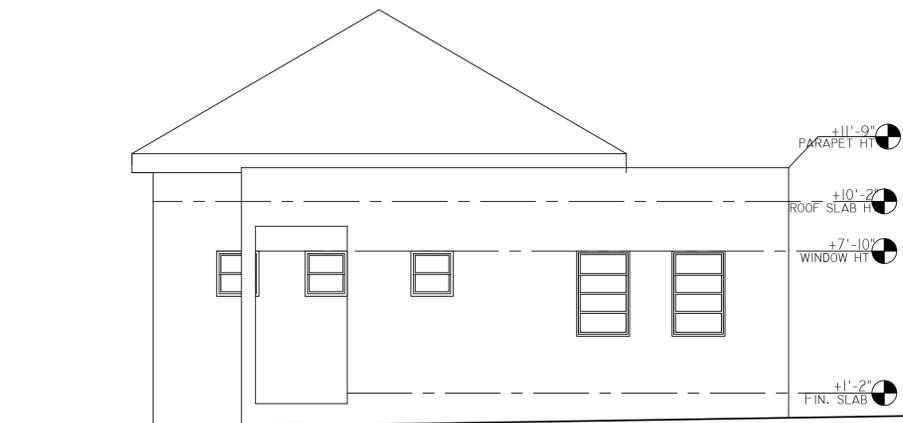
FRONT ELEVATION

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



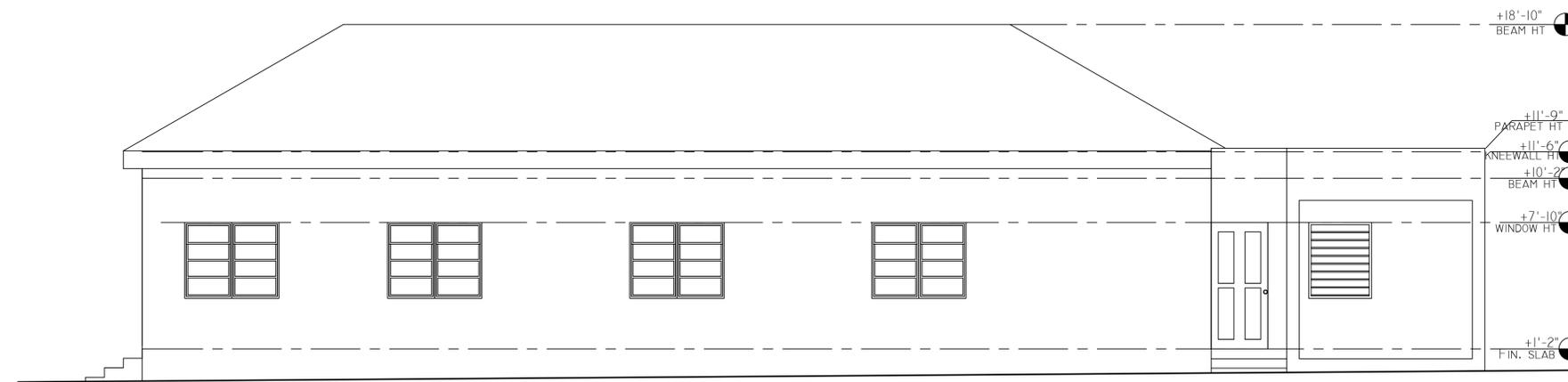
RIGHT ELEVATION

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



LEFT ELEVATION

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



REAR ELEVATION

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

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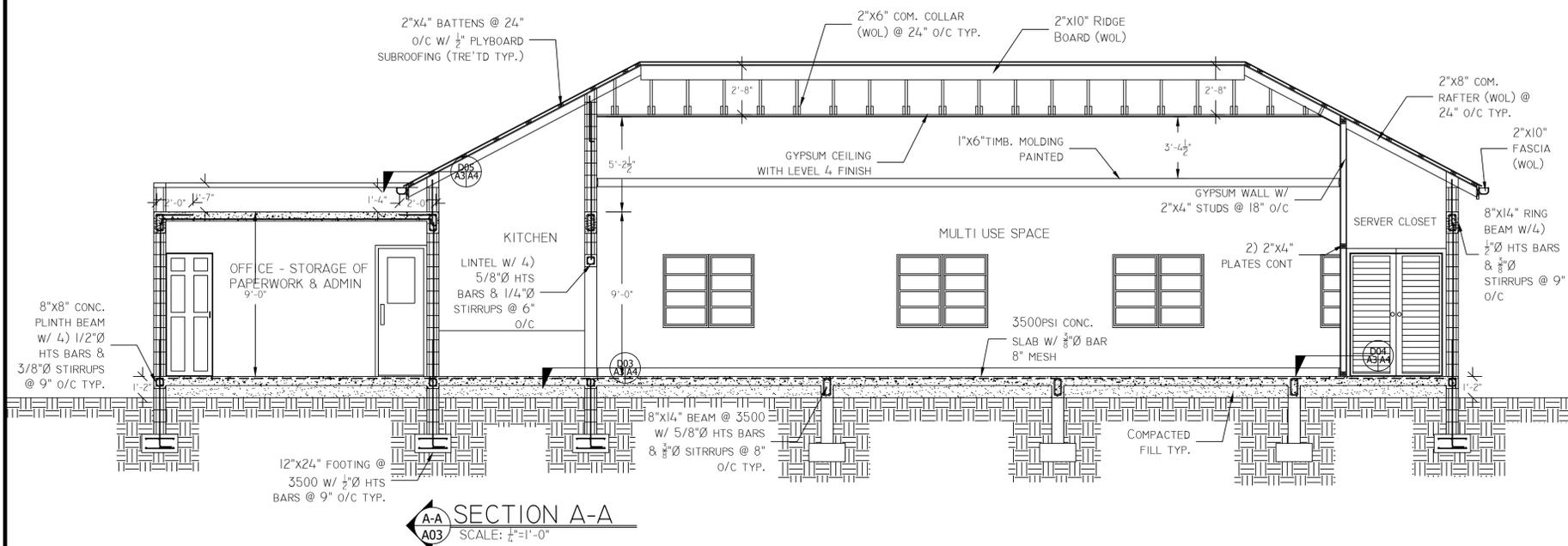
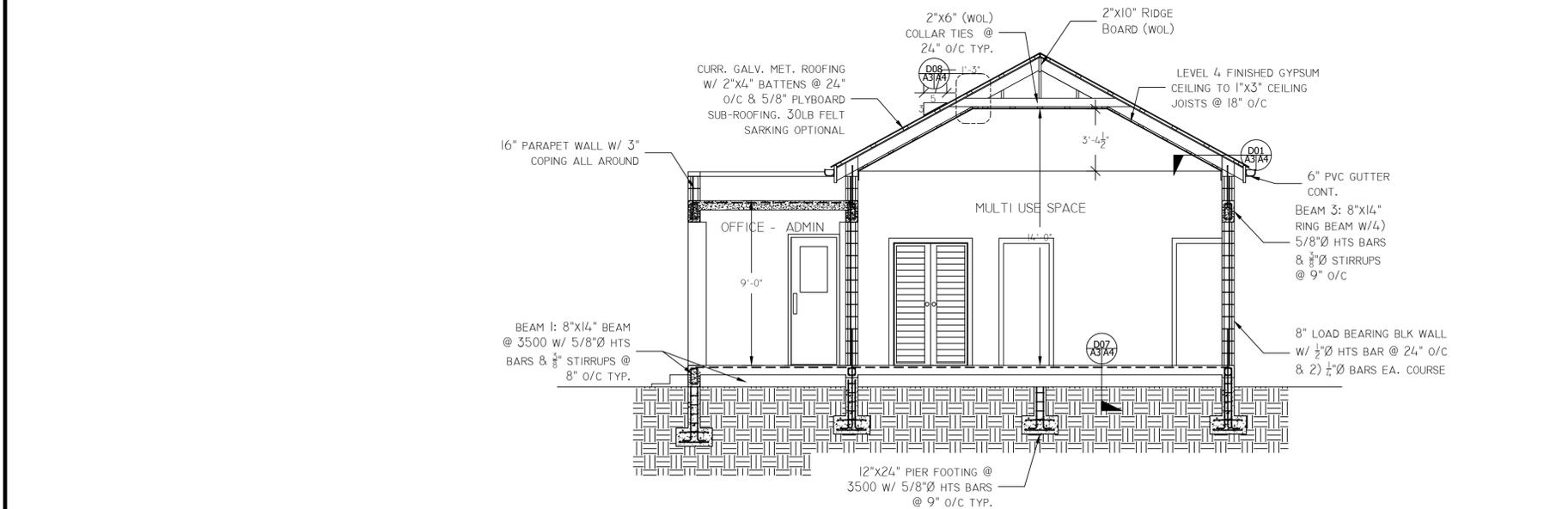
A03 - BUILDING  
SECTIONS

NOTES

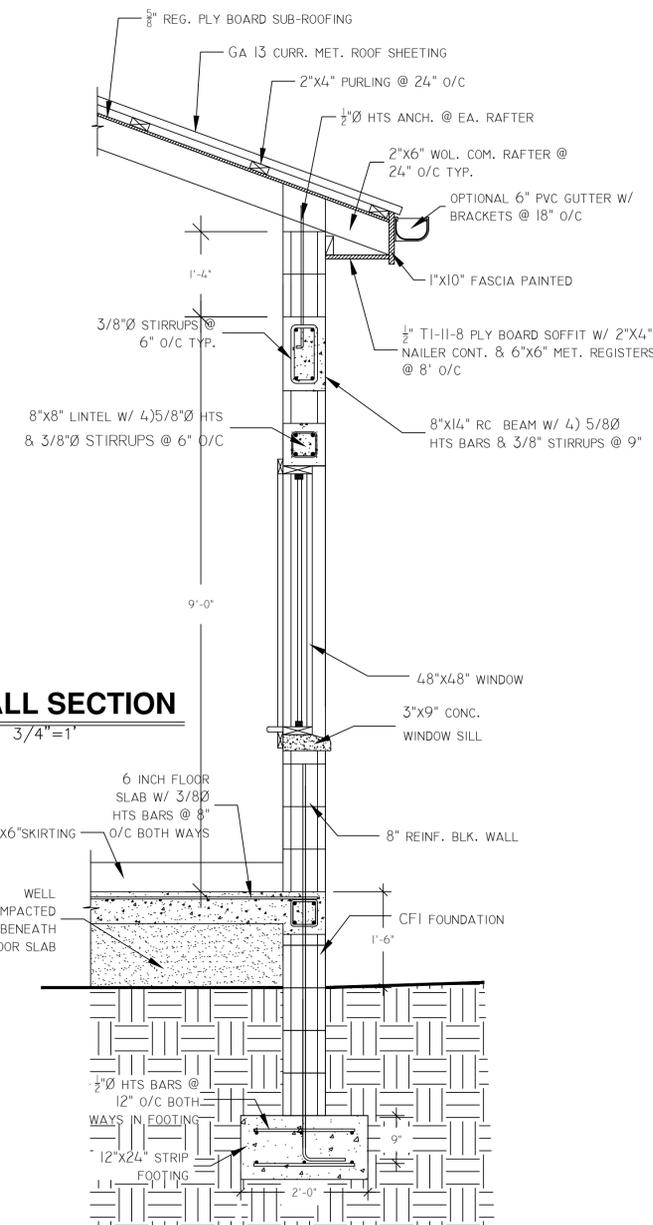
THE DEPTH OF ALL FOOTINGS TO BE FINALIZED BY THE LAND SURVEYOR IN THE FIELD:

Scale:  
1/4" = 1'-0"

Date:  
11th May/2023



**WALL SECTION**  
Scale: 3/4" = 1'



Scale:  
1/4" = 1'-0"

Date:  
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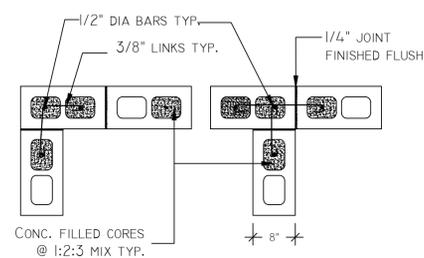
SHEET:

**A04 -**  
CONSTRUCTION  
DETAILS  
NOTES

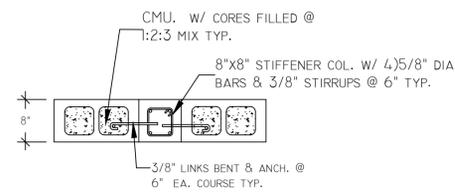
ASSEMBLY DRAWINGS ARE INTENDED AS GUIDES FOR THE BUILDING CONTRACTOR, ALL MODIFICATIONS ARE TO BE APPROVED BY THE ARCHITECT/ENGINEER

Scale:  
3/4" = 1'-0"

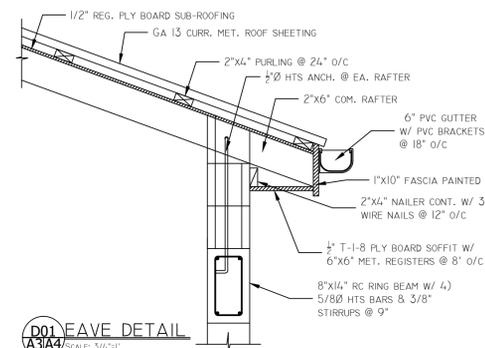
Date:  
11th May/2023



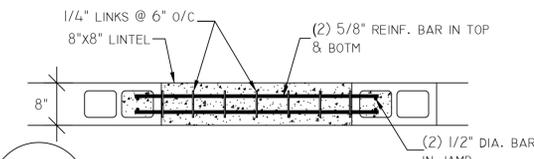
**WD-1 WALL JUNC. DET.**  
SCALE: 3/4"=1"



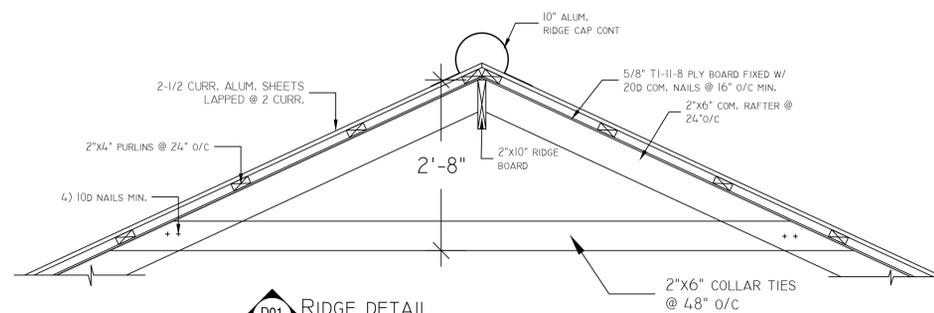
**WD-2 STIFFNER CONNec. DETAIL**  
SCALE: 3/4"=1"



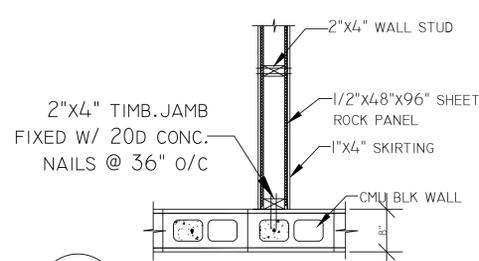
**D01 EAVE DETAIL**  
SCALE: 3/4"=1"



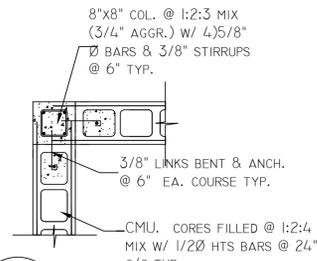
**WD-3 LINTEL DET.**  
SCALE: 3/4"=1"



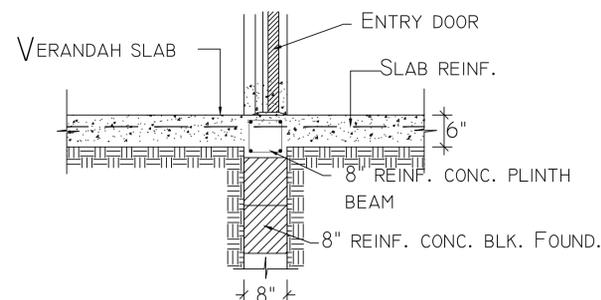
**D01 RIDGE DETAIL**  
SCALE: 3/4"=1"



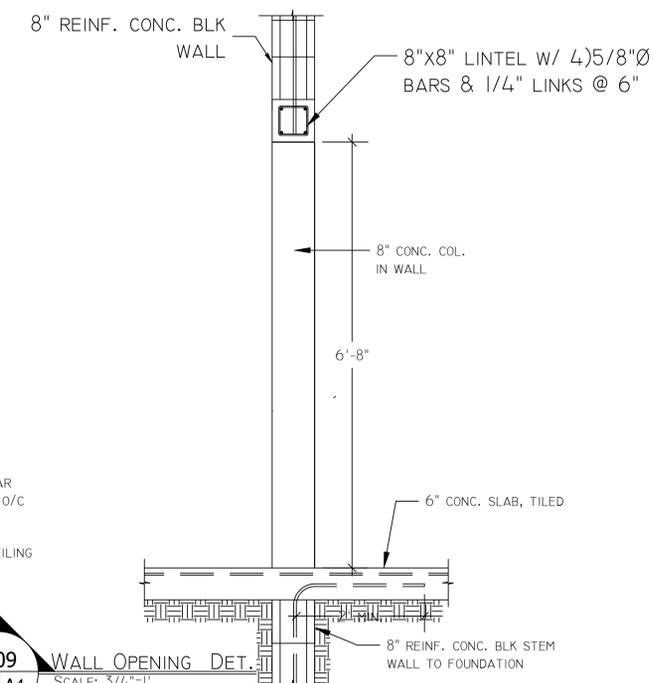
**WD-4 PARTITION JUNCTION DET.**  
SCALE: 3/4"=1"



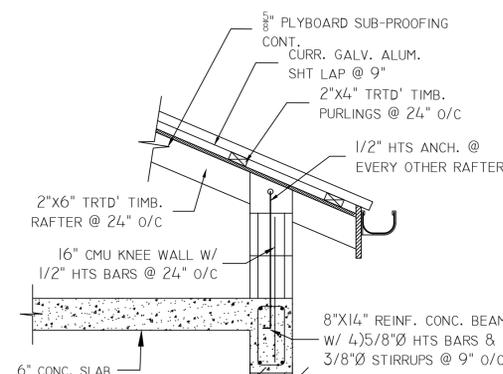
**WD-5 WALL JUNCTION DET.**  
SCALE: 3/4"=1'-0"



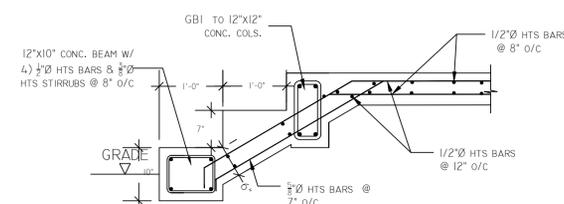
**D03 Typ. Slab-On-Grade Det.**  
SCALE: 3/4"=1"



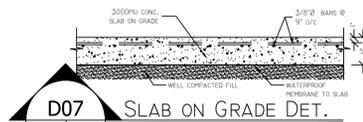
**D09 WALL OPENING DET.**  
SCALE: 3/4"=1"



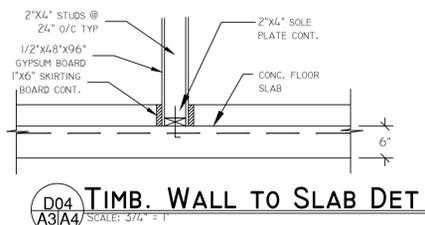
**D05 EAVE DETAIL**  
SCALE: 3/4"=1"



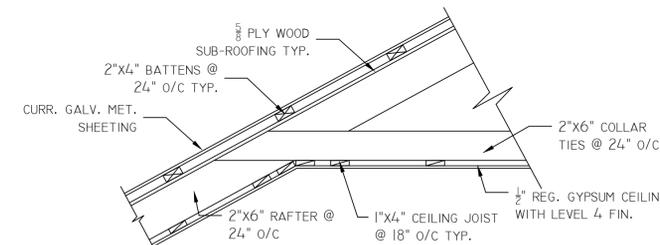
**D06 TYP. STEP SECTION**  
SCALE: 3/4"=1"



**D07 SLAB ON GRADE DET.**  
SCALE: 3/4"=1"



**D04 TIMB. WALL TO SLAB DET**  
SCALE: 3/4"=1"



**D08 TYP. CEILING DETAIL**  
SCALE: 3/4"=1"

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SHEET:  
A05 - SCHEDULES

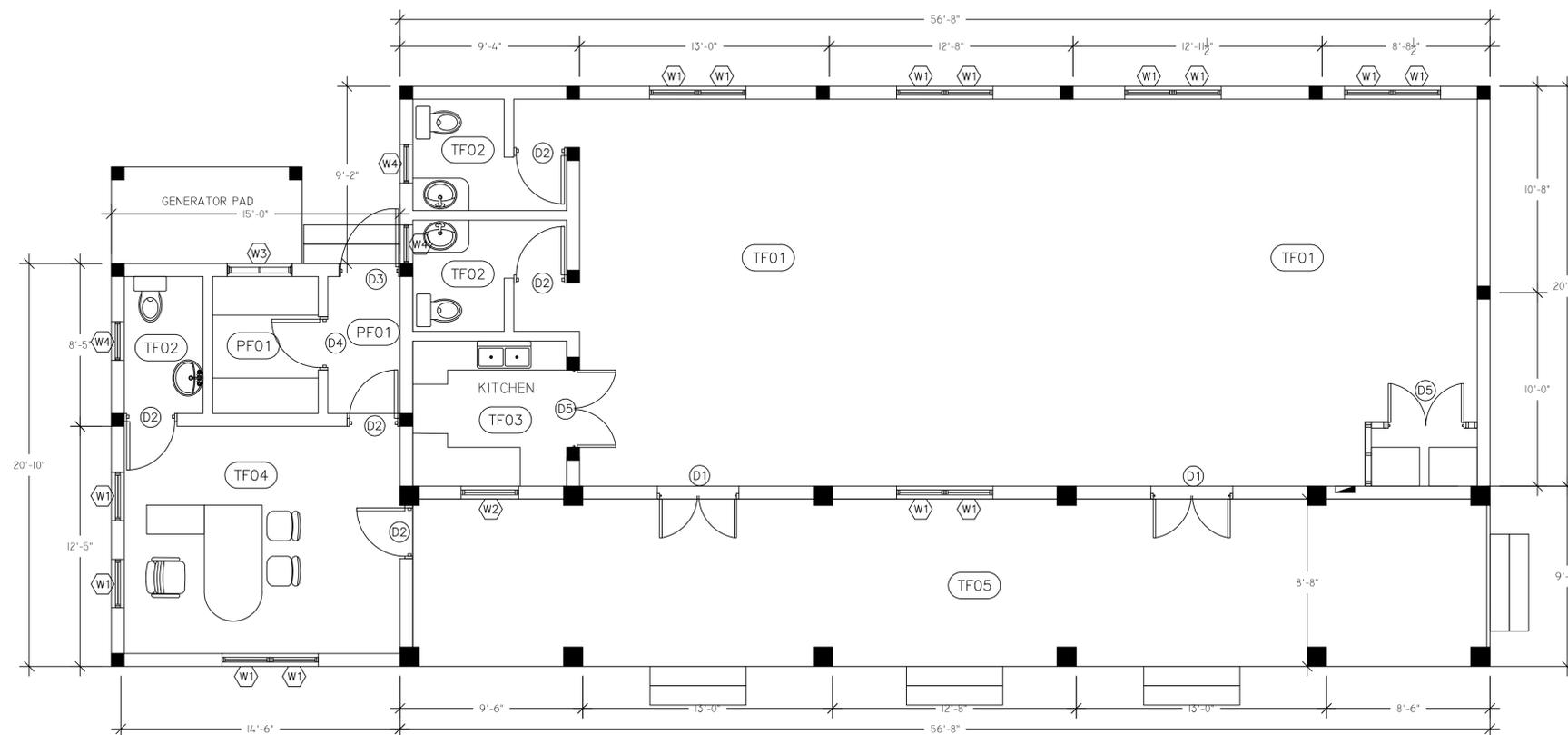
NOTES

THE ANTIGUA FORESTRY DEPARTMENT SHALL DETERMINE FINAL OPTIONS FOR DOORS AND WINDOWS ETC.

Scale:  
1/4" = 1'-0"

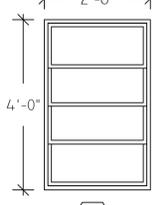
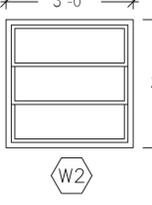
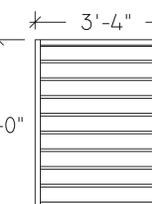
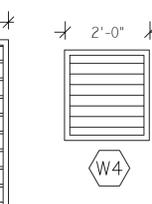
Date:  
11th May/2023

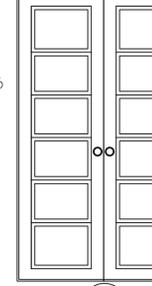
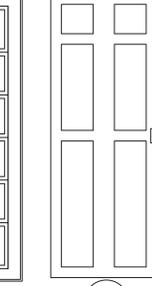
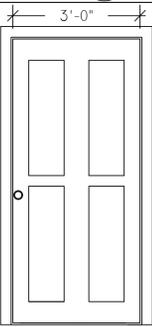
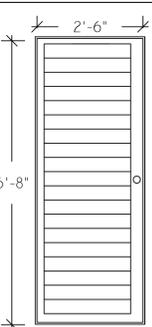
| FLOOR FINISH SCHEDULE |      |                                 |
|-----------------------|------|---------------------------------|
| ROOM                  | TAG  | DESCRIPTION                     |
| MULTI-USE SPACE       | TF01 | 24"x24" PORCELAIN TILES - PEARL |
| RESTROOMS             | TF02 | 12"x12" MOSAIC TILES - AQUA     |
| KITCHEN               | TF03 | 12"x12" CERAMIC TILES - WHITE   |
| OFFICE                | TF04 | 12"x24" CERAMIC TILES - SAND    |
| STOREROOM             | PF01 | POLYURETHANE PAINT - GRAY       |
| VERANDA               | TF05 | 16"x16" EXTERIOR CEMENT TILES   |

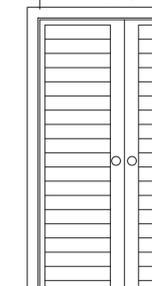


## DOOR & WINDOW SCHEDULE

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

|                |               |               |   |   |
|----------------|---------------|---------------|---|---|
| CODE NO.:      | W1            | W2            |  |  |
| STYLE:         | AWNING LOUVER | AWNING LOUVER |   |   |
| COMPOSITION:   | 8 INCH BLADES | 8 INCH BLADES |   |   |
| MATERIAL:      | GLASS, ALUM.  | GLASS, ALUM.  |   |   |
| SIZE:          | 30"W x 48"H   | 36"W x 36"H   |   |   |
| COLOR:         | WHITE         | WHITE         |   |   |
| FINISH:        | POLISHED      | POLISHED      |   |   |
| LOCKS/CLOSING: | OPERATOR      | OPERATOR      |   |   |
| QUANTITY:      | 14            | 01            |   |   |
| CODE NO.:      | W3            | W4            |  |  |
| STYLE:         | FIXED LOUVER  | MIAMI LOUVER  |   |   |
| COMPOSITION:   | 1"x3" LUMBER  | 6 INCH BLADES |   |   |
| MATERIAL:      | TIMBER        | ALUM.         |   |   |
| SIZE:          | 40"W x 48"H   | 24"W x 25.5"H |   |   |
| COLOR:         | PAINTED       | WHITE         |   |   |
| FINISH:        | N/A           | POLISHED      |   |   |
| LOCKS/CLOSING: | SCREENS       | OPERATOR      |   |   |
| HINGE:         | -             | -             |   |   |
| QUANTITY:      | 01            | 03            |   |   |

|                |                   |                        |   |   |
|----------------|-------------------|------------------------|---|---|
| CODE NO.:      | D1                | D2                     |  |  |
| STYLE:         | DOUBLE LEAF       | SINGLE LEAF            |   |   |
| COMPOSITION:   | SOLID PANEL       | SOLID COLONIAL 6 PANEL |   |   |
| MATERIAL:      | TIMBER            | TIMBER                 |   |   |
| SIZE:          | 48" W x 80" H     | 30" W x 80" H          |   |   |
| COLOR:         | WHITE             | WHITE                  |   |   |
| FINISH:        | PAINTED           | PAINTED                |   |   |
| LOCKS/CLOSING: | DEADBOLT COMB.    | DEADBOLT COMB          |   |   |
| HINGE:         | 4" BRASS          | 4" BRASS               |   |   |
| QUANTITY:      | 02                | 05                     |   |   |
| CODE NO.:      | D3                | D4                     |  |  |
| STYLE:         | SINGLE LEAF       | SINGLE LEAF            |   |   |
| COMPOSITION:   | 4 PANEL           | JALOUSIE               |   |   |
| MATERIAL:      | ALUM.             | TIMBER                 |   |   |
| SIZE:          | 36" W x 80" H     | 30" W x 80" H          |   |   |
| COLOR:         | WHITE             | TBD                    |   |   |
| FINISH:        | FACTORY INSTALLED | PAINTED                |   |   |
| LOCKS/CLOSING: | DEAD BOLT COMB.   | ENTRY LOCK             |   |   |
| HINGE:         | 4" BRASS          | 4" BRASS               |   |   |
| QUANTITY:      | 01                | 01                     |   |   |

|                |               |   |
|----------------|---------------|---|
| CODE NO.:      | D5            |  |
| STYLE:         | DOUBLE LEAF   |   |
| COMPOSITION:   | JALOUSIE      |   |
| MATERIAL:      | SOLID TIMBER  |   |
| SIZE:          | 48" W x 80" H |   |
| COLOR:         | TBD           |   |
| FINISH:        | PAINTED       |   |
| LOCKS/CLOSING: | CLOSER        |   |
| HINGE:         | 4" BRASS      |   |
| QUANTITY:      | 02            |   |

## DOOR & WINDOW SCHEDULE

SCALE: 1/2"=1'-0"

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NURSERY - VISITORS  
CENTER

LOCATION:

BENDALS, ANTIGUA

SHEET:

P01 - PLUMBING PLAN  
& DETAILS

NOTES

UNLESS OTHERWISE STATED ALL DIMENSIONS ARE TO BE TAKEN AS REPRESENTED ON DRAWINGS

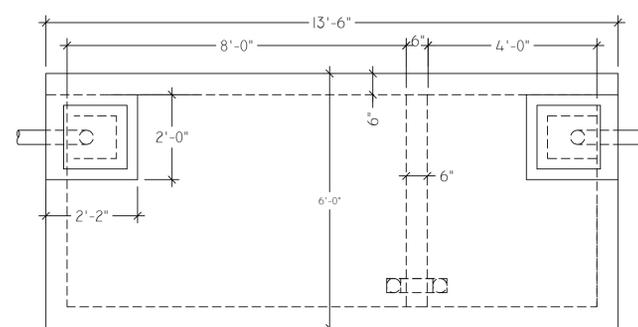
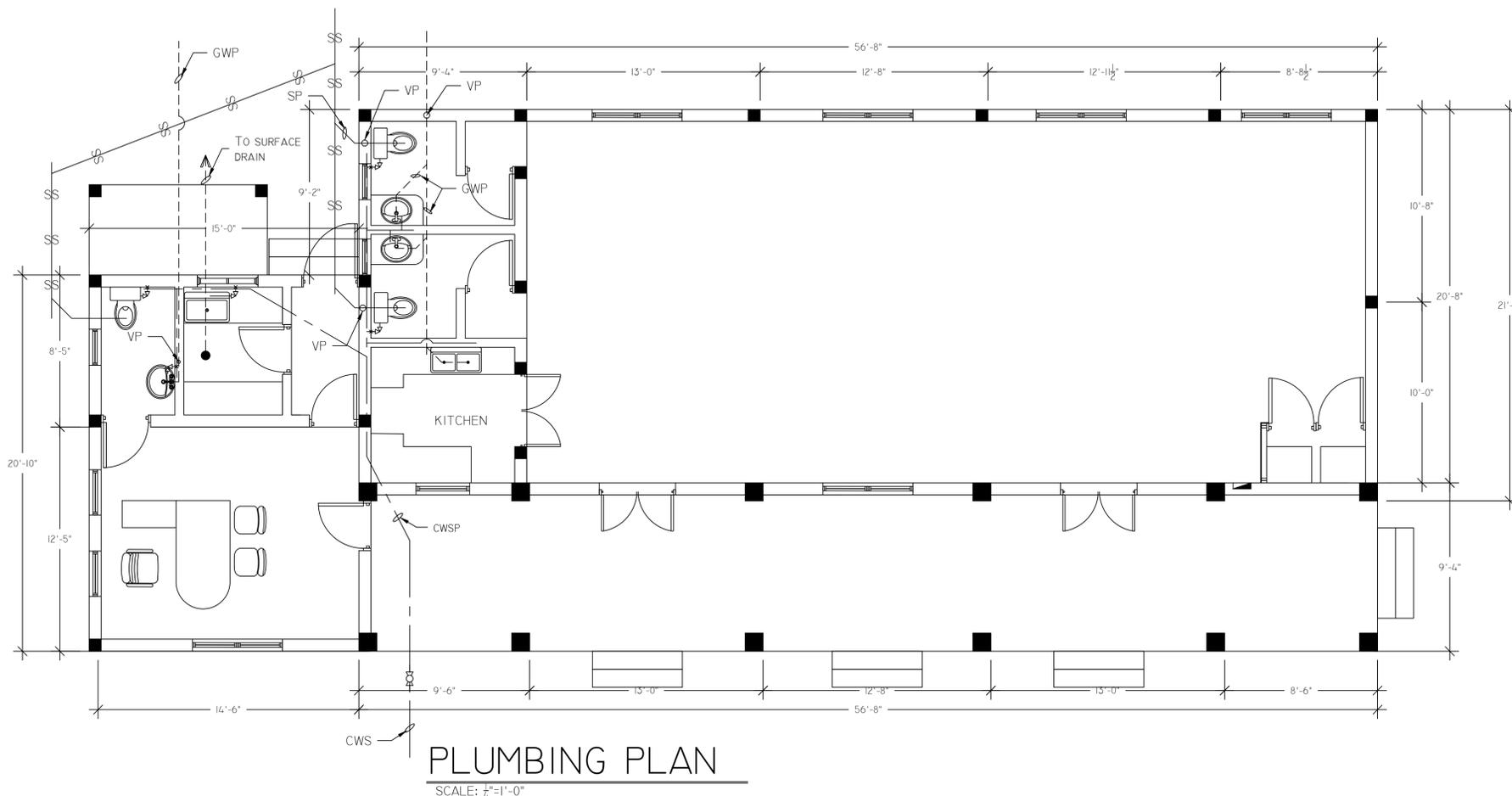
**PIPE WORK**  
ALL CHANGES IN DIRECTION IN THE HORIZONTAL PLANE FOR SANITARY AND WASTE PIPES SHALL BE FITTED WITH A CLEAN OUT. ALL PIPES SHALL BE FIXED AT 10FT INTERVALS TO A MIN. DEPTH OF 18" FOR PIPES 2" OR LARGER AND 12" FOR SMALLER PIPES.

Scale:  
1/4" = 1'-0"

Date:  
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| PLUMBING SCHEDULE |                               |                        |           |
|-------------------|-------------------------------|------------------------|-----------|
| SYM               | DESCRIPTION                   | TYPE                   | LOC       |
| - - - - -         | DOMESTIC WASTE WATER PIPE     | 1 1/2" PVC SCH 40      | STOREROOM |
| - - - - -         | WATER SUPPLY LINE             | 1/2" & 3/4" PVC SCH 40 | STOREROOM |
| x-∇               | ANGLE VALVE TO EACH FIXTURE   | PLASTIC                | STOREROOM |
| - O -             | PVC BALL VALVE @ SUPPLY LINE  | PVC BALL VALVE         | YARD      |
| - - - - -         | 3"Ø CLEAN OUT @ 14' 0"/C      | PVC SCH 40             | STOREROOM |
| ●                 | 3" FLOOR DRAIN W/ METAL COVER | STAINLESS STEEL        | STOREROOM |
| ○                 | 2" VENT CPVC PIPE             | CPVC SCH 40            | STOREROOM |

| PLUMBING SPECIFICATIONS |  |  |              |
|-------------------------|--|--|--------------|
| SYM                     | DESCRIPTION                                | SPECIFICATION  | END          |
| WS                      | WATER SERVICE                              | 1/2" PVC SCH 40 PIPE TO TRANSMIT WATER TO ALL PLUMBING FIXTURES  | YARD SUPPLY  |
| CWSP                    | COLD WATER SUPPLY PIPE                     | 1/2" PVC SCH 40 PIPE TO TRANSMIT WATER TO ALL PLUMBING FIXTURES  | YARD SERVICE |
| GWP                     | 2" PVC GRAY WATER PIPE GRADIENT 1:30 (MIN) | TRAPS SHALL BE SUPPLIED WITH THE FITTING TO WHICH THEY WILL BE ATTACHED. ALL TRAPS SHALL HAVE MINIMUM WATER SEAL OF 2".  | YARD TRENCH  |
| SP                      | 4" PVC SOIL PIPE GRADIENT 1:40 (MIN)       | 4" PVC SCH 40 PIPE TO TRANSMIT SOIL WATER TO THE SEWER. ALL WATER CLOSETS SHALL BE TRAPPED AS CLOSELY AS POSSIBLE TO THE FIXTURE OUTLET, TRAPS SHALL HAVE MINIMUM WATER SEAL OF 3"   | SOIL SEWER   |
| SS                      | 6" PVC SOIL SEWER GRADIENT 1:60 (MIN)      | 6" PVC SCH 40 PIPE TO TRANSMIT SOIL WATER TO THE SEWER.  | SEPTIC TANK  |
| VP                      | 2" PVC VENT PIPE                           | 2" PVC SCH 40 PIPE VENTING ALL TRAP TO A HEIGHT OF NOT LESS THAN 24" ABOVE THE ROOF VENTS SHALL EXTEND NOT LESS THAN 1'-0" ABOVE THE EAVE AND NOT LESS THAN 3'-0" ABOVE THE HEAD OF ANY WINDOW THAT IS 10'-0" OR LESS AWAY | OPEN         |



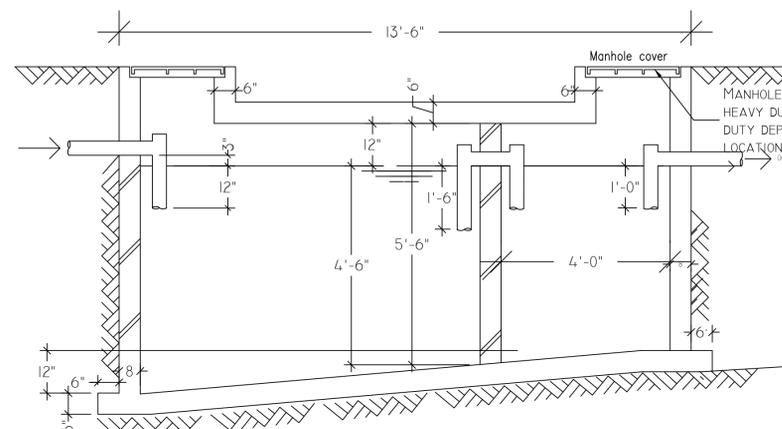
**SEPTIC TANK SIZE**

- 8 EMPLOYEES
- OTHER USERS 8 PERSONS
- TOTAL PERSONS = 16

**CONSUMPTION**  
150GAL/DAY/PERSON ==> 2400GPD

**WASTE PRODUCTION**  
80%(CONSUMPTION) ==> 1920GPD

**SIZE OF SEPTIC TANK**  
13.5' x 5'



**Walls:**

- 6" reinforced concrete with 1/2" dia. bars at 8" vertically and 1/2" dia. bars at 16" horizontally, or:
- 6" concrete blocks filled with 1:3:6 concrete and with reinforcement every other course. The inside face to be plastered with two courses of 3/8" thick cement mortar.

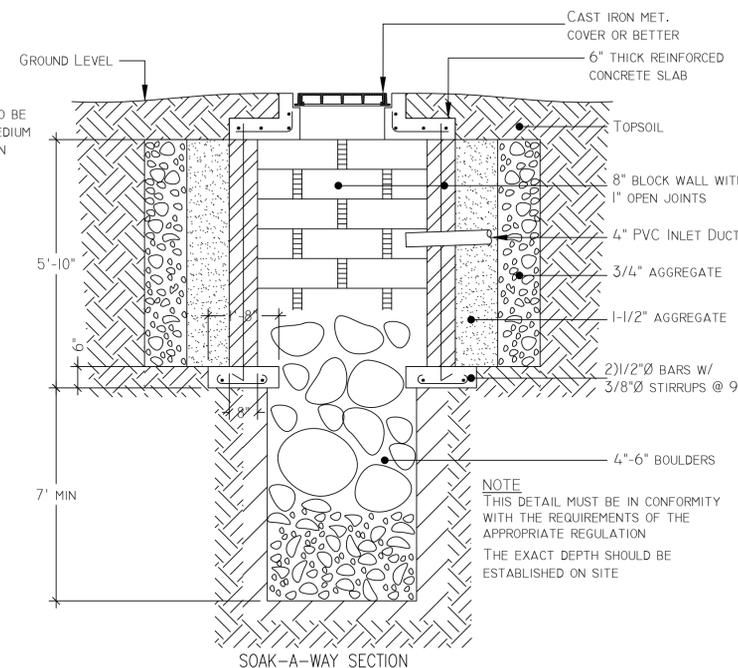
**Note:**

Septic tanks are to be constructed in accordance with the designs which have been approved by the Ministry of Health. The drawing here provided is for a typical single family dwelling and may not be the same as that provided by the Ministry.

**Top and Bottom Slabs:**

6" reinforced concrete with 1/2" dia. bars at 9" centres transversely and 3/8" dia. bars at 12" centres longitudinally.

Slope of bottom slab to be 1/4" to 1'-0".  
Access hatches to be patented cast iron or steel covers 18" square, or of 4" thick concrete with 4" mesh reinforcement.



# GENERAL STRUCTURAL NOTES

## 1.0 BASIS FOR DESIGN

### 1.1 RELEVANT BUILDING CODES USED IN DESIGN:

1.1.1 AMERICAN CONCRETE INSTITUTE BUILDING CODE REQUIREMENTS FOR STRUCTURAL CONCRETE (ACI 318-05)

1.1.2 AMERICAN CONCRETE INSTITUTE BUILDING CODE REQUIREMENTS FOR MASONRY STRUCTURES (ACI 530.1-05)

1.1.3 SPECIFICATIONS FOR STRUCTURAL CONCRETE FOR BUILDINGS (ACI 301-99)

1.1.4 MINIMUM DESIGN LOADS FOR BUILDING AND OTHER STRUCTURES (ASCE 7-02)

1.1.5 CARIBBEAN UNIFIED BUILDING CODE (CUBIC)

## 1.2 DESIGN LOADS

1.2.1 LIVE LOADS CONFORMING TO ACI 318-05/LATEST & ASCE 7-02/LATEST

1.2.2 BASIC WIND SPEED: 145 MPH; 3s GUST (ASCE 7-02)

1.2.3 EARTHQUAKE: ZONE 2a (CUBIC)

## 2.0 FOUNDATION

2.1 FOUNDATIONS ARE DESIGNED FOR AN ALLOWABLE SOIL BEARING PRESSURE OF 8,000 PSF (383 kPa)

2.2 ALL FOOTINGS SHALL BEAR ON FIRM, UNDISTURBED NATURAL SOIL OR CONTROLLED COMPACTED FILL, APPROVED BY THE ENGINEER. THE MATERIAL AT FOOTING GRADE SHALL BE INSPECTED BY AN ENGINEER PRIOR TO CONSTRUCTION. IF UNSUITABLE MATERIAL IS ENCOUNTERED, THE FOOTINGS/FOUNDATION SHALL BE LOWERED OR FOUNDED ON COMPACTED FILL OR AS OTHERWISE DIRECTED BY THE ENGINEER.

2.3 THE FOOTING ELEVATIONS IF SHOWN ON THE DRAWINGS ARE FOR ESTIMATION PURPOSES ONLY AND DESIGNATE A MINIMUM DEPTH OF FOOTING WHERE A SAFE SOIL BEARING PRESSURE IS EXPECTED. THE UNDERSIDE OF THE FOOTING/BASE SHALL BE LOWERED OR EXTENDED AS REQUIRED TO ACHIEVE THE REQUIRED DESIGN BEARING CAPACITY.

2.4 ANY REQUIRED FILL SHALL BE APPROVED GRANULAR MATERIAL AND SHALL BE PLACED IN LAYERS COMPACTED TO AT LEAST 95% OF MAXIMUM DRY DENSITY AS DEFINED BY ASTM D1557 MODIFIED PROCTOR TEST. SHOULD GROUND WATER BE ENCOUNTERED ABOVE THE PROPOSED UNDERSIDE OF FOUNDATIONS, THE NATURAL SOIL SHOULD BE BLINDED WITH CONCRETE TO PREVENT SOFTENING. THE CONTRACTOR IS RESPONSIBLE FOR DISPOSAL OF ALL ACCUMULATED WATER FROM EXCAVATIONS AND DE-WATERING OPERATIONS IN SUCH A MANNER AS NOT TO CAUSE DAMAGE TO THE WORKS OF THE ADJACENT PROPERTIES.

2.5 ALL ORGANIC OR OTHER UNSUITABLE MATERIALS SHALL BE REMOVED FROM SUBGRADE AND BACKFILL AREAS & REPLACED WITH AN APPROVED CLEAN FILL MATERIAL COMPACTED TO AT LEAST 95% OF MAXIMUM DRY DENSITY AS DEFINED BY ASTM D1557. BACKFILL MATERIAL SHOULD BE PLACED IN LAYERS, WHICH, BEFORE COMPACTION, SHALL NOT EXCEED 8" THICK. EACH LAYER SHALL BE SPREAD UNIFORMLY AND EVENLY AND SHALL BE THOROUGHLY MIXED DURING THE SPREAD TO ENSURE UNIFORMITY OF MATERIAL IN EACH LAYER.

## 3.0 CONCRETE

3.1 ALL REINFORCED CONCRETE SHALL BE FURNISHED AND INSTALLED IN ACCORDANCE WITH THE "BUILDING CODE REQUIREMENTS FOR REINFORCED CONCRETE" (ACI 318, LATEST & ACI 301-99).

3.2 CONCRETE MIXING, PLACEMENT, CURING AND QUALITY SHALL CONFORM TO THE RECOMMENDATIONS IN ACI 305 R-02, HOT WEATHER CONCRETING.

3.3 TIME BETWEEN CONCRETE BATCHING AND PLACEMENT SHALL BE IN ACCORDANCE TO ASTM C34 AND SHALL BE PLACED WITHIN 1.5 HRS OF BATCHING.

3.4 ALL CONCRETE SHALL BE CONSOLIDATED IN PLACE BY THE USE OF INTERNAL VIBRATORS. REMOVE ALL DEBRIS FROM FORMS BEFORE PLACING CONCRETE. CONCRETE SHALL NOT BE DROPPED THROUGH REINFORCING STEEL SO AS TO CAUSE SEGREGATION OF AGGREGATES. UNCONFINED FALL OF CONCRETE SHALL NOT EXCEED 5 FEET.

3.5 ANY ADMIXTURE TO BE USED IN CONCRETE SHALL BE APPROVED BY THE ENGINEER PRIOR TO USAGE.

3.6 ALL ITEMS TO BE CAST IN CONCRETE SUCH AS REINFORCEMENT DOWELS, BOLTS, ANCHORS, SLEEVES, ETC. SHALL BE SECURELY POSITIONED IN FORMS.

## 4.0 REINFORCEMENT

4.1 ALL REINFORCING STEEL BARS SHALL BE DETAILED AND PLACED IN ACCORDANCE WITH ACI, LATEST & CRSI'S MANUAL OF STANDARD PRACTICE.

4.2 ALL REINFORCEMENT SHALL BE HIGH STRENGTH DEFORMED BARS CONFORMING TO ASTM A615, LATEST. ALL BARS SHALL BE GRADE 60, EXCEPT FOR VERTICAL REINFORCEMENT IN BLOCK WALLS & STIRRUPS OR TIES MAY BE GRADE 40.

4.3 WELDED WIRE FABRIC SHALL CONFIRM TO THE REQUIREMENTS OF ASTM A185-02 AND SHALL BE LAPPED ONE FULL MESH PLUS 2" MINIMUM AT SIDES AND END SPLICES AND WIRED TOGETHER.

4.4 REINFORCEMENT PROTECTION (CONCRETE COVER)

MINIMUM CONCRETE COVER TO ALL STEEL SHALL BE AS FOLLOWS, UNLESS OTHERWISE NOTED:

4.4.1 CONCRETE CAST AGAINST AND PERMANENT EXPOSED TO EARTH: 3"  
4.4.2 CONCRETE POURED AGAINST FORMS; EXPOSED TO EARTH OR WEATHER (INCLUDES SLABS ON GRADES): 2"

4.3 CONCRETE NOT EXPOSED TO EARTH OR WEATHER:  
A) STRUCTURAL SLABS, WALLS: 3/4"  
B) BEAMS, COLUMNS (PRIMARY REINFORCEMENT, TIES, STIRRUPS, SPIRALS): 1-1/2"

4.5 NO SPLICES OF REINFORCEMENT SHALL BE MADE EXCEPT AS DETAILED OR AUTHORIZED BY THE ENGINEER. NO TACK WELDING OF REINFORCING BARS IS ALLOWED.

LAP SPLICES WHERE PERMITTED SHALL BE AS FOLLOWS:

|                                |       |
|--------------------------------|-------|
| Minimum lap for 3/8" Dia. bars | 1'-6" |
| Minimum lap for 1/2" Dia. bars | 2'-0" |
| Minimum lap for 5/8" Dia. bars | 2'-6" |

4.6 CONTINUOUS TOP AND BOTTOM BARS IN BEAMS SHALL BE SPLICED AS FOLLOWS:  
4.6.1 TOP BARS NEAR/AT MID-SPAN (MIDDLE THIRD) AND HOOKED AT NON-CONTINUOUS EDGE.  
4.6.2 BOTTOM BARS SPLICED NEAR/OVER SUPPORTS.  
4.6.3 TOP BARS CENTERED OVER SUPPORTS UNLESS OTHERWISE NOTED.

4.7 CONTRACTOR TO PROVIDE ALL ACCESSORIES NECESSARY TO SUPPORT REINFORCEMENT AT POSITIONS SHOWN IN THE DRAWINGS. ALL REINFORCEMENT TO BE HELD SECURELY IN PROPER POSITION IN ACCORDANCE WITH ACI 318-05. ALL ACCESSORIES TO BE GALVANIZED.

4.8 ALL TIES AND STIRRUPS SHALL BE 135deg. SEISMIC HOOKS IN ACCORDANCE WITH ACI 318-05.

## 5.0 MASONRY AND PARTITIONS

5.1 ALL MASONRY CONSTRUCTION AND DETAILS SHALL CONFORM TO THE CURRENT PROVISIONS OF THE BUILDING CODE REGULATIONS FOR MASONRY STRUCTURES -ACI 530 (ASCE 5), AND SPECIFICATIONS FOR MASONRY STRUCTURES - ACI 530.1 (ASCE 6).

5.2 ALL REINFORCED CONCRETE BLOCKWORK SHALL BE CONSTRUCTED USING TWO AND THREE CELL MASONRY UNITS ONLY, UNLESS OTHERWISE DETAILED.

5.3 WALLS SHALL BE REINFORCED HORIZONTALLY AT 2' O.C. THE WIRE SHALL CONFORM TO ASTM A82 -01, STANDARD GAGE, GALVANIZED UNLESS SHOWN OTHERWISE.

5.4 FILL ALL FOUNDATION BLOCK CELLS WITH CONCRETE OF 3,000 PSI 28 DAY STRENGTH.

## 6.0 GENERAL

6.1 CONTRACTOR SHALL BE RESPONSIBLE FOR VERIFYING ALL DIMENSIONS WITH ARCHITECTURAL DRAWINGS, ELEVATIONS AND SITE CONDITIONS PRIOR TO START OF CONSTRUCTION. THE CONSULTANT/ARCHITECT SHALL BE NOTIFIED, IN WRITING, IMMEDIATELY OF ANY DISCREPANCIES OR INCONSISTENCIES. IN NO CASE SHALL DIMENSIONS BE SCALED FROM PLANS, SECTIONS, OR DETAILS ON THESE DRAWINGS. FIGURED DIMENSIONS ARE TO BE USED ONLY.

6.2 ALL OMISSIONS AND CONFLICTS BETWEEN THE VARIOUS ELEMENTS OF THE WORKING DRAWINGS AND/OR SPECIFICATIONS SHALL BE BROUGHT TO THE ATTENTION OF THE CONSULTANT/ARCHITECT AND RESOLVED BEFORE PROCEEDING WITH ANY WORK SO INVOLVED.

6.3 STRUCTURAL DRAWINGS SHALL BE COORDINATED AND READ WITH ALL RELEVANT ARCHITECTURAL AND CIVIL DRAWINGS.

6.4 WHERE A CONSTRUCTION DETAIL IS NOT SHOWN OR NOTED, THE DETAIL SHALL BE THE SAME AS FOR OTHER SIMILAR WORK OR OTHERWISE SPECIFIED BY THE ENGINEER.

6.5 NOTES AND DETAILS ON DRAWINGS SHALL TAKE PRECEDENCE OVER "GENERAL NOTES" AND TYPICAL DETAILS.

6.6 ENGINEER'S APPROVAL MUST BE SECURED FOR ALL STRUCTURAL SUBSTITUTIONS. ONCE APPROVED, CONTRACTOR SHALL BE RESPONSIBLE FOR ALL NECESSARY CHANGES AND SHALL COORDINATE ALL DETAILS OF SAID SUBSTITUTION.



TECHNICAL ASSISTANCE FOR THE DESIGN AND SUPERVISION OF SLM-BASED ECOSYSTEM AND BIODIVERSITY RESTORATION INITIATIVES, IN ST. KITTS AND NEVIS, AND ANTIGUA AND BARBUDA

CLIENT:

**O ECS COMMISSION  
MORNE FORTUNE,  
CASTRIES ST. LUCIA**

PROJECT:

**DEPT OF FORESTRY  
NURSERY - VISITORS  
CENTER**

LOCATION:

**BENDALS, ANTIGUA**

SHEET:

**S01 .1  
SPECIFICATIONS**

NOTES

Scale:

1/4" = 1'-0"

Date:

11th May/2023

The Consortium of Caribbean Architects and Planners  
Ltd, CS Consulting Engineers Ltd,  
Kelvin Swanston's Company.



TECHNICAL ASSISTANCE FOR THE DESIGN AND SUPERVISION OF SLM-BASED ECOSYSTEM AND BIODIVERSITY RESTORATION INITIATIVES, IN ST. KITTS AND NEVIS, AND ANTIGUA AND BARBUDA

CLIENT:

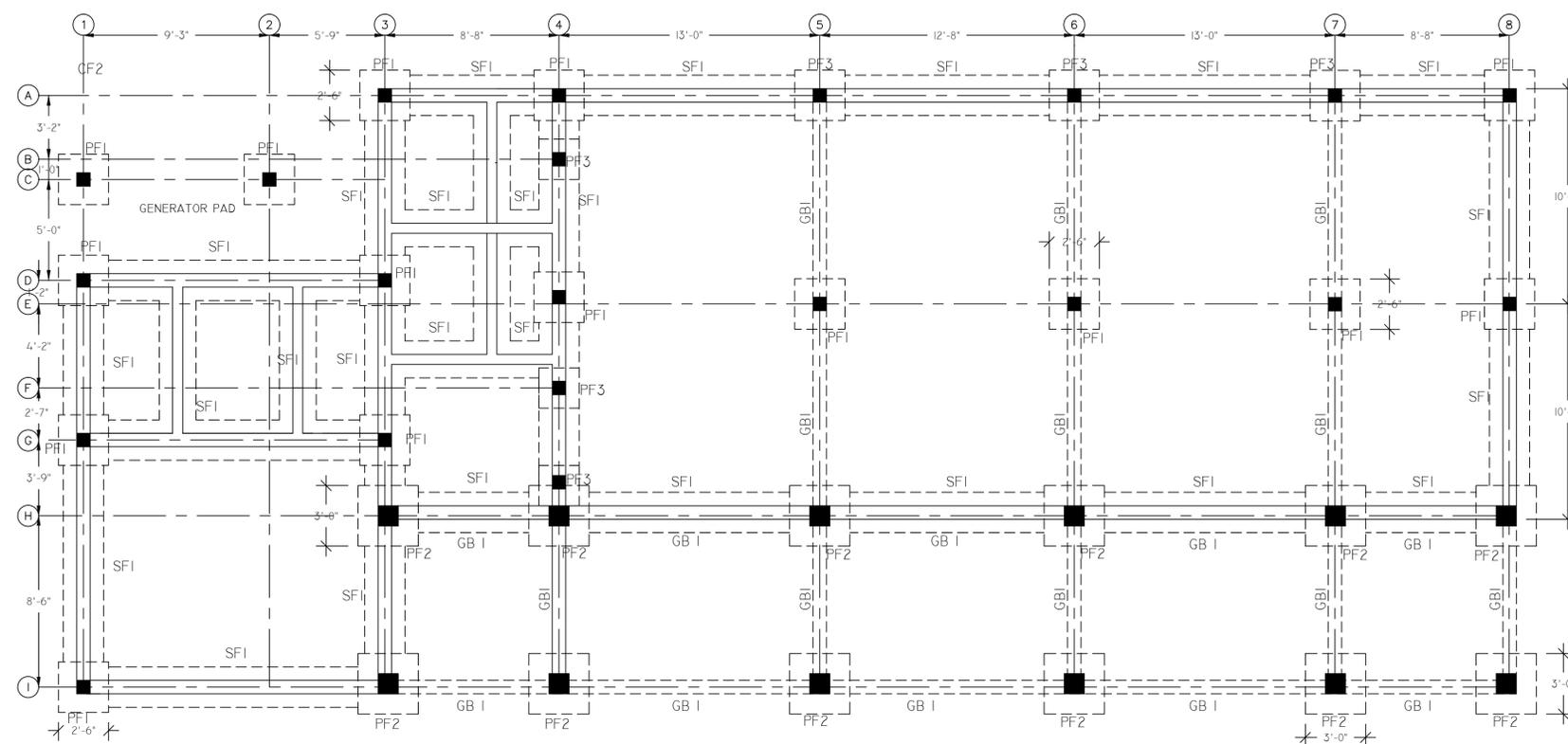
O ECS COMMISSION  
MORNE FORTUNE,  
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LOCATION:  
BENDALS, ANTIGUA

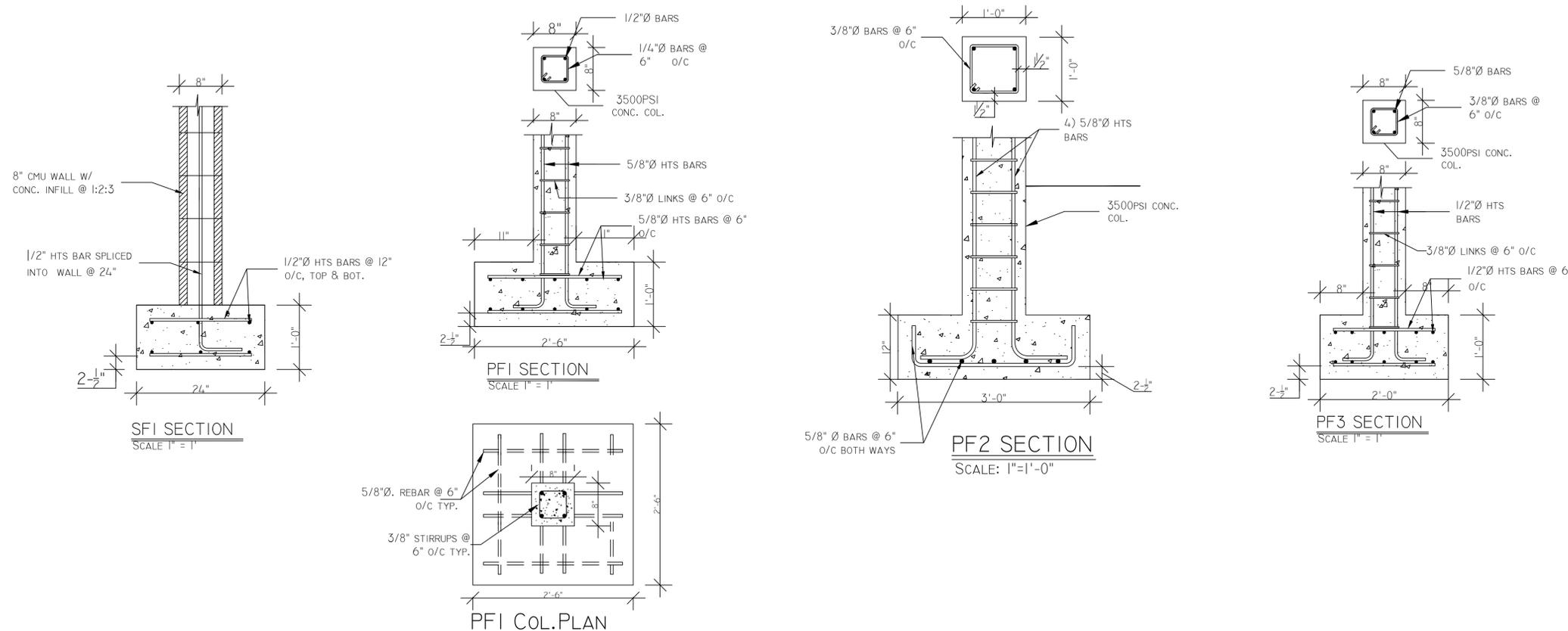
SHEET:  
S01 - FOUNDATIONS

NOTES



### FOUNDATION PLAN

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



Scale:  
1/4" = 1'-0"

Date:  
11th May/2023



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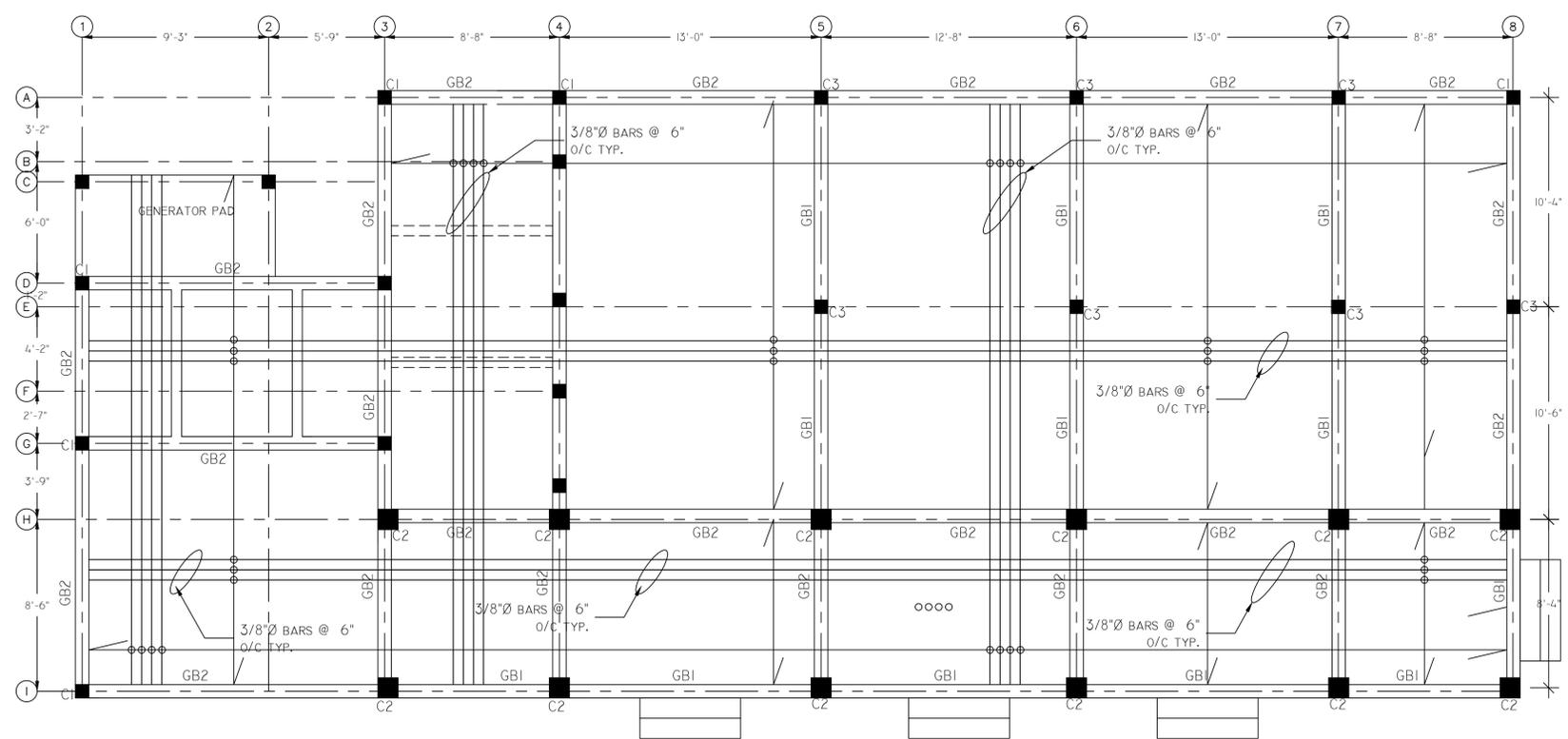
SHEET:

**S03 - STRUCTURE  
LAYOUT**

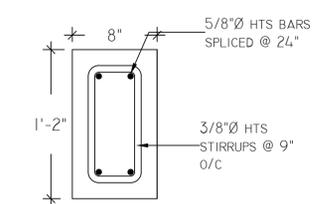
NOTES

Scale:  
1/4" = 1'-0"

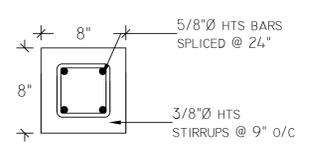
Date:  
11th May/2023



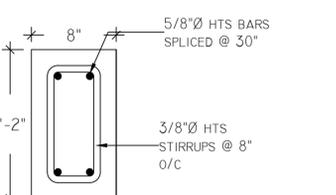
**SLAB ON GRADE LAYOUT**  
SCALE: 1/4"=1'-0"



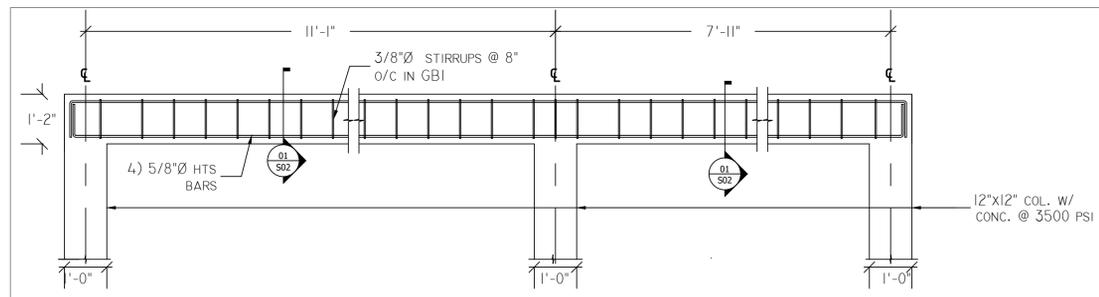
**BEAM I: RINGBEAM**  
SCALE: 1-1/2"=1'-0"



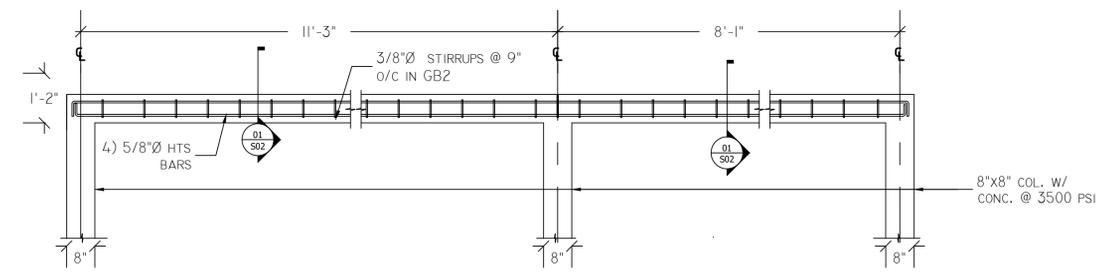
**GB2: PLINTH BEAM**  
SCALE: 1-1/2"=1'-0"



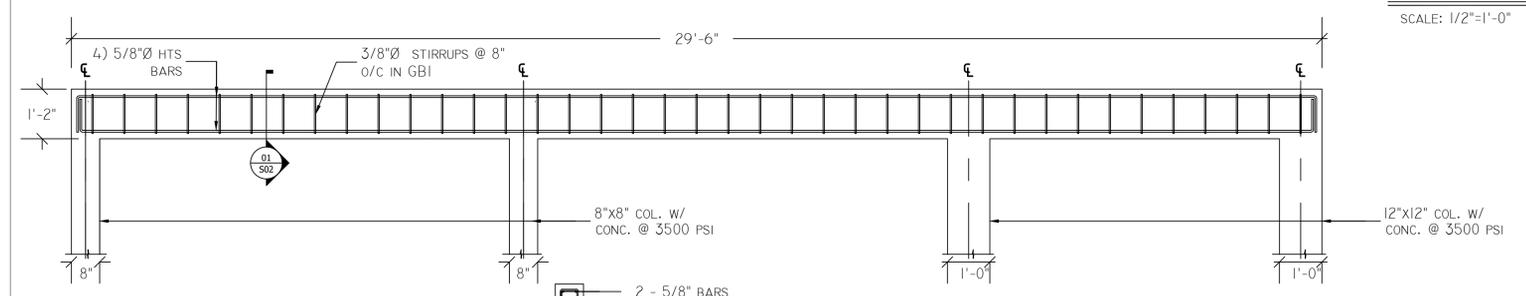
**GBI: GROUND. BEAM**  
SCALE: 1-1/2"=1'-0"



**SECTION 01**  
FLOOR BEAM ON GRIDLINES H & I  
SCALE: 1/2"=1'-0"



**SECTION 01**  
FLOOR BEAM ON GRID LINES A, D, G, H, I & 1, 3, 4  
SCALE: 1/2"=1'-0"



**SECTION 01**  
FLOOR BEAM ON GRIDLINES 4, 5, 6 & 7  
SCALE: 1/2"=1'-0"

TECHNICAL ASSISTANCE FOR THE DESIGN AND SUPERVISION OF SLM-BASED ECOSYSTEM AND BIODIVERSITY RESTORATION INITIATIVES, IN ST. KITTS AND NEVIS, AND ANTIGUA AND BARBUDA

CLIENT:

**O ECS COMMISSION**  
MORNE FORTUNE,  
CASTRIES ST. LUCIA

PROJECT:

DEPT OF FORESTRY  
NURSERY - VISITORS  
CENTER

LOCATION:

BENDALS, ANTIGUA

SHEET:

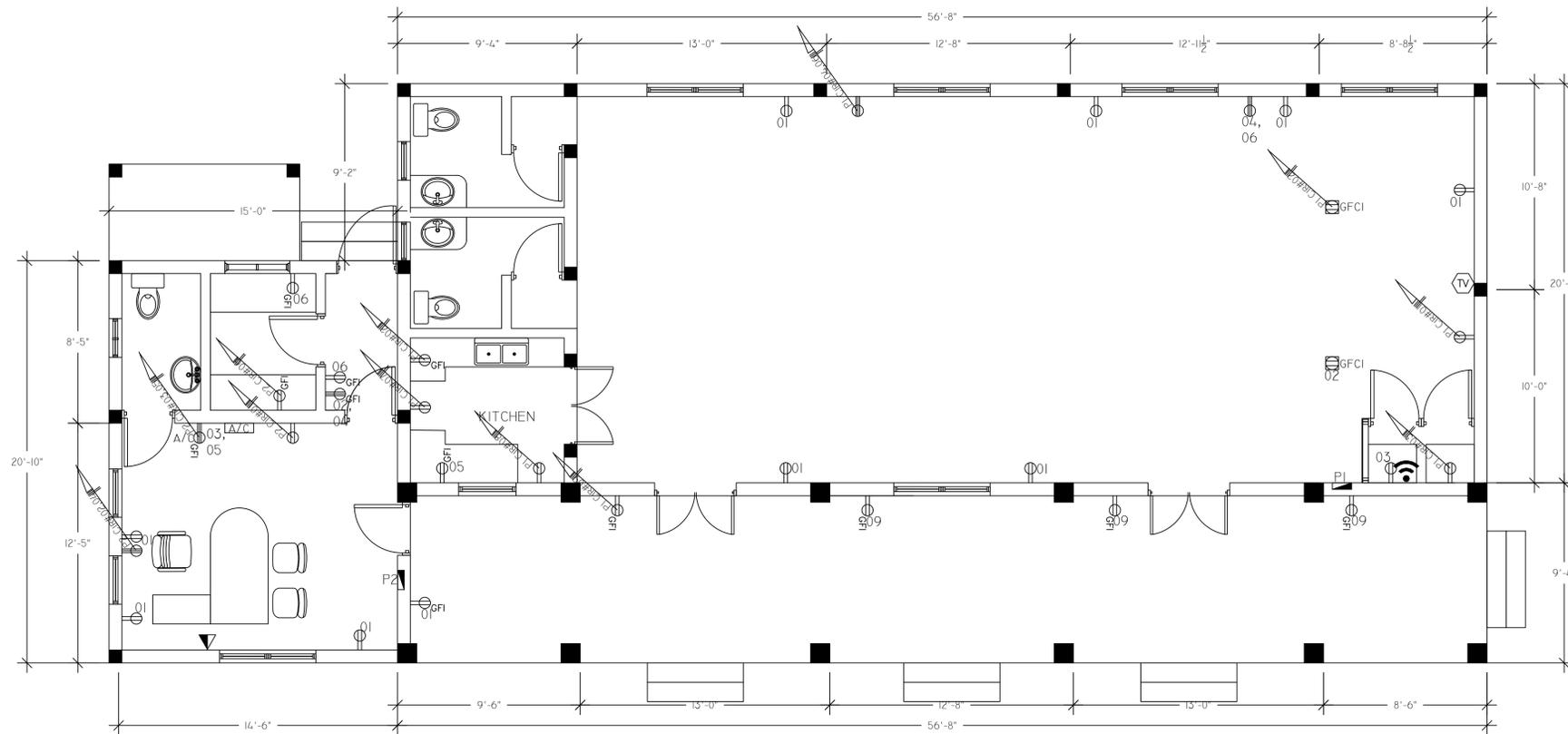
**E01 -LIGHTING PLAN**  
SCHEDULE

NOTES

WHILST A STEP-DOWN TRANSFORMER IS PROVIDED FOR, THE APUA WILL DETERMINE IF  $\Phi$ -3W SERVICE IS AVAILABLE IN THE AREA.

Scale:  
1/4" = 1'-0"

Date:  
11th May/2023



**POWER PLAN**

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

**SCHEDULE - PANEL 1**

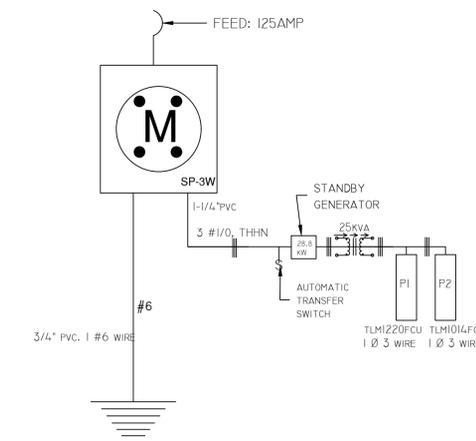
| PANEL ID: TLM10630CCU LOAD CENTER, WIRE RATING: 6 2/0 SINGLE-PHASE, THREE-WIRE, 120 VAC, MAIN BREAKER: THQL2125GF |      | WIRE: #3/0 90°C THHN VOLT: 120/240 |      |     | AMP: 125A 1Ø3 WIRE |      |     | LOCATION: MULTI-USE HALL, FRONT SIDEWALL |                                      |  |
|---|------|------------------------------------|------|-----|--------------------|------|-----|--|--------------------------------------|--|
| ITEM  | WIRE | AMP                                | VOLT | CIR | CIR                | VOLT | AMP | WIRE                                     | ITEM                                 |  |
| RECEPTACLES: MULTI-USE SPACE  | 12   | 20                                 | 120  | 01  | 02                 | 120  | 20  | 12                                       | RECEPTACLES: FLOOR - MULTI USE SPACE |  |
| RECEPTACLES: SERVER ROOM  | 12   | 20                                 | 120  | 03  | 04                 | 220  | 20  | 12                                       | RECEPTACLES: MULTI-USE SPACE         |  |
| RECEPTACLES: KITCHEN APPLIANCE  | 12   | 20                                 | 120  | 05  | 06                 | 220  | 20  | 12                                       | //                                   |  |
| RECEPTACLES: KITCHEN APPLIANCE  | 12   | 20                                 | 120  | 07  | 08                 | 120  | 20  | 6  | RECEPTACLES: KITCHEN APPLIANCE       |  |
| RECEPTACLES: VERANDA (GFCI)   | 12   | 20                                 | 120  | 09  | 10                 | 120  | 15  | 6  | LIGHTS: MULTI-USE SPACE              |  |
| LIGHTS: MULTI-USE SPACE   | 12   | 15                                 | 120  | 11  | 12                 | 120  | 15  | 12                                       | LIGHTS: MULTI-USE SPACE              |  |
| LIGHTS: MULTI-USE SPACE & RESTROOMS   | 12   | 15                                 | 120  | 13  | 14                 | 120  | 15  | 12                                       | LIGHTS: KITCHEN                      |  |
| LIGHTS: VERANDA   | 12   | 15                                 | 120  | 15  | 16                 | 120  | 20  | 12                                       | CEILING FAN: MULTI-USE               |  |
| CEILING FAN: MULTI-USE  | 12   | 20                                 | 120  | 17  | 18                 | 120  | 20  | 12                                       | CEILING FAN: MULTI-USE               |  |
| SMOKE DETECTOR  | 12   | 15                                 | 120  | 19  | 20                 | 120  | 20  | 12                                       |                                      |  |

**SCHEDULE - PANEL 2**

| PANEL ID: TLM10630CCU LOAD CENTER, WIRE RATING: 6 2/0 SINGLE-PHASE, THREE-WIRE, 120 VAC, MAIN BREAKER: THQL2125GF - GFCI BREAKER INSTALLED |      | WIRE: #3 90°C THHN VOLT: 120/240 |      |     | AMP: 85A 1Ø3 WIRE |      |     | LOCATION: OFFICE |                            |  |
|--|------|----------------------------------|------|-----|-------------------|------|-----|------------------|----------------------------|--|
| ITEM   | WIRE | AMP                              | VOLT | CIR | CIR               | VOLT | AMP | WIRE             | ITEM                       |  |
| RECEPTACLES: OFFICE & VERANDA  | 12   | 20                               | 120  | 01  | 02                | 220  | 20  | 12               | RECEPTACLES: OFFICE A/C    |  |
| RECEPTACLES: OFFICE & HALL   | 12   | 20                               | 220  | 03  | //                | 220  | 20  | 12               | //                         |  |
| //   | 12   | 20                               | 220  | 05  | 06                | 120  | 20  | 12               | RECEPTACLES: STOREROOM     |  |
| LIGHTS: OFFICE & STOREROOM   | 12   | 15                               | 120  | 07  | 08                | 120  | 15  | 12               | LIGHTS: SECURITY & VERANDA |  |
| GENERATOR: AUTOMATIC TRANSFER SWITCH   | 10   | 30                               | 220  | 09  | 10                | 120  | 20  | 12               |                            |  |
| //   | 12   | 30                               | 220  | 11  | 12                | 120  | 20  | 12               |                            |  |

**ELECTRICAL SCHEDULE**

| SYMBOL | DESCRIPTION                                    | AMP | WIRE | QTY | LOC                      |
|--------|--|-----|------|-----|--------------------------|
| ⎓      | VANITY LAMP LAMP @ 6.5' AFF.                   | 15  | 12G  | 02  | RESTROOM                 |
| ⊕      | WALL MOUNTED EXTERIOR LANTERN @ 7'AFF. CF20/CW | 15  | 12G  | 12  | VERANDA                  |
| ⊕      | MOTION SENSOR LAMP                             | 15  | 12G  | 06  | EXTERIOR                 |
| ⊕      | SMOKE DETECTOR                                 | 15  | 12G  | 9   | INTERIOR SPACES          |
| ⎓      | FT8/40/DL/24 @ 7'AFF.                          | 15  | 12G  | 01  | KITCHEN                  |
| ⊕      | DOWN LIGHTS                                    | 15  | 12G  | 14  | MULTI-USE SPACE          |
| ⎓      | FT8/40/CW/40 PENDANT LAMP W/ CHAIN @ 7'AFF.    | 15  | 12G  | 15  | MULTI-USE SPACE, KITCHEN |
| ⎓      | FT8/40/CW/40 FLUSH CEILING LAMP @ 7'AFF.       | 15  | 12G  | 03  | STOREROOM                |
| ⊕      | WALL MOUNT LAMP @ 6'AFF.                       | 15  | 12G  | 02  | OFFICE                   |
| ⊕      | 42IN CEILING FAN @ 6'AFF.                      | 15  | 12G  | 10  | MULTI-USE SPACE          |
| ⊕      | 10'X10' CEILING MOUNT LAMP, FLUSH - DAMP       | 15  | 12G  | 01  | VERANDA                  |
| ⎓      | SINGLE POLE SWITCH @ 48" AFF                   | 15  | 12G  | 16  | REFER TO E1              |
| ⎓      | THREE-WAY SWITCH @ 48" AFF                     | 15  | 12G  | 04  | REFER TO E1              |
| ⎓      | 2-GANG SWITCH @ 48" AFF                        | 15  | 12G  | 02  | REFER TO E1              |
| ATS    | AUTOMATIC TRANSFER SWITCH TO GENERATOR         | 30  | 10G  | 01  | GENERATOR PAD            |
| MS     | LAMPS WITH MOTION SENSOR                       | 15  | 12G  | 06  | REFER TO E1              |
| A P    | ACCESS PANEL TO CEILING - 24" x 48"            | N/A | N/A  | 02  | MULTI-USE SPACE          |



TECHNICAL ASSISTANCE FOR THE DESIGN AND SUPERVISION OF SLM-BASED ECOSYSTEM AND BIODIVERSITY RESTORATION INITIATIVES, IN ST. KITTS AND NEVIS, AND ANTIGUA AND BARBUDA

CLIENT:

**O ECS COMMISSION**  
MORNE FORTUNE,  
CASTRIES ST. LUCIA

PROJECT:

DEPT OF FORESTRY  
NURSERY - VISITORS  
CENTER

LOCATION:

BENDALS, ANTIGUA

SHEET:

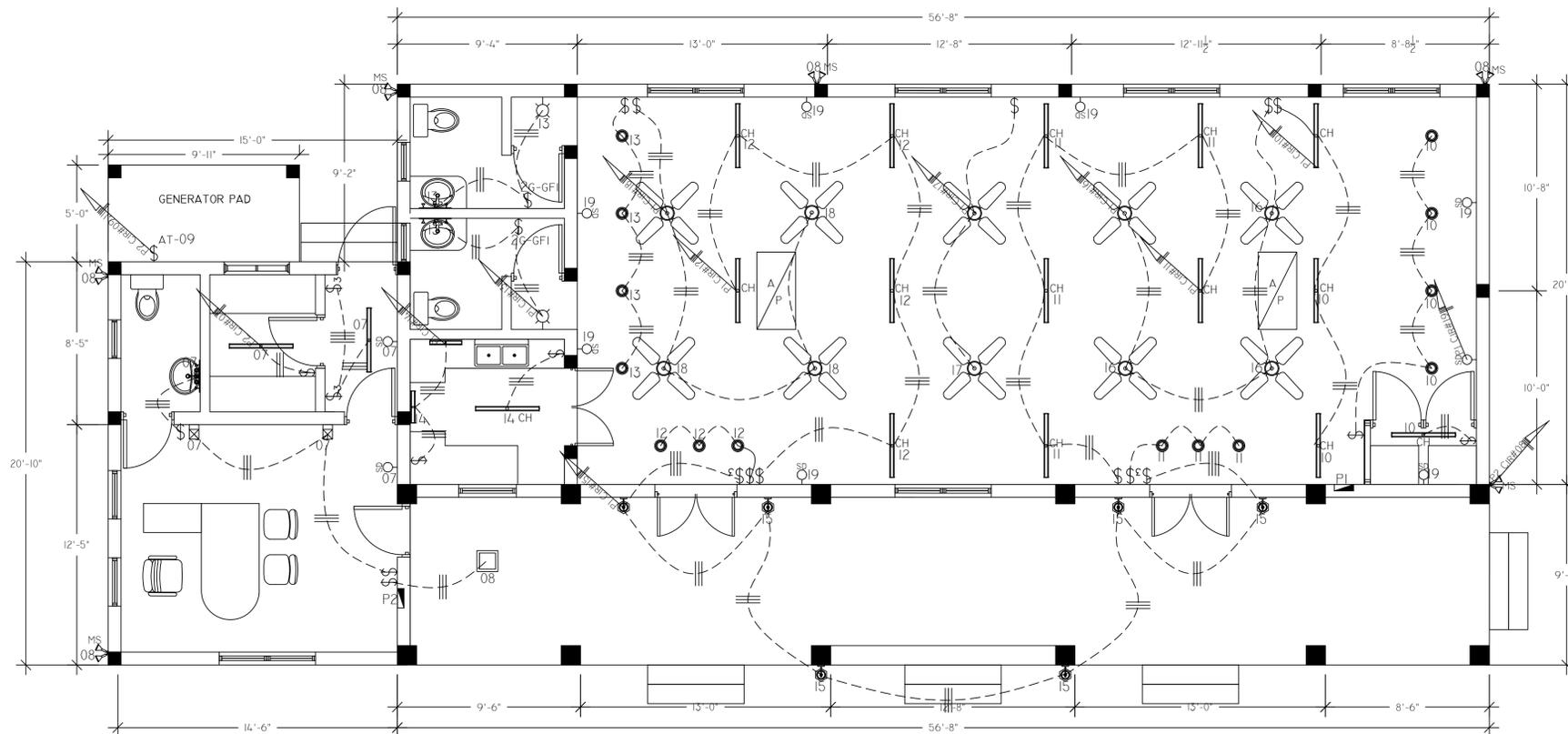
**E02 - POWER PLAN &  
SCHEDULE**

NOTES

ALL ELECTRICAL INSTALLATION SHALL CONFORM TO THE STANDARDS SET BY THE ANTIGUA POWER COMPANY. DRAWINGS PRESENTED ARE IN ACCORDANT WITH THE NEC 2017

Scale:  
1/4" = 1'-0"

Date:  
11th May/2023



## LIGHTING PLAN

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

### SCHEDULE - PANEL 1

| PANEL ID:<br>TLM3012CCU LOAD CENTER, WIRE RATING: 6 2/0<br>SINGLE-PHASE, THREE-WIRE, 120 VAC, MAIN BREAKER:<br>THQL21125GF |      | WIRE: #3/0 90°C<br>THHN<br>VOLT: 120/240 |      | AMP: 125A 1Ø3 WIRE<br>LOCATION: MULTI-USE HALL,<br>FRONT SIDEWALL |     |      |     |      |                                      |
|--|------|--|------|---|-----|------|-----|------|--------------------------------------|
| ITEM   | WIRE | AMP                                      | VOLT | CIR   | CIR | VOLT | AMP | WIRE | ITEM                                 |
| RECEPTACLES: MULTI-USE SPACE   | 12   | 20                                       | 120  | 01  | 02  | 120  | 20  | 12   | RECEPTACLES: FLOOR - MULTI USE SPACE |
| RECEPTACLES: SERVER ROOM   | 12   | 20                                       | 120  | 03  | 04  | 220  | 20  | 12   | RECEPTACLES: MULTI-USE SPACE         |
| RECEPTACLES: KITCHEN APPLIANCE   | 12   | 20                                       | 120  | 05  | 06  | 220  | 20  | 12   | //                                   |
| RECEPTACLES: KITCHEN APPLIANCE   | 12   | 20                                       | 120  | 07  | 08  | 120  | 20  | 6    | RECEPTACLES: KITCHEN APPLIANCE       |
| RECEPTACLES: VERANDA (GFCI)  | 12   | 20                                       | 120  | 09  | 10  | 120  | 15  | 6    | LIGHTS: MULTI-USE SPACE              |
| LIGHTS: MULTI-USE SPACE  | 12   | 15                                       | 120  | 11  | 12  | 120  | 15  | 12   | LIGHTS: MULTI-USE SPACE              |
| LIGHTS: MULTI-USE SPACE & RESTROOMS  | 12   | 15                                       | 120  | 13  | 14  | 120  | 15  | 12   | LIGHTS: KITCHEN                      |
| LIGHTS: VERANDA  | 12   | 15                                       | 120  | 15  | 16  | 120  | 20  | 12   | CEILING FAN: MULTI-USE               |
| CEILING FAN: MULTI-USE   | 12   | 20                                       | 120  | 17  | 18  | 120  | 20  | 12   | CEILING FAN: MULTI-USE               |
| SMOKE DETECTOR   | 12   | 15                                       | 120  | 19  | 20  | 120  | 20  | 12   |                                      |

### SCHEDULE - PANEL 2

| PANEL ID:<br>TLM10630CCU LOAD CENTER, WIRE RATING: 6 2/0<br>SINGLE-PHASE, THREE-WIRE, 120 VAC, MAIN BREAKER:<br>THQL21125GF - GFCI BREAKER INSTALLED |      | WIRE: #3 90°C<br>THHN<br>VOLT: 120/240 |      | AMP: 70A 1Ø3 WIRE<br>LOCATION: OFFICE |     |      |     |      |                            |
|--|------|--|------|---------------------------------------|-----|------|-----|------|----------------------------|
| ITEM   | WIRE | AMP                                    | VOLT | CIR                                   | CIR | VOLT | AMP | WIRE | ITEM                       |
| RECEPTACLES: OFFICE & VERANDA  | 12   | 20                                     | 120  | 01                                    | 02  | 220  | 20  | 12   | RECEPTACLES: OFFICE A/C    |
| RECEPTACLES: OFFICE & HALL   | 12   | 20                                     | 220  | 03                                    | //  | 220  | 20  | 12   | //                         |
| //   | 12   | 20                                     | 220  | 05                                    | 06  | 120  | 20  | 12   | RECEPTACLES: STOREROOM     |
| LIGHTS: OFFICE & STOREROOM   | 12   | 15                                     | 120  | 07                                    | 08  | 120  | 15  | 12   | LIGHTS: SECURITY & VERANDA |
| GENERATOR: AUTOMATIC TRANSFER SWITCH   | 10   | 20                                     | 220  | 09                                    | 10  | 120  | 20  | 12   |                            |
| //   | 12   | 20                                     | 220  | 11                                    | 12  | 120  | 20  | 12   |                            |

| ELECTRICAL SCHEDULE   |   |     |      |     |                         |
|---|---|-----|------|-----|-------------------------|
| SYMBOL  | DESCRIPTION                                     | AMP | WIRE | QTY | LOC                     |
|    | VANITY LAMP @ 6.5' AFF.                         | 15  | 12G  | 02  | RESTROOM                |
|    | WALL MOUNTED EXTERIOR LANTERN @ 7' AFF. CF20/CW | 15  | 12G  | 12  | VERANDA                 |
|    | MOTION SENSOR LAMP                              | 15  | 12G  | 06  | EXTERIOR                |
|    | SMOKE DETECTOR                                  | 15  | 12G  | 9   | INTERIOR SPACES         |
|    | FT8/40/DL/24 @ 7' AFF.                          | 15  | 12G  | 01  | KITCHEN                 |
|    | DOWN LIGHTS                                     | 15  | 12G  | 14  | MULTI-USE SPACE         |
|    | FT8/40/CW/40 PENDANT LAMP W/ CHAIN @ 7' AFF.    | 15  | 12G  | 15  | MULTIUSE SPACE, KITCHEN |
|    | FT8/40/CW/40 FLUSH CEILING LAMP @ 7' AFF.       | 15  | 12G  | 03  | STOREROOM               |
|    | WALL MOUNT LAMP @ 6' AFF.                       | 15  | 12G  | 02  | OFFICE                  |
|    | 42IN CEILING FAN @ 6' AFF.                      | 15  | 12G  | 10  | MULTI-USE SPACE         |
|    | 10'X10' CEILING MOUNT LAMP, FLUSH - DAMP        | 15  | 12G  | 01  | VERANDA                 |
|   | SINGLE POLE SWITCH @ 48" AFF                    | 15  | 12G  | 06  | REFER TO E1             |
|  | THREE-WAY SWITCH @ 48" AFF                      | 15  | 12G  | 04  | REFER TO E1             |
|  | 2-GANG SWITCH @ 48" AFF                         | 15  | 12G  | 02  | REFER TO E1             |
|  | AUTOMATIC TRANSFER SWITCH TO GENERATOR          | 30  | 10G  | 01  | GENERATOR PAD           |
|  | LAMPS WITH MOTION SENSOR                        | 15  | 12G  | 06  | REFER TO E1             |
|  | ACCESS PANEL TO CEILING - 24" X 48"             | N/A | N/A  | 02  | MULTI-USE SPACE         |