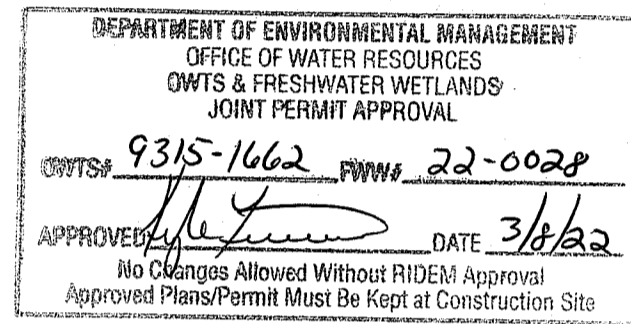


LOCUS MAP
NOT TO SCALE
BEING A.P. 16, LOT 335
LOT AREA = 11.65 ACRES

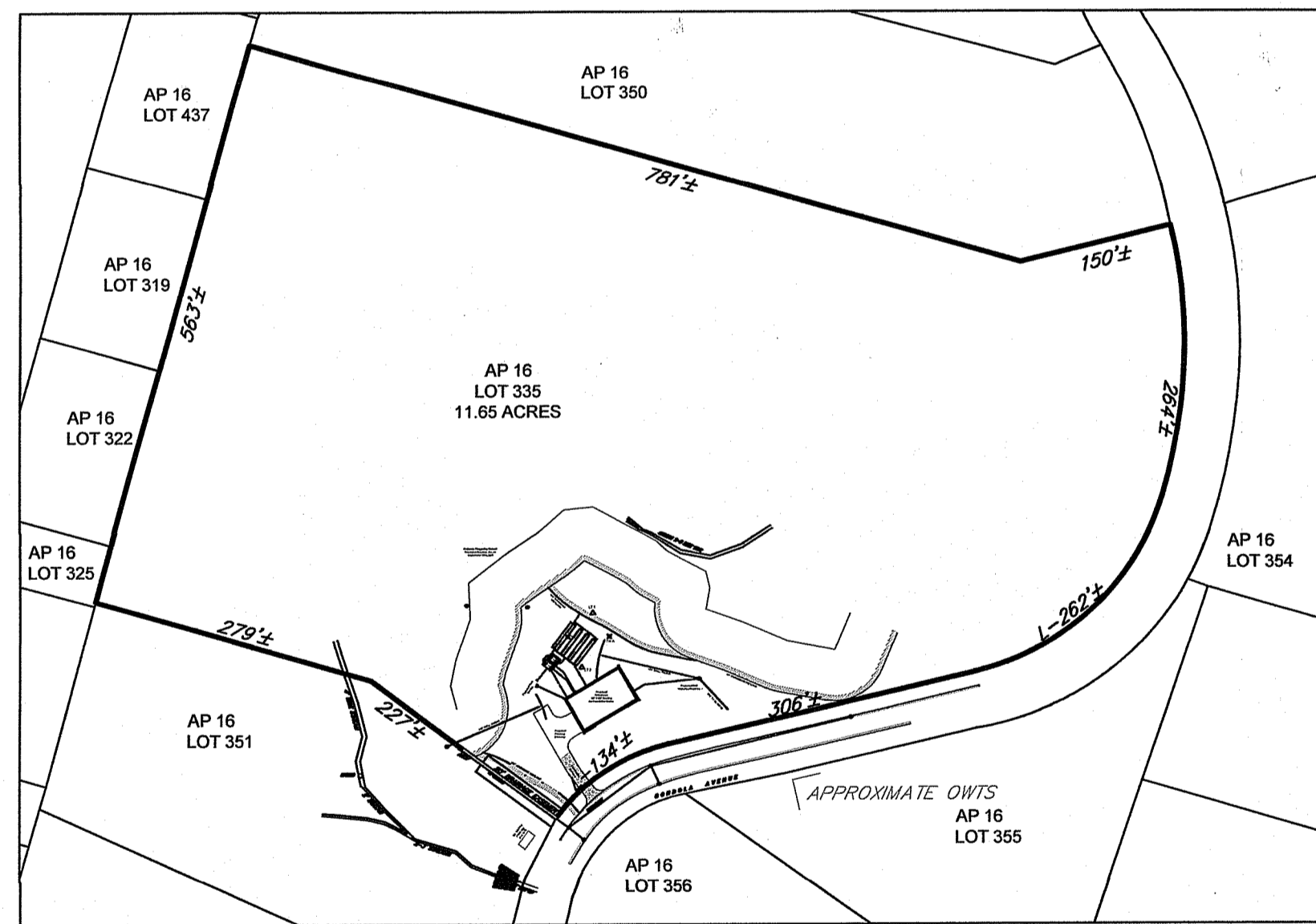
5-Bedroom Residential Dwelling @ 115 gal/day = 545 gal/day

Design Calculations:
Using Testhole # 1 - Soil Category 9 - Loading Rate Factor = 1.5
Required: 575 / 1.5 (factor) = 384 sf
Provided: GeoMat 3900 @ 3.25 s.f. per Linear Foot
4 lines @ 30' = 120' x 3.25 = 390 s.f.

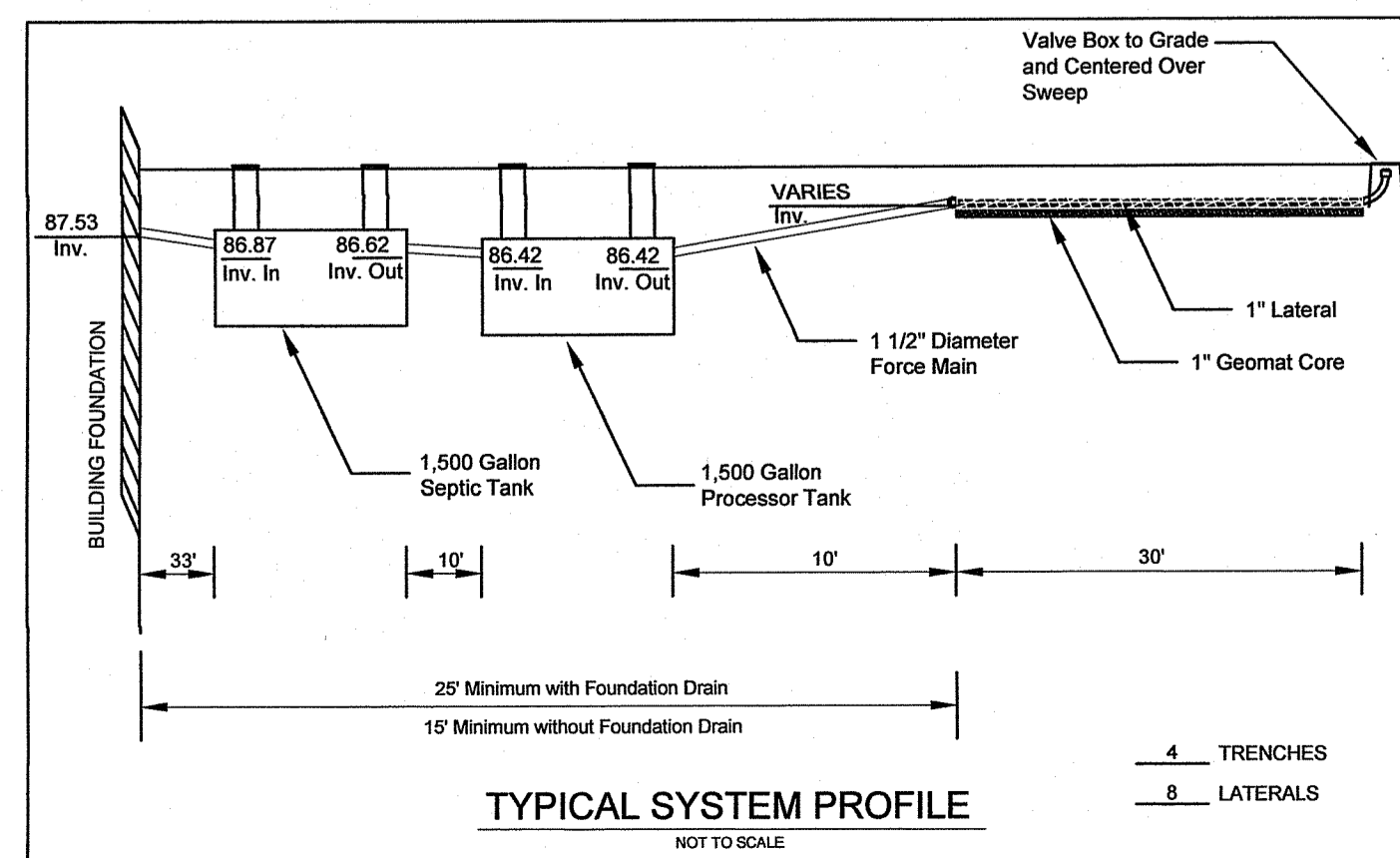
TESTHOLE, LEDGE TEST & PERCOLATION DATA:
TH A - VERIFIED AT 48", LEDGE AT 84" (9315-1662)
TH B - VERIFIED AT 48", LEDGE AT 84" (9315-1662)
LT 1 - LEDGE AT 84"
LT 2 - LEDGE AT 84"
SOIL CATEGORY 9 - DESIGNED USING A LOADING RATE FACTOR OF 1.5 GAL/SF/DAY



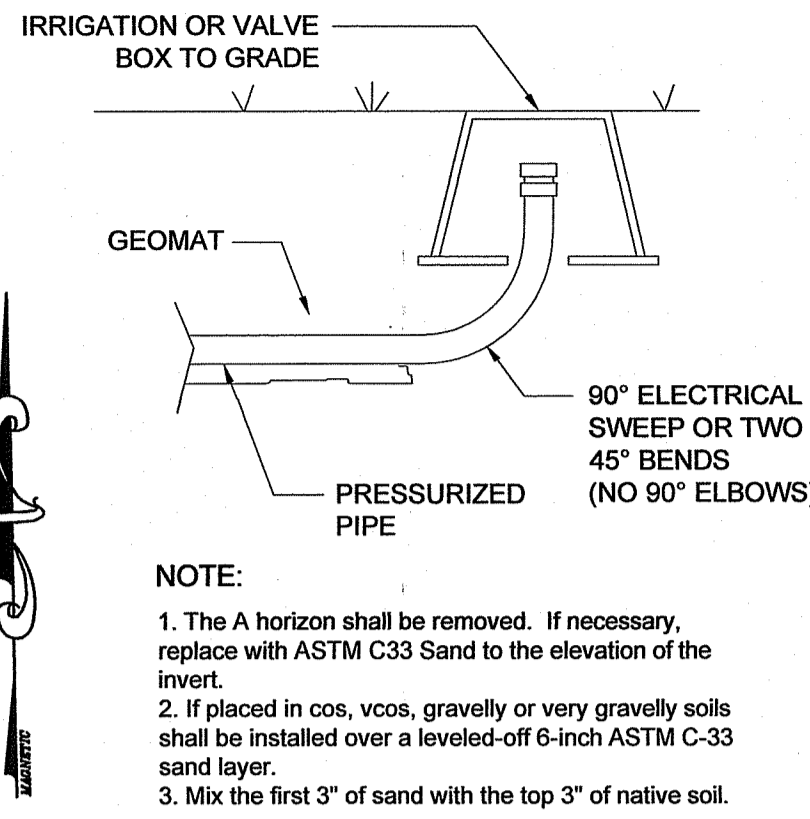
NOTE TO INSTALLER:
ADD WATER AS NECESSARY TO THE TANK TO COUNTERACT ANY BUOYANT FORCES ACTING UPON THE STABILITY OF THE TANK POSITION WHEN INSTALLING A TANK IN A HIGH WATER TABLE LOCATION.



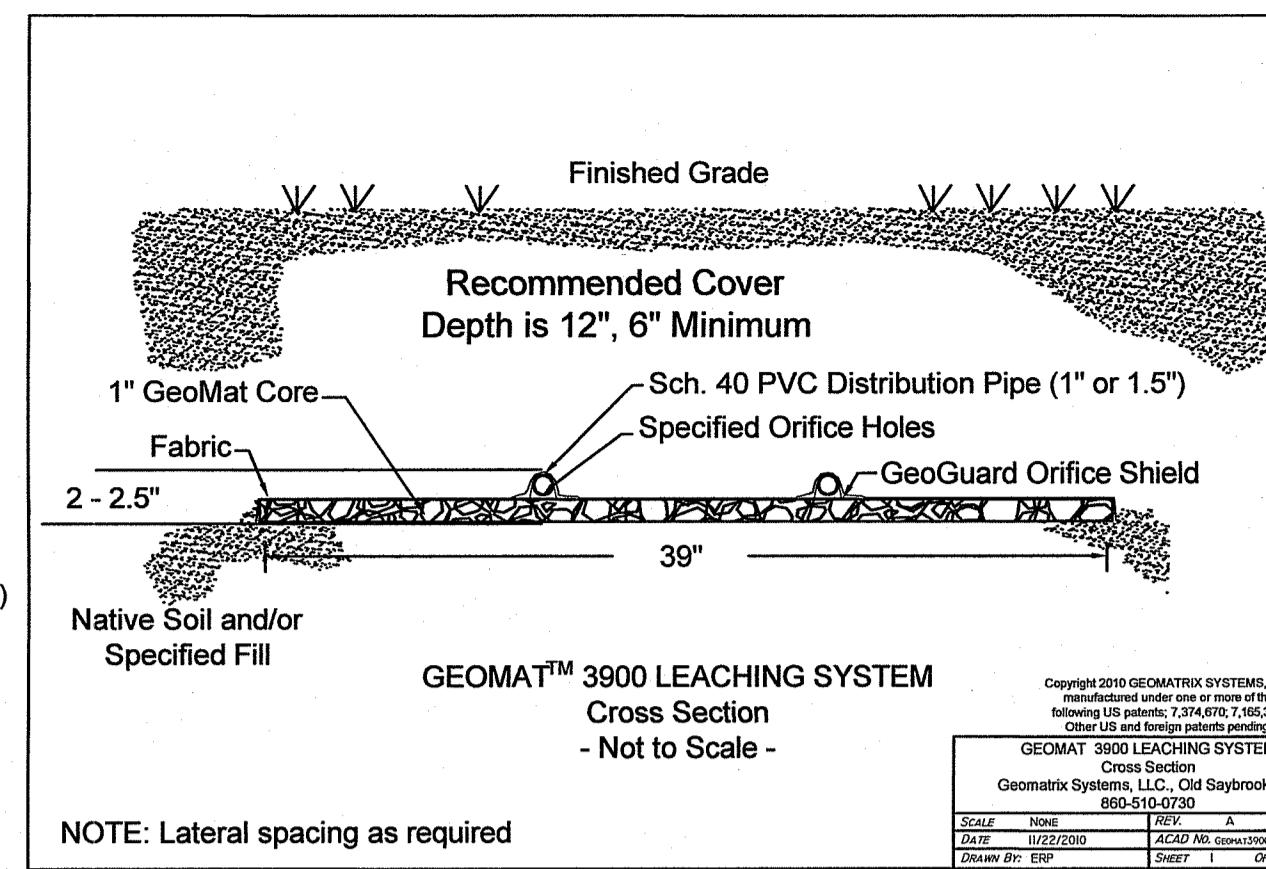
OVERALL SITE VIEW
SCALE 1" = 150'



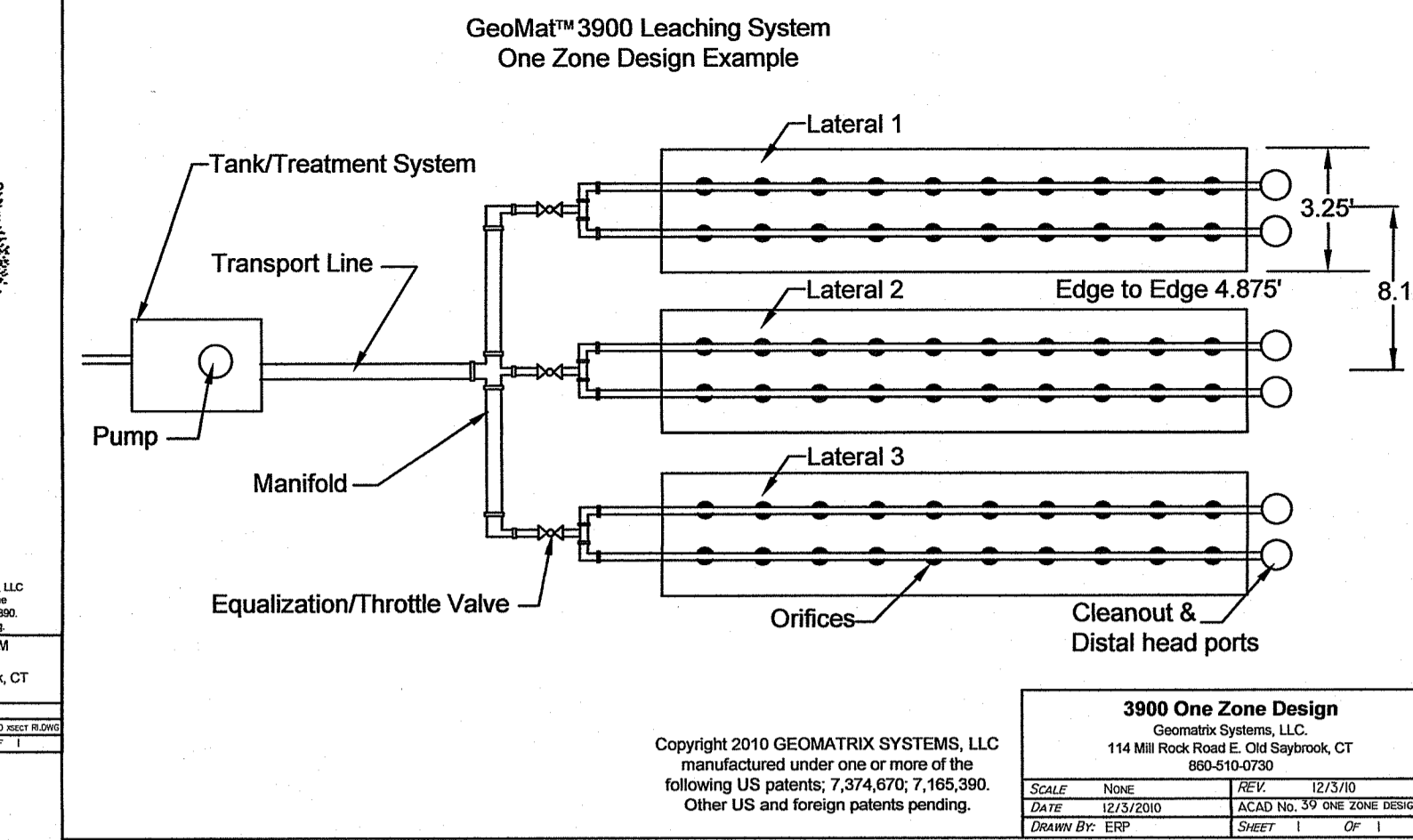
TYPICAL SYSTEM PROFILE
NOT TO SCALE



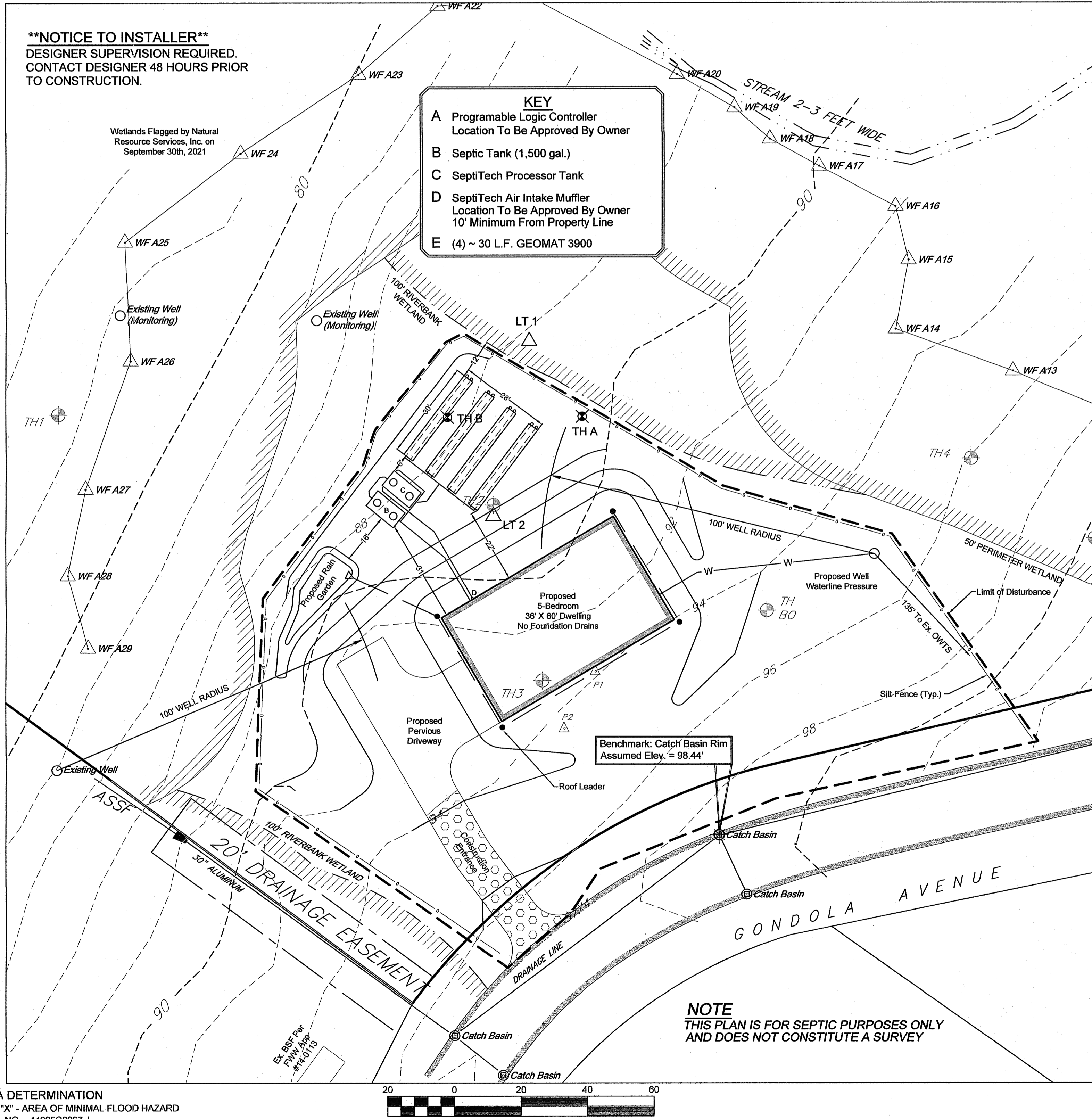
NOTE:
1. The A horizon shall be removed. If necessary, replace with ASTM C33 Sand to the elevation of the invert.
2. If placed in cos, vcos, gravelly or very gravelly soils shall be installed over a leveled-off 6-inch ASTM C-33 sand layer.
3. Mix the first 3" of sand with the top 3" of native soil.



NOTE: Lateral spacing as required



3900 One Zone Design
GeoMat Systems, LLC.
114 Mill Road East, Old Saybrook, CT 06455-4750
Scale: None
Date: 10/2/2020
Drawn By: EJP



****NOTICE TO INSTALLER****
DESIGNER SUPERVISION REQUIRED.
CONTACT DESIGNER 48 HOURS PRIOR TO CONSTRUCTION.

KEY
A Programmable Logic Controller Location To Be Approved By Owner
B Septic Tank (1,500 gal.)
C SeptiTech Processor Tank
D SeptiTech Air Intake Muffler Location To Be Approved By Owner 10' Minimum From Property Line
E (4) ~ 30 L.F. GEOMAT 3900

NOTE
THIS PLAN IS FOR SEPTIC PURPOSES ONLY AND DOES NOT CONSTITUTE A SURVEY

FEMA DETERMINATION
ZONE "X" - AREA OF MINIMAL FLOOD HAZARD
PANEL NO. - 4400SC0067 J
EFFECTIVE - SEPTEMBER 4, 2013

Scale 1" = 20'

- GENERAL NOTES:**
- 1) MAINTAIN DRAINFIELD INVERT GRADE ELEVATIONS FOR A MINIMUM OF 5'. SLOPE NO GREATER THAN 3:1 BEYOND THE 5' TO ORIGINAL GRADE.
 - 2) THE DRAINFIELD AREA IS TO BE KEPT DEBRIS FREE AND PLANTED TO GRASS.
 - 3) TREES AND SHRUBS ARE TO BE KEPT A MINIMUM DISTANCE OF 10' FROM THE DRAINFIELD.
 - 4) THERE ARE NO PUBLIC SEWERS WITHIN 200 FEET OF THE PROPERTY OTHER THAN SHOWN ON PLAN.
 - 5) THERE ARE NO WELLS WITHIN 200 FEET OF THE PROPOSED OWTs OTHER THAN SHOWN ON PLAN.
 - 6) THERE ARE NO OWTs WITHIN 200 FEET OF THE PROPOSED WELL OTHER THAN SHOWN ON PLAN.
 - 7) THERE ARE NO DRAINS WITHIN 100 FEET OF THE PROPERTY OTHER THAN SHOWN ON PLAN.
 - 8) THERE ARE NO PUBLIC WELLS WITHIN 500' OF THE PROPOSED OWTs OTHER THAN SHOWN ON PLAN.
 - 9) THERE ARE NO OWTs WITH A FLOW GREATER THAN 1,000 gpd WITHIN 400' OF THE PROPOSED WELL OTHER THAN SHOWN ON PLAN.
 - 10) THERE ARE NO WATERCOURSES, WETLANDS OR DRAINS WITHIN 200' OF THE PROPOSED OWTs OTHER THAN SHOWN ON PLAN.
 - 11) AREA OF TRENCHES TO BE STRIPPED 10 FEET ON ALL SIDES OF ALL TREES, STUMPS, BOULDERS, AND BRUSH.
 - 12) DRAINFIELD TO BE LAID IN NATURAL UNDISTURBED SOIL. CARE SHOULD BE TAKEN WHEN REMOVING TOPSOIL, SO NOT TO DISTURB THE SUBSOIL.
 - 13) ALL PRE-ASSEMBLED SEPTIC TANKS SHALL BE CERTIFIED WATER TIGHT BY THE MANUFACTURER. ALL TANKS ASSEMBLED ON-SITE SHALL BE CERTIFIED WATER TIGHT IN THE FIELD. CERTIFICATE BY MANUFACTURER OR FROM ON-SITE TESTING SHALL BE INCLUDED WITH BILL OF LADEN.
 - 14) ALL GRAVITY LINES TO BE 4 INCH DIAMETER P.V.C. SCHEDULE 35 OR EQUAL. MINIMUM SLOPE OF 1%. SLOPES GREATER THAN 5% SHALL BE PROHIBITED. ALL PRESSURE LINES SHALL BE PVC (CLASS 200 MINIMUM).
 - 15) THESE PLANS ARE FOR THE SOLE PURPOSE OF DESIGN, APPROVAL AND INSTALLATION OF THE PROPOSED ON-SITE WASTEWATER TREATMENT SYSTEM ONLY, AND HAS NOTHING TO DO WITH THE CONSTRUCTION OF THE PROPOSED BUILDING SHOWN OTHER THAN THE APPROXIMATE LOCATION AND ORIENTATION.
 - 16) THE USE OF GARBAGE DISPOSALS IS STRICTLY PROHIBITED.
 - 17) THE USE OF TUBS EQUAL TO OR GREATER THAN 100 GALLONS IS STRICTLY PROHIBITED.
 - 18) ALL CONSTRUCTION TO BE IN ACCORDANCE WITH THE RIDEM SAND FILTER GUIDANCE DOCUMENT AND THE SPECIFICATIONS OF SEPTI TECH.
 - 19) BILL OF LADEN SHALL BE PROVIDED TO THE DESIGNER FOR ALL SYSTEM COMPONENTS.
 - 20) ACCESS LIDS SHALL WEIGH 59 LBS OR: SHALL BE TAMPER RESISTANT AND MECHANICALLY FASTENED. EACH ACCESS OPENING SHALL HAVE A LABEL STATING 'ENTRANCE INTO THE TANK COULD BE FATAL'.
- PRECAUTIONARY NOTES:**
- (A) THE PROPOSED PSND LOCATION SHALL BE STAKED OUT AND PROTECTED PRIOR TO ANY SITE PREPARATION ACTIVITIES.
 - (B) PSND SHOULD NOT BE PLACED IN A DEPRESSIONAL AREA ON THE PROPERTY, WHERE STORM WATER IS LIKELY TO COLLECT DURING RAINFALL EVENTS.
 - (C) A MINIMUM OF TEN (10) FEET SHOULD BE MAINTAINED BETWEEN PSND AND NEIGHBORING TREES AND SHRUBS. THE ROOT SYSTEMS OF WATER-LOVING TREES AND SHRUBS CAN CAUSE DAMAGE TO PSNDs.
 - (D) UNDER NO CIRCUMSTANCES SHOULD HEAVY EQUIPMENT, VEHICLES, OR IMPERMEABLE SURFACES/MATERIALS BE ALLOWED OVER A FINISHED PSND. AT A MINIMUM, THIS WOULD RESULT IN POOR TREATMENT, MORE LIKELY SYSTEM FAILURE, BROKEN COMPONENTS, AND FINANCIAL EXPENSE TO THE HOME OWNER WILL RESULT.

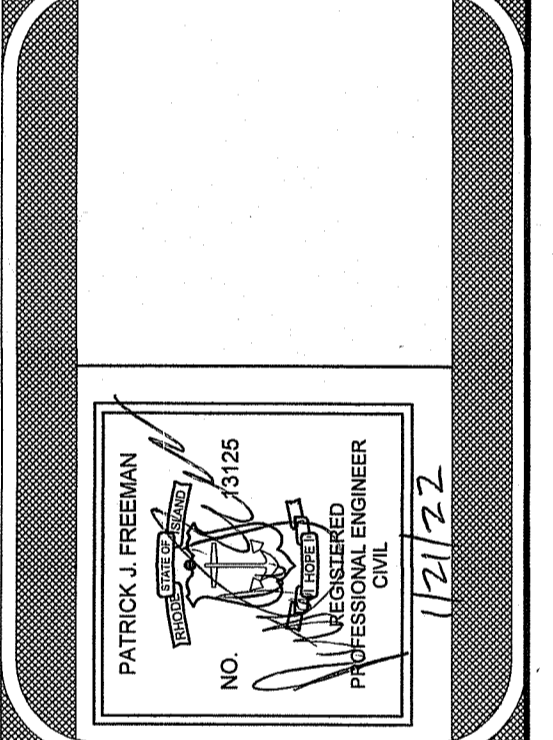
System Configuration

Design Configuration	5 Bedroom Residential
Design Flow	575 gpd
SeptiTech Controller	STAAR 0.75 Panel
NEMA 4X Rated Controller Model	
Invert at Dwelling	Elev. = 87.53
4" PVC Lateral to Septic Tank	33 feet
Septic Tank Settings	
Septic Tank Capacity	1500 gallon
Riser at Inlet End of Septic Tank	Elev. = 86.45 (6" Riser)
Invert at Septic Tank In	Elev. = 86.87
Invert at Septic Tank Out	Elev. = 86.62
Riser at Outlet End of Septic Tank	Elev. = 88.20 (6" Riser)
4" PVC Lateral to Processor Tank	10 feet
SeptiTech Tank Settings	
Processor Tank Series	STAAR 0.75
Processor Tank Capacity	1500 gallon
Riser at Inlet End of Processor Tank	Elev. = 88.25 (12" Riser)
Invert at Processor Tank In	Elev. = 86.42
Invert at Processor Tank Out	Elev. = 86.42
Riser at Outlet End of Processor Tank	Elev. = 88.50 (15" Riser)
Discharge Pump Settings	
Pump Model Number	LSPO3M
Transport Line Size	1-1/2"
PVC Transport Line to Field	10 feet
Maximum Design Flow	0.75 gallons/event = 90.00 gal.
Transport Return	0.92 gallons/event
Design Dosage + Transport	23.96 + 0.92 = 24.88 gallons/event
GEOMAT - 3900	
Mat Length	30
Mat Width	3.25
Manifold Length	26.67
Number of Laterals	8
Orifice Spacing	2.0
Number of Orifices	120
Loading Rate	1.5 gallons/sf/day
Field A & B Invert Table	
Existing Original Grade	88.00
Finish Grade Min.	88.50
Finish Grade Max.	89.00
Invert Elevation	88.00
Water Table Elevation	84.00
Field C & D Invert Table	
Existing Original Grade	89.00
Finish Grade Min.	89.50
Finish Grade Max.	90.00
Invert Elevation	89.00
Water Table Elevation	85.00

ONSITE WASTEWATER TREATMENT SYSTEM FOR
JAMES O'DONOVAN
LOCATED AT
101 GONDOLA AVENUE
JAMESTOWN, RHODE ISLAND

Checked By: MJC
Date: 01/21/2022
Scale: 1" = 20'

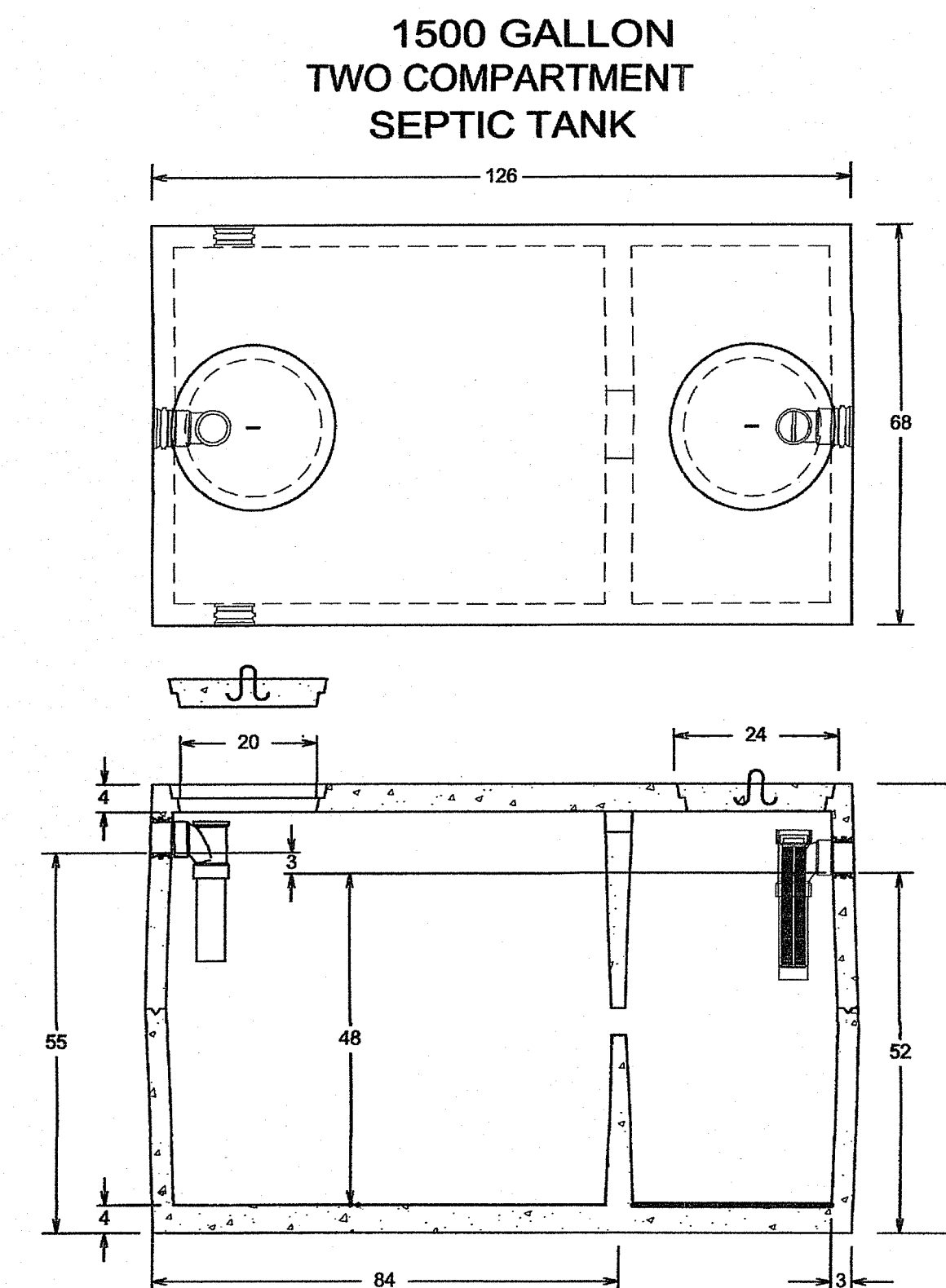
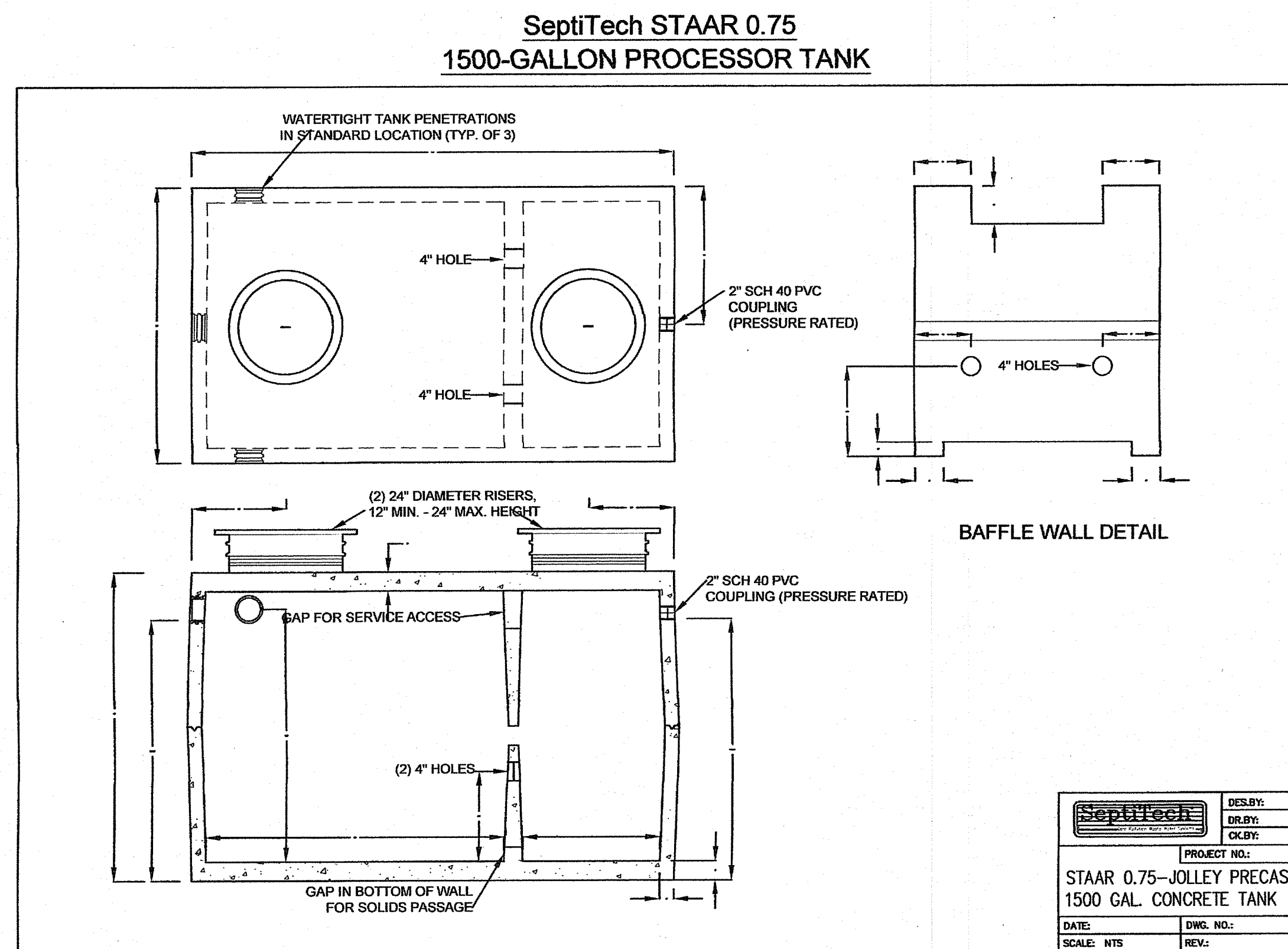
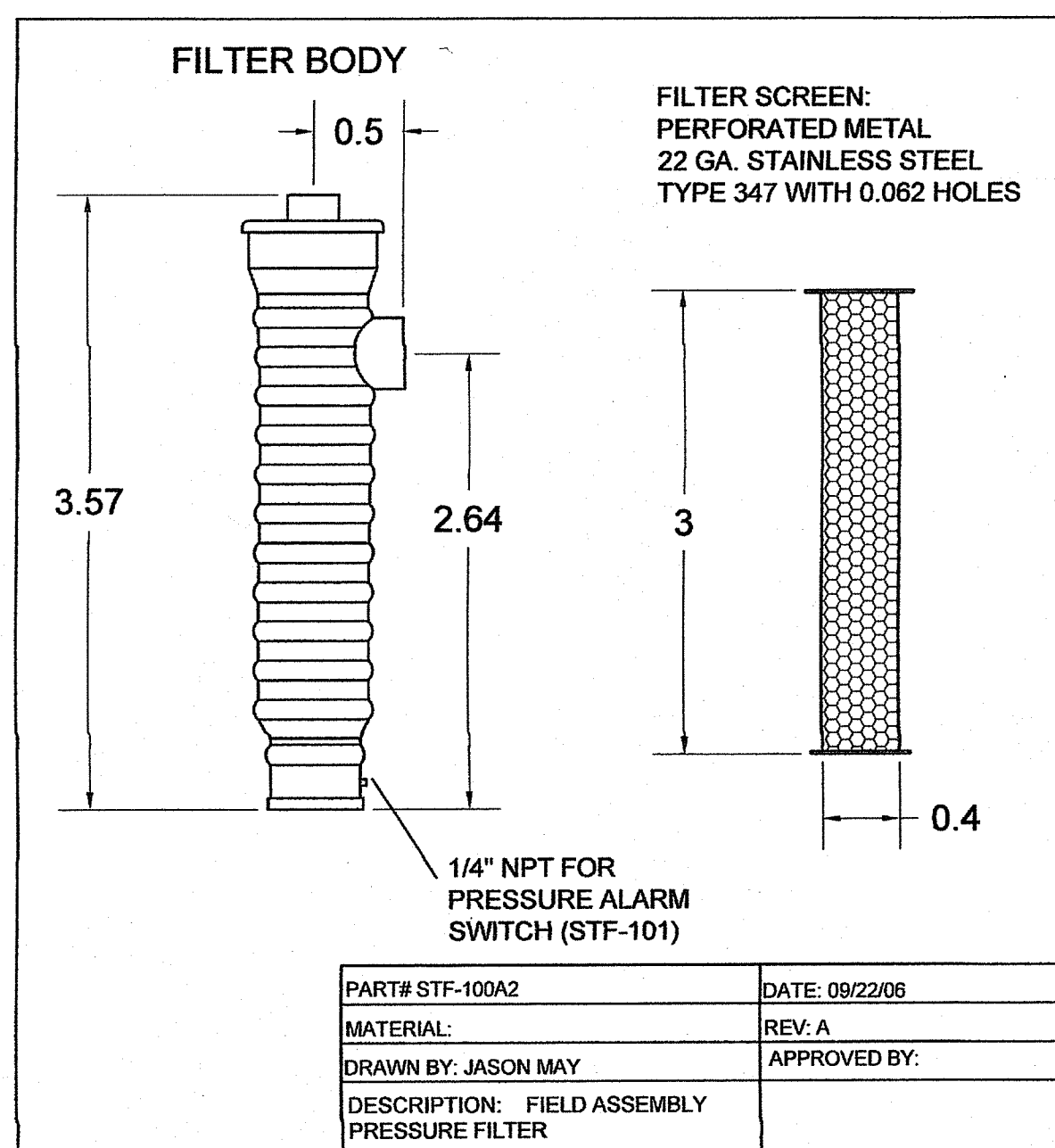
NO.	REVISION	BY	DATE



AMERICAN ENGINEERING, INC.
Professional Engineering & Land Surveying
400 South County Trail - Suite A 201
Exeter, Rhode Island 02822
DCoffa@AmericanEngineeringRI.com
Phone (401) 294-4090 / Fax (401) 294-3625

Sheet **1**
of 3 sheets
Job Number 105192

Environmental Management
JAN 25 2022
Office of Water Resources



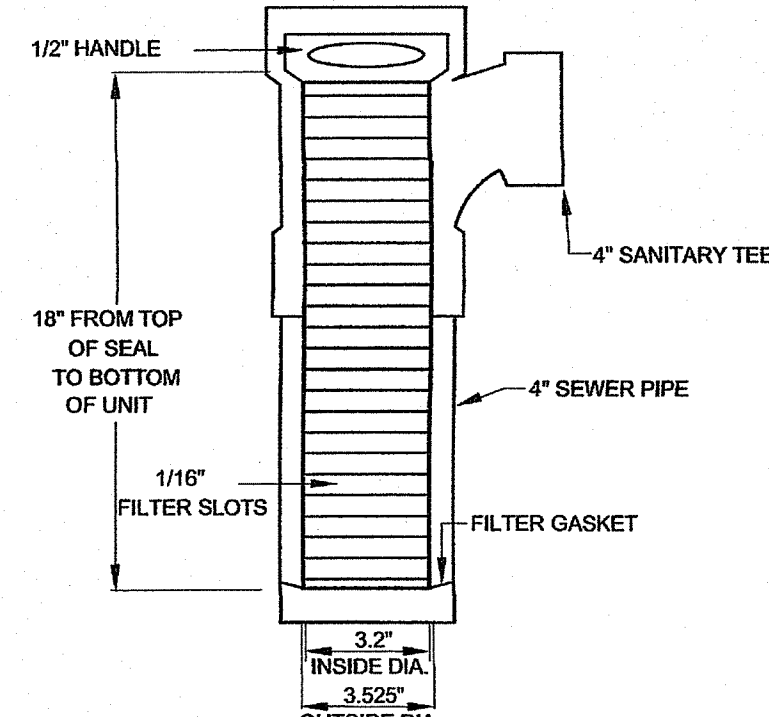
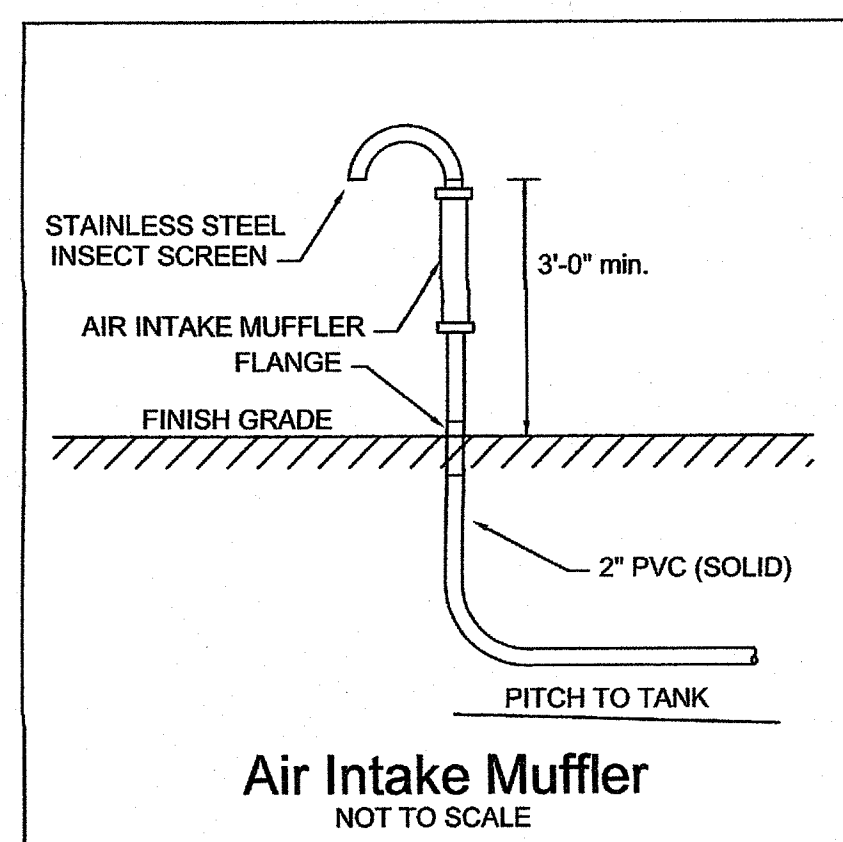
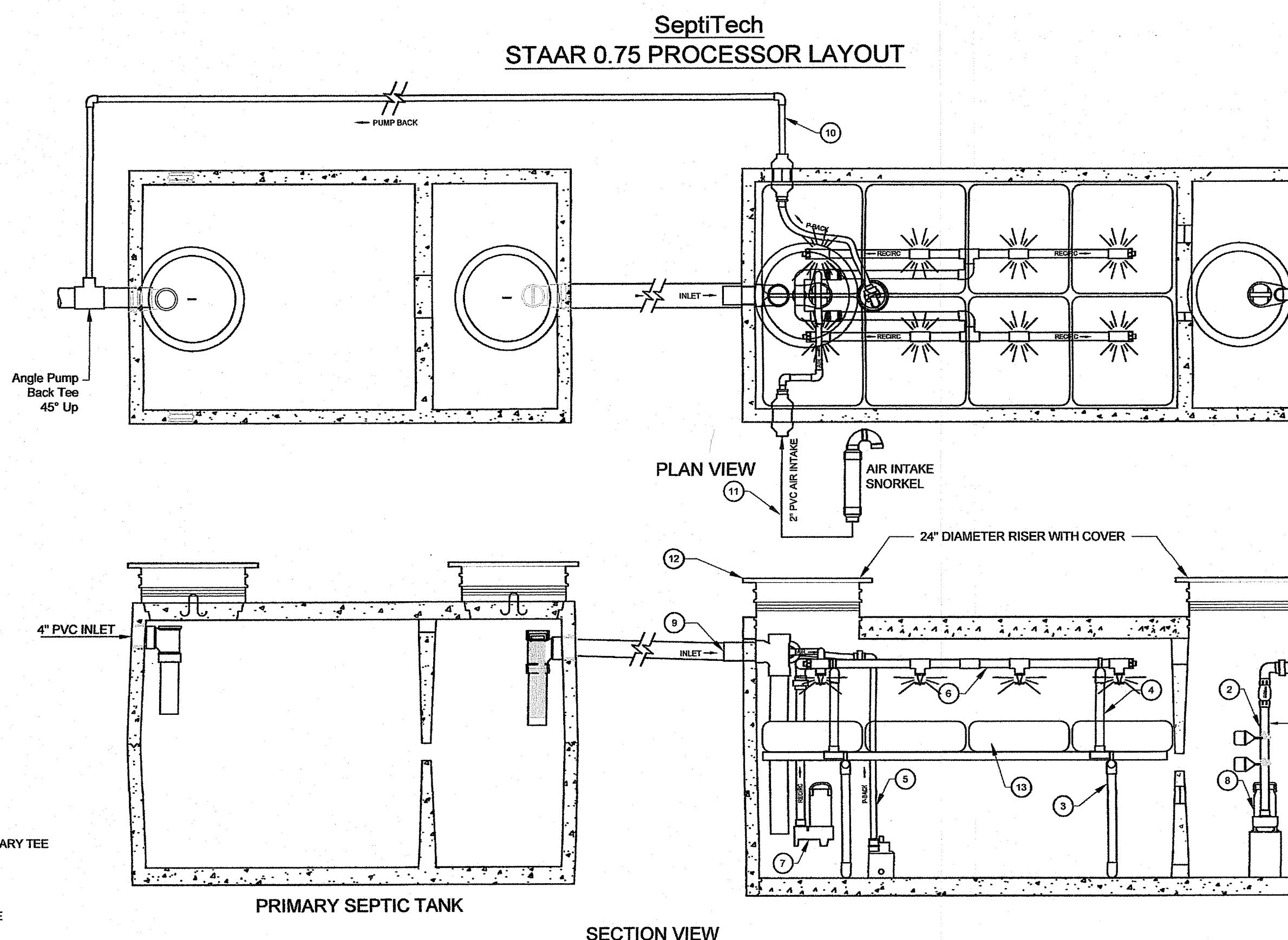
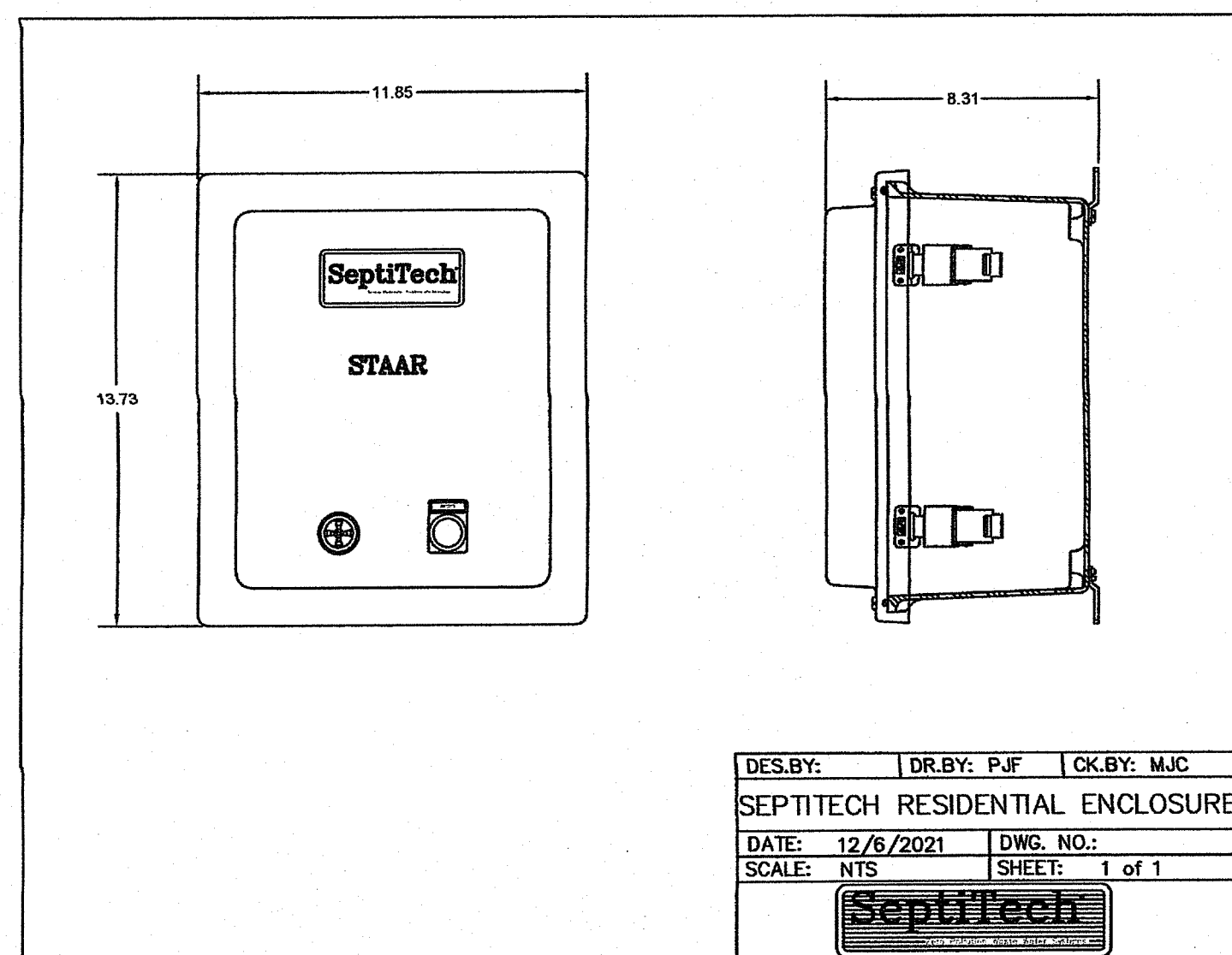
DESIGN NOTES

- 1) ALL JOINTS SEALED WITH BUTYL RUBBER SEALANT
- 2) ALL INLETS AND OUTLETS HAVE STATE APPROVED SEALS.
- 3) AVAILABLE OUTLET FILTER SHOWN.
- 4) MEETS ASTM C 1227-97A
- 5) CONCRETE STRENGTH 5000 PSI, MIN. 28 DAYS

(CERTIFIED WATERTIGHT IN FIELD)

NOTE: ACCESS LIDS SHALL WEIGH 59 lbs OR: SHALL BE TAMPER RESISTANT AND MECHANICALLY FASTENED. EACH ACCESS OPENING SHALL HAVE A LABEL STATING "ENTRANCE INTO THE TANK COULD BE FATAL".

ALL PRE-ASSEMBLED TANKS SHALL BE CERTIFIED WATER TIGHT BY THE MANUFACTURER. ALL TANKS ASSEMBLED ON-SITE SHALL BE CERTIFIED WATERTIGHT IN THE FIELD. CERTIFICATE BY MANUFACTURER OR FROM ON-SITE TESTING SHALL BE INCLUDED WITH BILL OF LADEN.



1	1500 Gal. CONCRETE Tank	8	Discharge Pump
2	Discharge Assembly w/ SIMTECH Filter (if required)	9	Inlet Pipe
3	Support Structure	10	Pump Back Line
4	Spray Header Support Structure	11	Air Intake Line
5	Pump Back Assembly	12	Riser with Cover
6	Spray Header Assembly	13	Bio Media
7	Recirculation Pump		
ITEM	DESCRIPTION	ITEM	DESCRIPTION

NOTE TO INSTALLER

The SeptiTech processor tank needs to be 1/2 filled with clean water prior to startup.

GENERAL NOTES

- Tank(s) shall not be installed at a depth any greater than 24-inches. Tank installations requiring a depth greater than 24-inches shall do so with prior approval by SeptiTech only.
 - Tank(s) shall be installed with a minimum of 12-inches of compacted crushed stone bedding. Select fill shall be used for backfilling around tanks. Native material may be used if approved by the design engineer.
 - Water Testing: Contractor is responsible for water testing the concrete tank(s) once the tank(s) installation has been completed and allowed to set overnight. Water testing shall be conducted in accordance with ASTM C1227.9.2. Installing contractor shall be responsible for providing clean water for the testing, filling the tanks, and pumping the tanks dry once testing is completed.
 - Exterior Piping: Contractor is responsible for supplying and installing all exterior piping per SeptiTech installation drawings.
 - Air Intake Piping: Air intake snorkel shall be installed within 100 feet of the processor tank. Air intake piping shall be installed such that a positive pitch is provided back towards the processor tank such that any condensation build up is free to drain.
 - Pipe Insulation: Contractor is responsible for insulating all piping exterior to the SeptiTech processor including the discharge line from the processor to the disposal field. Contractor is also responsible for installing insulation over the top of the force main from the SeptiTech system to the disposal field if not buried below frost level in order to prevent freezing.
 - Electrical: All electrical work is the responsibility of the contractor's licensed electrician and is not provided by SeptiTech.
- SeptiTech processors can also be built to 3-phase power requirements. If 3-phase is required, please notify SeptiTech at the time of contract signing.

ONSITE WASTEWATER TREATMENT SYSTEM

FOR

JAMES O'DONOVAN

LOCATED AT

101 GONDOLA AVENUE
JAMESTOWN, RHODE ISLAND

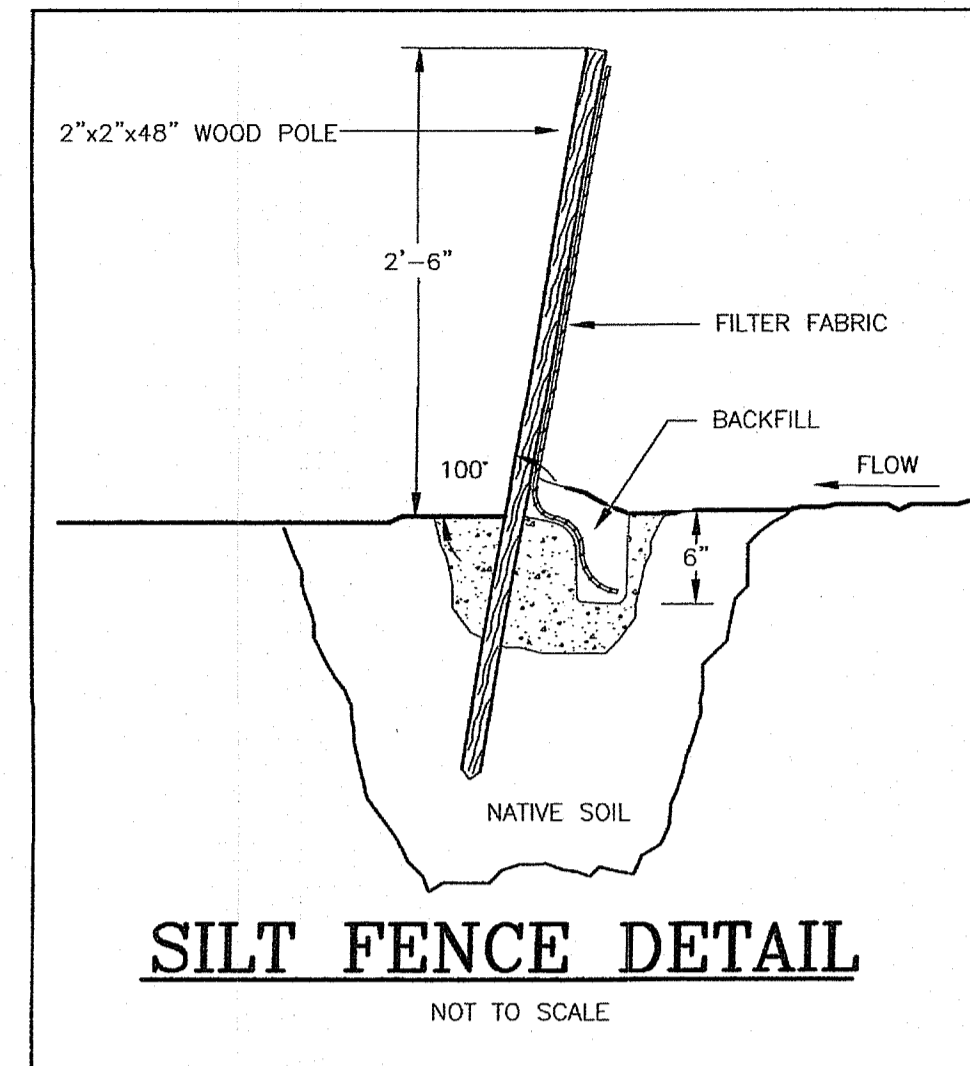
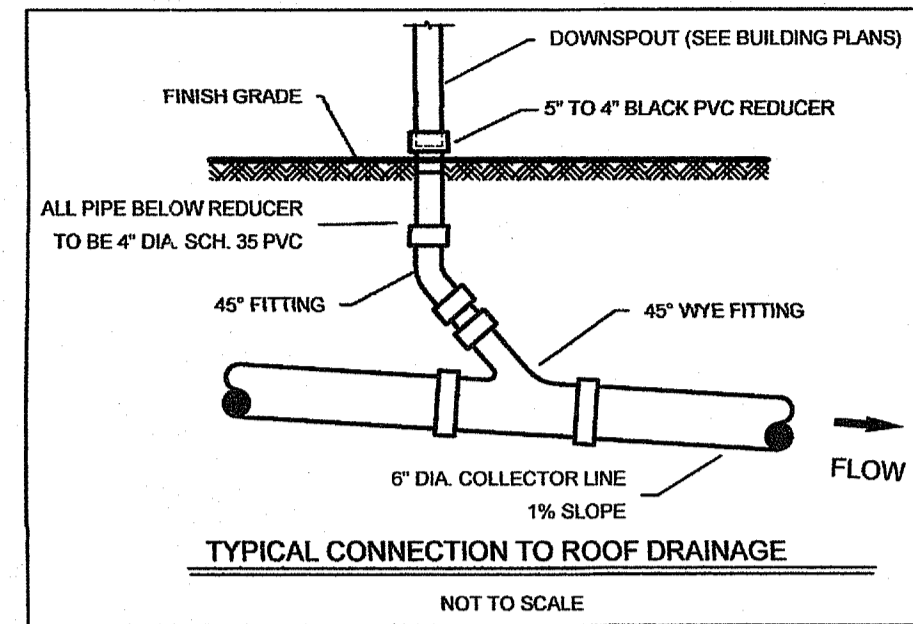
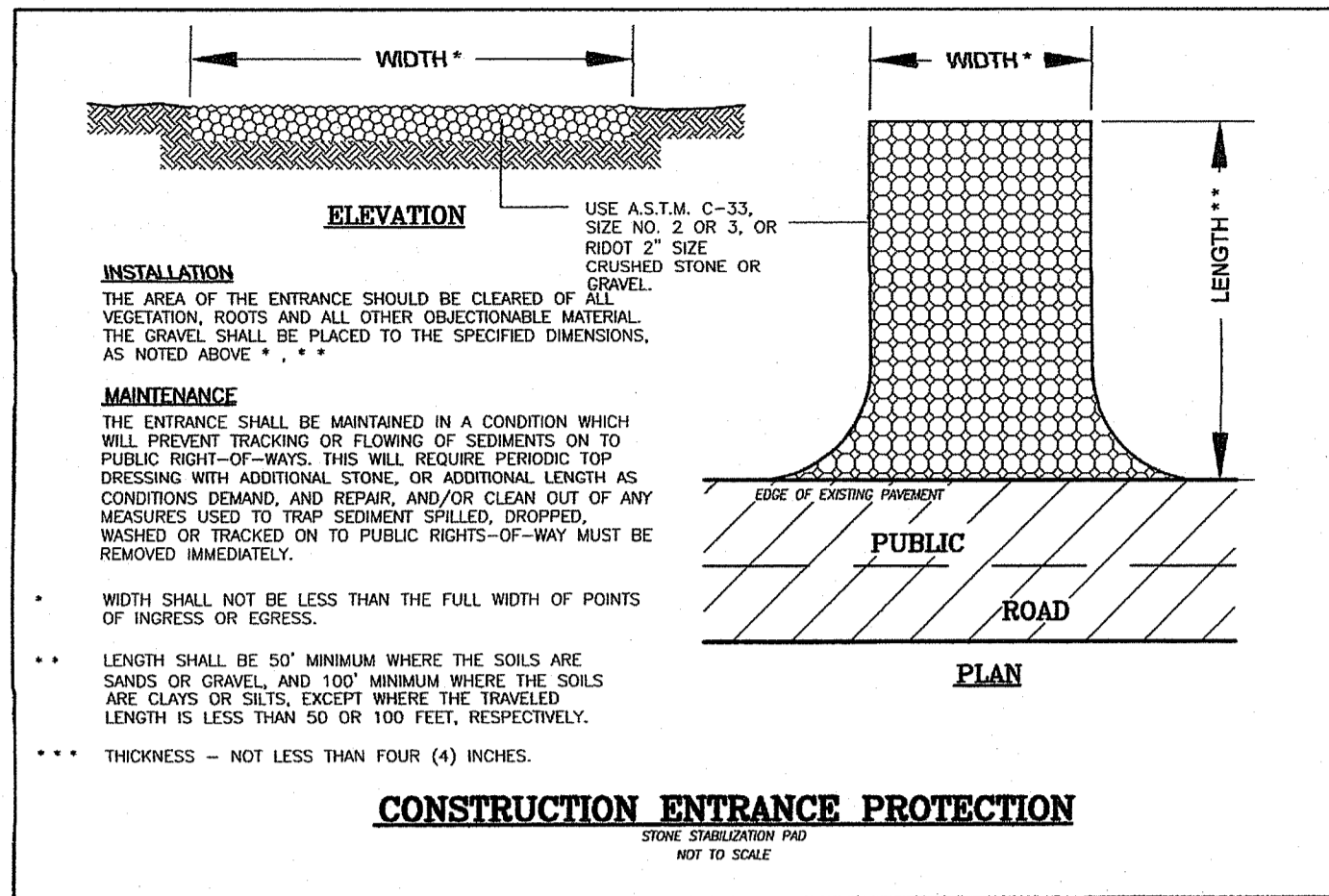
Checked By: P.J.F.

Date: 01/21/2022

Drawn By: MJC

Scale: As Shown

REVISIONS



GENERAL NOTES

- IT SHALL BE THE CONTRACTOR'S RESPONSIBILITY TO OBTAIN ANY AND ALL PERMITS REQUIRED BY THE STATE OF RHODE ISLAND AND THE MUNICIPALITY PRIOR TO COMMENCING ANY WORK.
- IT SHALL ALSO BE THE CONTRACTOR'S RESPONSIBILITY TO MAINTAIN THE INTEGRITY OF ALL EXISTING UTILITIES, STRUCTURES, AND ABUTTING PROPERTIES. THE COST OF ANY REPAIR OR REPLACEMENT OF DAMAGED ITEMS SHALL BE BORNE BY THE CONTRACTOR.
- THE CONTRACTOR SHALL COORDINATE ALL WORK WITH THE MUNICIPAL ENGINEERING DEPARTMENT AND ALL UTILITY INSTALLATIONS AND INSPECTIONS WITH THE APPROPRIATE UTILITY CO. A 48 HOUR ADVANCE NOTICE IS REQUIRED BEFORE WORK COMMENCEMENT.
- ALL WORK WITHIN THE STATE'S ROW WILL CONFORM TO RIDOT'S STANDARD SPECIFICATIONS FOR ROAD AND BRIDGE CONSTRUCTION, 2013 AMENDED AUGUST 2013 AND STANDARD DETAILS, JUNE 15, 1998 AS AMENDED BY REVISION.
- ALL TRAFFIC CONTROL SHALL CONFORM TO THE MANUAL ON UNIFORM TRAFFIC CONTROL DEVICES 2009, INCLUDING ALL REVISIONS.
- THE CONTRACTOR SHALL BE SOLELY RESPONSIBLE FOR QUANTITY TAKE OFF IN COMPUTING ANY ESTIMATES.
- EMBANKMENT SLOPES AND ALL DISTURBED AREAS ARE TO RECEIVE 4" OF TOPSOIL AND SEED. SEE EROSION CONTROL PROGRAM DETAILS.
- THE CONTRACTOR IS RESPONSIBLE FOR ALL CONSTRUCTION INDICATED ON THESE PLANS. THAT INCLUDES ANY CONSTRUCTION TO BRING UTILITIES TO THE SITE, ANY REPAIRS, ANY TRENCING REQUIRED.
- THE CONTRACTOR SHALL BE RESPONSIBLE FOR ESTABLISHING AND MAINTAINING ALL TEMPORARY SEDIMENTATION AND SOIL EROSION CONTROL MEASURES.
- THE LOCATION OF EXISTING UTILITIES AS SHOWN ARE APPROXIMATE AND SHOULD BE VERIFIED BY THE CONTRACTOR WITH THE APPROPRIATE UTILITY COMPANIES. CALL DIG-SAFE 1(888)344-7233.
- IN ALL EXCAVATION AND PLACEMENT OF FILL THE CONTRACTOR SHALL PERFORM THE WORK IN FULL COMPLIANCE WITH THE R.I. STANDARD SPECIFICATION SECTION 202.
- ALL CONSTRUCTION AND UTILITY WORK SHALL CONFORM TO THE LATEST MUNICIPAL STANDARDS. IT IS THE RESPONSIBILITY OF THE CONTRACTOR TO OBTAIN, COMPREHEND AND IMPLEMENT THESE REQUIREMENTS PROPERLY.

EROSION CONTROL & SOIL STABILIZATION PROGRAM

- DENUDED SLOPES SHALL NOT BE UNATTENDED OR EXPOSED FOR EXCESSIVE PERIODS OF TIME SUCH AS THE INACTIVE WINTER SEASON.
- ALL DISTURBED SLOPES EITHER NEWLY CREATED OR EXPOSED PRIOR TO OCTOBER 15, SHALL BE SEEDED OR PROTECTED BY THAT DATE FOR ANY WORK COMPLETED DURING EACH CONSTRUCTION PERIOD.
- THE TOPSOIL SHALL HAVE A SANDY LOAM TEXTURE RELATIVELY FREE OF SUBSOIL MATERIAL, STONES, ROOTS, LUMPS OF SOIL, TREE LIMBS, TRASH OR CONSTRUCTION DEBRIS, AND SHALL CONFORM WITH R. I. STANDARD SPECIFICATION M. 20.
- THE SEED MIX SHALL BE INOCULATED WITHIN 24 HOURS, BEFORE MIXING AND PLANTING, WITH APPROPRIATE INOCULUM FOR EACH VARIETY.
- THE DESIGN MIX SHALL BE COMPRISED OF THE FOLLOWING:

PERMANENT SEEDING MIXTURES:

A - MOWED AREA: ALL FLAT OR SLOPES LESS THAN 3:1

MIXTURE	% BY WT.	SEEDING DATES
RED FESCUE	75	APRIL 1 - JUNE 15
KENTUCKY BLUEGRASS	15	AUG. 15 - OCT. 15
COLONIAL BENTGRASS	5	
PERENNIAL RYEGRASS	5	

TOTAL 100%ACRE

PERMANENT SEEDING MIXTURES:

B - UNMOWED AREA OR INFREQUENTLY MOWED: FLAT OR SLOPES GREATER THAN 3:1

MIXTURE	% BY WT.	SEEDING DATES
RED FESCUE	75	APRIL 1 - JUNE 15
PERENNIAL RYEGRASS	5	AUG. 15 - OCT. 15
COLONIAL BENTGRASS	5	
BIRDSFOOT TREFLOIL	15	

TOTAL 100%ACRE

6. TEMPORARY TREATMENTS SHALL CONSIST OF A HAY, STRAW OR FIBER MULCH OR PROTECTIVE COVERS SUCH AS A MAT OR FIBER LINING (BURLAP, JUTE, FIBERGLASS NETTING, EXCELSIOR BLANKETS). THEY SHALL BE INCORPORATED INTO THE WORK AS WARRANTED OR AS ORDERED BY THE ENGINEER.

7. HAY OR STRAW APPLICATIONS SHOULD BE IN THE AMOUNT OF 3000-4000 LBS/AC.

8. ALL HAYBALES OR TEMPORARY PROTECTION SHALL REMAIN IN PLACE UNTIL AN ACCEPTABLE STAND OF GRASS OR APPROVED GROUND COVER IS ESTABLISHED. IF NEEDED, TEMPORARY SEEDING CAN BE USED TO HELP MINIMIZE EROSION. A TEMPORARY SEEDING GUIDE MUST BE INCLUDED AS A REFERENCE. THE FOLLOWING SPECIES ARE RECOMMENDED:

SPECIES	LBS/ACRE	LBS/1,000 SQ. FT.	SEEDING DATES
ANNUAL RYEGRASS	60	1.5	MAR. 15 - JUNE 15
PERENNIAL SUDAN GRASS	40	1.0	MAY 15 - AUGUST 15
MILLET	40	1.0	MAY 15 - AUGUST 15
WINTER RYE	120	3.0	AUGUST 15 - JUNE 15
OATS	120	3.0	MAR. 15 - JUNE 15
WEeping LOVEGRASS	20	0.5	MAY 1 - JUNE 30

MAINTENANCE AND RESPONSIBILITY

- THE CONSTRUCTION SUPERINTENDENT SHALL HAVE THE SOLE RESPONSIBILITY FOR THE DESIGN IMPLEMENTATION. HE SHALL ALSO BE RESPONSIBLE FOR ENSURING THAT ALL CONSTRUCTION WORKERS AND SUB-CONTRACTORS ARE AWARE OF THE PROVISIONS OF THE PLAN AND THE ENGINEER'S REPORT.
- THE CONTRACTOR SHALL BE RESPONSIBLE FOR MAINTAINING ALL ASPECTS OF THE DESIGN PRIOR TO FINAL APPROVAL BY THE TOWN. DURING THAT TIME, ALL EROSION AND SEDIMENTATION CONTROL MEASURES SHOULD BE CHECKED ON A WEEKLY BASIS AS WELL AS AFTER EACH SIGNIFICANT RAINFALL. ALL SUCH MEASURES SHOULD BE CLEANED OR REPLACED AS NECESSARY.
- REPLANTING, REGRADING OR OTHER REPAIRS NEEDED AS A RESULT OF EROSION AND SEDIMENTATION SHOULD BE DONE PROMPTLY.

NOTES:

- ALL EROSION CONTROL MEASURES TO REMAIN FOR 3 CONSECUTIVE MOWINGS.
- CONTRACTOR TO CALL PUBLIC WORKS PRIOR TO CONSTRUCTION AND AGAIN FOR FINAL INSPECTION.
- THIS SITE AS DESIGNED WILL HAVE NO ADVERSE EFFECT ON ABUTTING PROPERTIES ASSUMING EROSION CONTROL PLAN IS IMPLEMENTED.
- FOR DRIVEWAYS SLOPING DOWN TOWARD THE ROAD HAYBALES TO BE SET ACROSS DRIVEWAY AT THE END OF DAY.
- CONSTRUCTION TO COMMENCE IMMEDIATELY FOLLOWING APPROVAL AND WILL TAKE APPROXIMATELY 6 MONTHS TO COMPLETE.

ORDER OF PROCEDURE

- IMMEDIATELY UPON COMPLETION OF THE CLEARING AND GRUBBING OPERATION AND PRIOR TO ANY GRADING, TEMPORARY HAYBALES, SILT FENCE OR SANDBAGS SHALL BE PLACED INSIDE THE LIMITS OF DISTURBANCE AS SHOWN ON THE PLANS. (I.E. ALONG NEW ROADWAYS, STREAMBANKS, CRITICAL AREAS, ETC.)
- ALL EROSION AND SEDIMENTATION CONTROL MEASURES SHALL BE PERIODICALLY CLEANED AND MAINTAINED AS PER THE RESPECTIVE PROGRAMS DURING THE CONSTRUCTION.
- IF WORK PROGRESS IS TO BE INTERRUPTED AT ANY TIME, REFERENCE EROSION AND SEDIMENTATION CONTROL PROGRAMS FOR TEMPORARY CONTROL.

Rain Garden Notes:

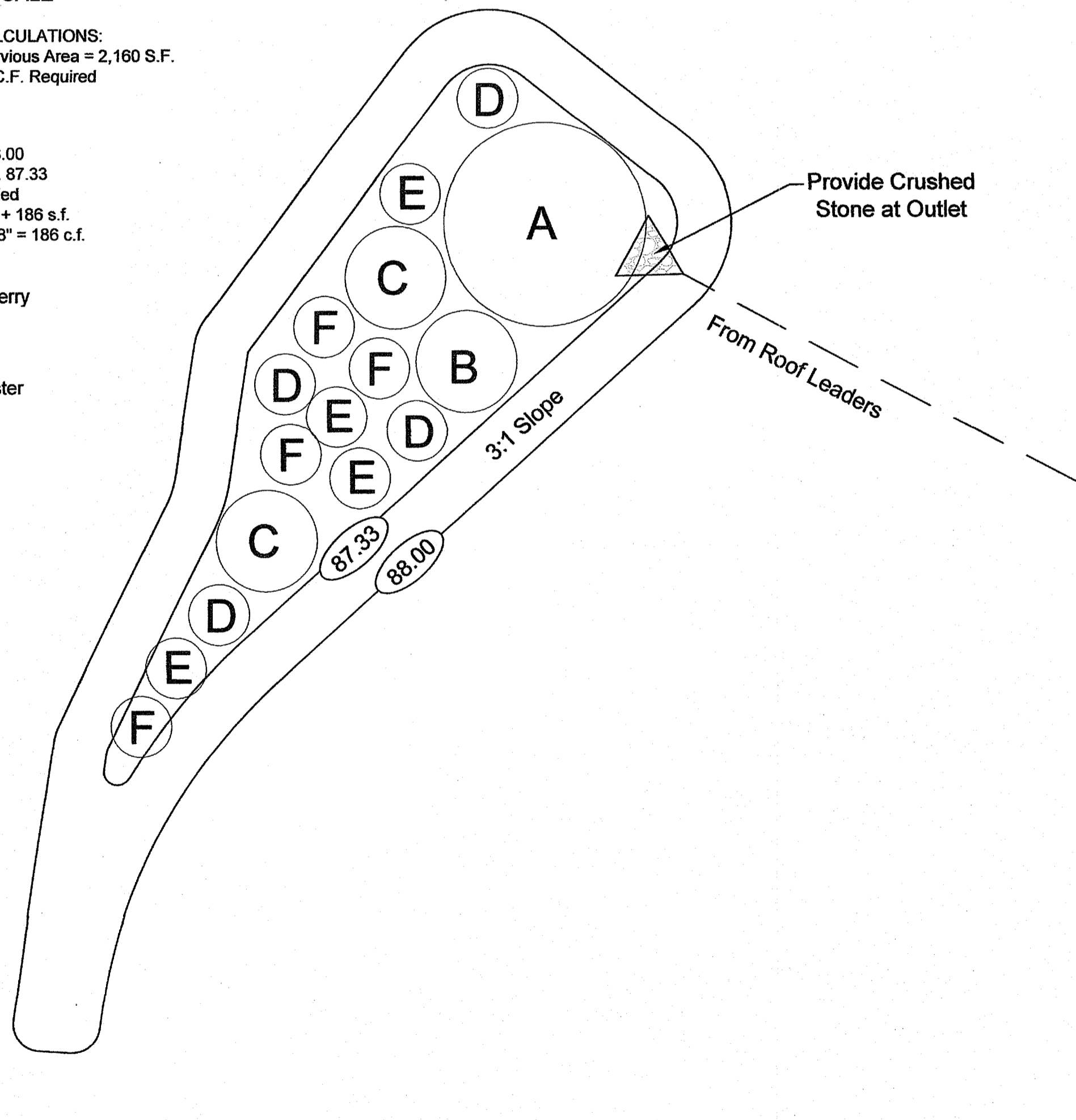
- The bottom of the rain gardens should be level to encourage the even distribution of stormwater and increase infiltration capacity.
- The rain gardens should have a 2-4 inch amended soil layer and a 2-3 inch layer of non-dyed aged shredded hardwood mulch. The mulch should be removed and replenished to original depth every year.
- The amended soil layer should be a 50/50 mixture of the excavated native soil and mature organic compost.
- A crushed stone entrance should be installed at the inflow to prevent channeling.
- A berm to detain stormwater should be constructed along the downhill side perpendicular to the slope.
- Be sure that the soil within the rain gardens does not become compacted by construction activity. If soil becomes severely compacted it may need to be filled and amended to maintain proper drainage.
- Rain gardens should be inspected following at least the first two precipitation events of at least 1.0 inch to ensure that the system is functioning properly. Thereafter, the rain garden shall be monitored and maintained by the property owner or designee to assure proper functioning, plant growth and survival. Plants shall be replaced on an as-needed basis during the growing season.
- Silt/sediment shall be removed from the rain garden when the accumulation exceeds one inch, or when water ponds on the surface for more than 48 hours. The top few inches of material shall be removed and shall be replaced with fresh soil mixture and mulch.
- Pruning or replacement of woody vegetation shall occur when dead or dying vegetation is observed.
- Soil erosion gullies shall be repaired when they occur.
- Fertilizer or pesticides shall not be applied to plants within the rain garden.
- Perennial plants and ground cover shall be replaced as necessary to maintain an adequate vegetated ground cover.
- All roof leaders are to be diverted into the proposed rain gardens.
- The rain garden should be inspected annually by the property owner or designee and maintenance provided by self or professional if needed.

RAIN GARDEN DETAIL
NOT TO SCALE

WATER QUALITY CALCULATIONS:
Proposed House Impervious Area = 2,160 S.F.
2,160 S.F. X 1" = 180 C.F. Required
186 C.F. Provided

Rain Garden:
Top of Garden Elev. 88.00
Bottom of Garden Elev. 87.33
Storage Volume Provided
369 s.f. Top of Garden + 186 s.f.
Bottom of Garden / 2 x 8" = 186 c.f.

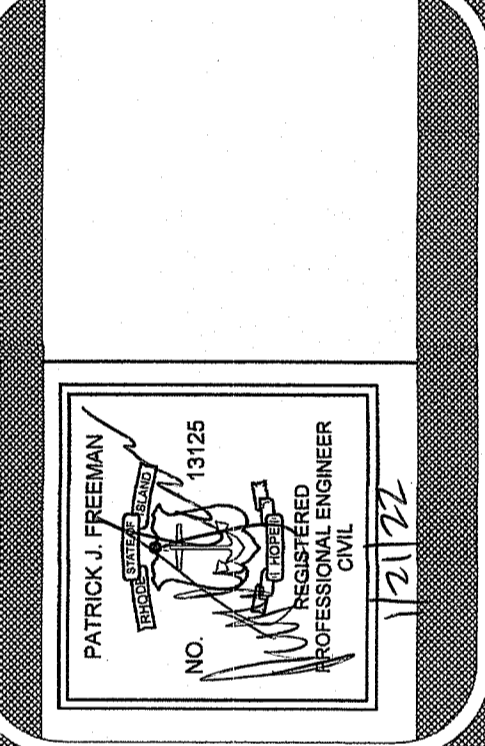
Planting Schedule:
A - Highbush Blueberry
B - Swamp Azalea
C - Sweet Fern
D - Joe Pye Weed
E - New England Aster
F - Tussock Sedge



GENERAL DETAILS FOR
JAMES O'DONOVAN
LOCATED AT
101 GONDOLA AVENUE
JAMESTOWN, RHODE ISLAND

Drawn By: **MJC** Checked By: **PJF**
Scale: **AS SHOWN** Date: **01/21/2022**

NO.	REVISION	DATE



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