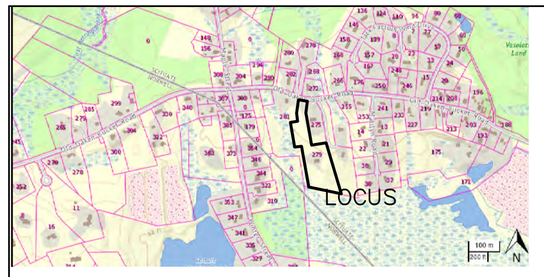


LOCUS MAP
NOT TO SCALE

BUILDING LEGEND:

1 UNIT NUMBER
Ⓐ AFFORDABLE UNIT
P=FRONT PORCH
D=REAR DECK
G=GARAGE
DW=DRIVEWAY
2br= 2 BEDROOM UNIT
3br= 3 BEDROOM UNIT

ZONING REQUIREMENTS

UPLAND LOT AREA	40,000 S.F.
LOT WIDTH	175 L.F. (Min.)
LOT FRONTAGE	100 L.F. (Min.)
FRONT SET-BACK	30 FT. (Min.)
SIDE & REAR-YARDS	15 FT. (Min.)
HEIGHT	35 FT. (Max.)
PARKING SPACES	2 EA. PER DWELLING (Min.)

MINIMUM DIMENSIONAL REQUIREMENTS

FOUNDATION TO FOUNDATION	12 FT MIN.
FOUNDATION TO DRAINAGE AREA	10 FT MIN.
FOUNDATION TO SEPTIC TANK	10 FT MIN.
SEPTIC TANK TO DRAINAGE AREA	10 FT MIN.
DRAINAGE AREA TO WETLANDS	50 FT. MIN.
GARAGE TO BACK OF SIDEWALK	21 LF MIN.
DRAINAGE AREA TO PROPERTY LINE	10 FT MIN.

IT IS RECOMMENDED THAT ALL LAYOUT BE CONFIRMED VIA SURVEY METHODOLOGY TO MAKE SURE MINIMUM DISTANCES REQUIRED ARE MAINTAINED.

MODEL LEGEND

THE LILLY COTTAGE SINGLE FAMILY, 3br

THE LILLY COTTAGE SINGLE FAMILY, 3br

BENCHMARK
TOP OF DH FOUND
ELEV =110.65 NAVD 88

**NOTE:
TOP OF INLAND BANK LOCATED BY INSTRUMENT SURVEY BY THIS FIRM ON 11 JANUARY, 2020.*

BUCKET RD.
OLD OAKEN
ROAD A
ROAD B
TOP OF INLAND BANK
INTERMITTENT STREAM
BIT CONC. DRIVE
50' BUFFER
100' BUFFER
#269-271 OLD OAKEN BUCKET ROAD
OLD OAKEN BUCKET CONDOMINIUM
DEED(MASTER) BOOK/PAGE: 6148/75
ASSESSOR'S ID: 41-1-C-1, 41-1-C-2
#275 OLD OAKEN BUCKET ROAD
N/F JOHN S. & BARBARA A. MIRAGLIA
DEED BOOK/PAGE: 21490/123
ASSESSOR'S ID: 41-1-3-B
#0 OLD OAKEN BUCKET ROAD
N/F JESSIE BRANDT
CERT#: 122647
ASSESSOR'S ID: 41-1-8-O
#297 OLD OAKEN BUCKET ROAD
N/F JESSIE BRANDT
CERT#: 122647
ASSESSOR'S ID: 41-1-9-O
#179 MAPLE ST
N/F WILLIAM J. & ELIZABETH S. O'REILLY
DEED BOOK/PAGE: 13686/334
ASSESSOR'S ID: 41-1-12-0
#354 WINTER ST
NORWELL
N/F JAMES A. COLE
DEED BOOK/PAGE: 3715/216
ASSESSOR'S ID: 50-24
LOT 8 WINTER ST
NORWELL
N/F TOWN OF NORWELL
CONSERVATION COMMISSION
DEED BOOK/PAGE: 27322/98
ASSESSOR'S ID: 50-117
#0 OLD OAKEN BUCKET ROAD
N/F POPE'S POND CRANBERRY CO.
DEED BOOK/PAGE: 10413/329
ASSESSOR'S ID: 47-1-4-C
PROP. CHAIN LINK FENCE
PROP. STOP SIGN
PROP. STREET NAME SIGN
PROP. SIDEWALK
PROP. CROSS WALK (TYP.)
PROP. RETAINING WALL (TYP.)
PROP.12" CAPE COD BERM BOTH SIDES
PROP.STREET LANTERN
PROP.YIELD TO PEDESTRIAN SIGN EACH SIDE
PROP. WETLAND ALTERATION AREA 1,458 SF
PROP. WETLAND REPLICATION AREA 1,682 SF
PROP. RESERVE AREA ACCESS 18' WIDE
ACCESS TO RESERVE AREA
SNOW STORAGE AREA
PRIMARY CONVENTIONAL 1 6,846 SF
PRIMARY CONV. 7 8,582 SF
SEPTIC RESERVE AREA FOR 72 BEDROOMS
ZONE 2/AQUIFER PROTECTION DISTRICT
FLOOD PLAIN & WATER PROTECTION DIST
DRILLHOLE FOUND HELD FOR POSITION
DRILLHOLE FOUND HELD FOR LINE
DRILLHOLE FOUND
MATCH LINE
50' TO BVW
100' TO BVW
25' TO BVW
BVW

DETAIL (NOT TO SCALE)
0.18'
DH FND.

DETAIL (NOT TO SCALE)
0.78'
0.13'
DH FND.

SCALE: 1" = 50'
50' 0 50' 80'

LOCUS INFORMATION:

ADDRESS:	#281 OLD OAKEN BUCKET ROAD
OWNER:	LOVENDALE LLC
DEED REFERENCE:	51207/171 AND 12742/65
PLAN REFERENCE:	PLAN BOOK 19, PAGE 119
ASSESSOR'S I.D.:	41-1-3-D, 41-1-3A AND 41-1-3-0
TOTAL LAND AREA:	11.21± ACRES (488,563.60± SQ. FT.)
TOTAL WETLAND AREA:	2.48± ACRES (108,248.36± SQ. FT.)
TOTAL UPLAND AREA:	8.73± ACRES (380,315.24± SQ. FT.)
BUILDING AREA:	2,000± SQ. FT.
ZONING:	RESIDENCE R-1 WATER RESOURCE PROTECTION DISTRICT
FEMA FIRM ZONE:	ZONE "X", CP #250230117K, E.D. 7-6-21

LEGEND

N\F	NOW OR FORMERLY
BK.\PG.	BOOK & PAGE
100.0	SPOT ELEVATION
⌀	UTILITY POLE
UPLP	UTILITY POLE & LIGHT POLE
⋇	HYDRANT
BVW	BORDERING VEGETATED WETLANDS

GENERAL NOTES:

1. THE COORDINATE SYSTEM IS THE MASSACHUSETTS STATE PLANE COORDINATE SYSTEM MAINLAND ZONE DATUM NAD83. THE VERTICAL DATUM IS NAVD88.

2.WETLANDS WERE DELINEATED BY ECR ON 10-4-2019.

ADDITIONAL PLAN REFERENCES:

-PLAN BOOK 18 PAGE 170
-PLAN BOOK 25 PAGE 933

TOTAL AREA OF AQUIFER OVERLAY DISTRICT =33,826.11+/- SF (0.78+/- ACS)
TOTAL BUILDING COVERAGE AREA = 47,808 SF, (1.10 ACS +/-
TOTAL PAVEMENT AREA ON SITE= 62,032 SF, (1.42 ACS +/-)
SEWERAGE ESTIMATE PER TITLE V=24 UNITS X 3 BDS X 110 GPD/BR = 7.920 GPD
TOTAL WATER DEMAND =7,920 GPD
PROPOSED PRESBY SEPTIC SYSTEM PROPOSED.

REQUIRED PARKING DIMENSIONS 10.5' X 21'
PARKING REQ. 2 SPACES PER UNIT
24 UNITS X 2 CAR GAR. X 2 DRIVEWAY SPOTS
96 SPACES OR 4 SPACES PER UNIT

LIST OF DRAWINGS

COMMONWEALTH OF MASSACHUSETTS
ANTHONY A. ESPOSITO
CIVIL
No. 39782
REGISTERED PROFESSIONAL ENGINEER

12/12/2022

REVISIONS:

No.	DESCRIPTION	DATE

PROJECT TITLE:

THE COTTAGES AT OLD OAKEN BUCKET AT #279-281 OLD OAKEN BUCKET ROAD SCITUATE, MA

COVER SHEET

PARCEL 41-1-3-D
PARCEL 41-1-3-0

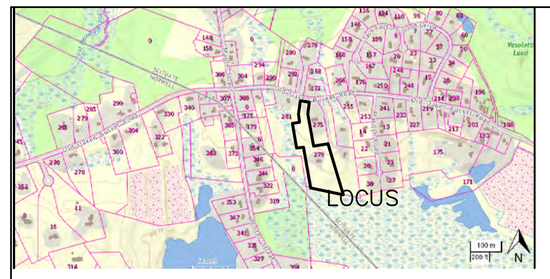
PREPARED BY:
South Shore Survey Consultants, Inc.
REGISTERED LAND SURVEYORS & CIVIL ENGINEERS
167 R SUMMER STREET
KINGSTON, MA 02364
781-582-2185
mark@sscinc.net

PREPARED FOR:
LOVENDALE , LLC
S/O SALT MEADOW DEVELOPMENT
107 EAST STREET
DUXBURY, MA 02332

SCALE: 1" = 50'
50' 0 50' 80'

DATE:	DECEMBER 12, 2022
COMP./DESIGN:	A. ESPOSITO
CHECK:	M. D. CASEY
DRAWN:	A. ESPOSITO
FIELD:	LJL/PS
APPROVED:	M. D. CASEY
DWG.No.	1908 CP
JOB No.	1908

SHEET 1 OF 16



LOCUS MAP

NOT TO SCALE

*NOTE:
TOP OF INLAND BANK LOCATED BY INSTRUMENT SURVEY BY THIS FIRM ON 11 JANUARY, 2020.

BENCHMARK
TOP OF DH FOUND
ELEV =110.65 NAVD 88

#269-271 OLD OAKEN BUCKET ROAD
OLD OAKEN BUCKET CONDOMINIUM
DEED(MASTER) BOOK/PAGE: 6148/75
ASSESSOR'S ID: 41-1-C-1, 41-1-C-2

#275 OLD OAKEN BUCKET ROAD
N/F JOHN S. & BARBARA A. MIRAGLIA
DEED BOOK/PAGE: 21490/123
ASSESSOR'S ID: 41-1-3-B

#0 OLD OAKEN BUCKET ROAD
N/F JESSIE BRANDT
CERT#: 122647
ASSESSOR'S ID: 41-1-8-O

#297 OLD OAKEN BUCKET ROAD
N/F JESSIE BRANDT
CERT#: 122647
ASSESSOR'S ID: 41-1-9-O

#179 MAPLE ST
N/F WILLIAM J. & ELIZABETH S. O'REILLY
DEED BOOK/PAGE: 13686/334
ASSESSOR'S ID: 41-1-12-0

#354 WINTER ST
NORWELL
N/F JAMES A. COLE
DEED BOOK/PAGE: 3715/216
ASSESSOR'S ID: 50-24

LOT 8 WINTER ST
NORWELL
N/F TOWN OF NORWELL
CONSERVATION COMMISSION
DEED BOOK/PAGE: 27322/98
ASSESSOR'S ID: 50-117

#0 OLD OAKEN BUCKET ROAD
N/F POPE'S POND CRANBERRY CO.
DEED BOOK/PAGE: 10413/329
ASSESSOR'S ID: 47-1-4-C

DETAIL (NOT TO SCALE)
0.78'
0.13'
DH FND.

LOCUS INFORMATION:

ADDRESS:	#281 OLD OAKEN BUCKET ROAD
OWNER:	LOVENDALE LLC
DEED REFERENCE:	51207/171 AND 12742/65
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TOTAL UPLAND AREA:	8.73± ACRES (380,315.24± SQ. FT.)
BUILDING AREA:	2,000± SQ. FT.
ZONING:	RESIDENCE R-1
FEMA FIRM ZONE:	WATER RESOURCE PROTECTION DISTRICT ZONE "X", CP #250230117K, E.D. 7-6-21

LEGEND

N\F	NOW OR FORMERLY
BK.\PG.	BOOK & PAGE
100.0	SPOT ELEVATION
⌀	UTILITY POLE
UPLP	UTILITY POLE & LIGHT POLE
⚒	HYDRANT
BVW	BORDERING VEGETATED WETLANDS

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2.WETLANDS WERE DELINEATED BY ECR ON 10-4-2019.

ADDITIONAL PLAN REFERENCES:

-PLAN BOOK 18 PAGE 170
-PLAN BOOK 25 PAGE 933

SCALE: 1" = 50'
50' 0 50' 80'

COMMONWEALTH OF MASSACHUSETTS
ANTHONY A. ESPOSITO
CIVIL
No. 39782
REGISTERED PROFESSIONAL ENGINEER

12/12/2022

REVISIONS:

No.	DESCRIPTION	DATE

PROJECT TITLE:

THE COTTAGES AT OLD OAKEN BUCKET AT #279-281 OLD OAKEN BUCKET ROAD SCITUATE, MA

EXISTING CONDITIONS PLAN

PARCEL 41-1-3-D
PARCEL 41-1-3-0

PREPARED BY:

South Shore Survey Consultants, Inc.

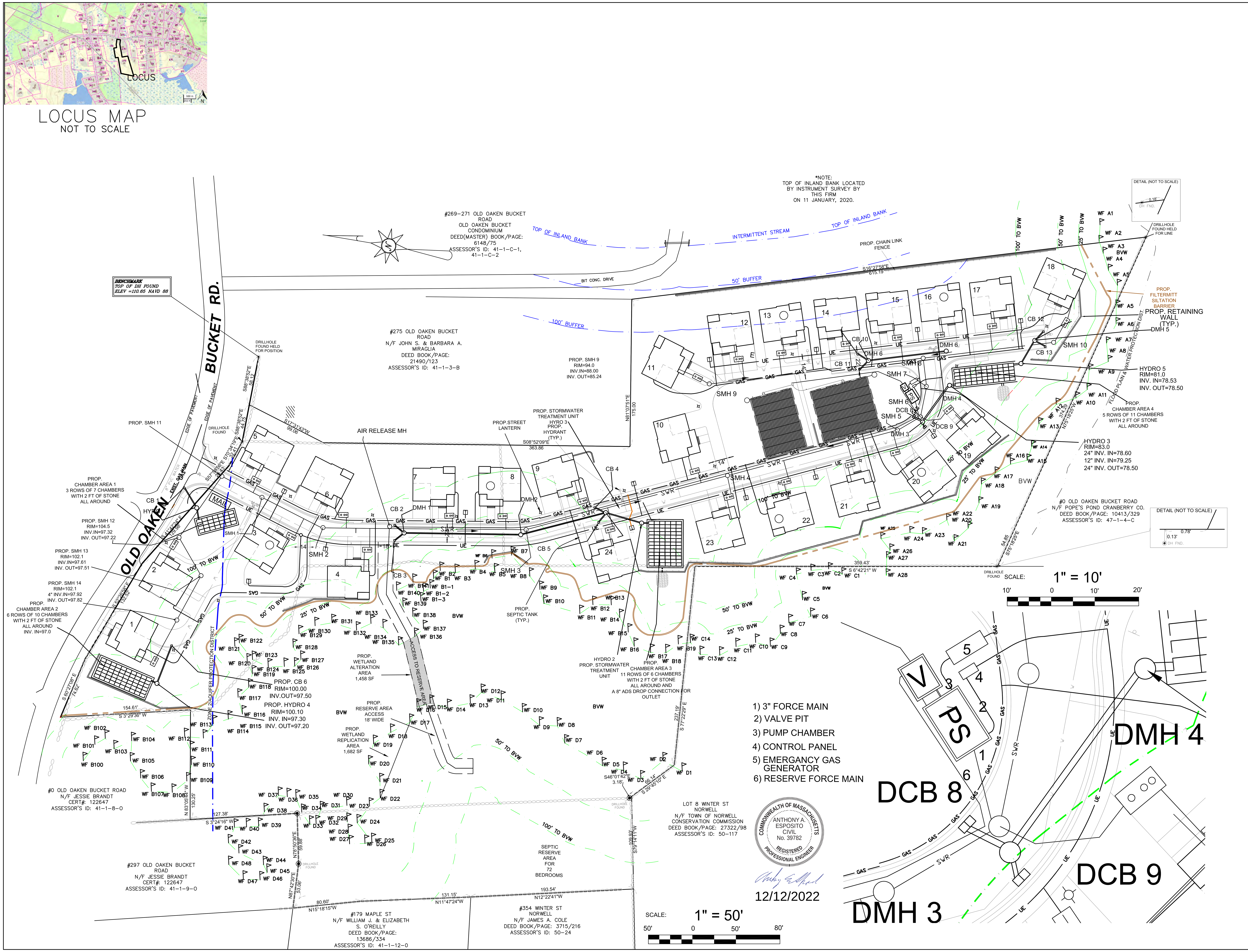
REGISTERED LAND SURVEYORS
& CIVIL ENGINEERS
167 R SUMMER STREET
KINGSTON, MA 02364
781-582-2185
mark@ssscinc.net

PREPARED FOR:

LOVENDALE , LLC
S/O SALT MEADOW DEVELOPMENT
107 EAST STREET
DUXBURY, MA 02332

SCALE: 1" = 50'
50' 0 50' 80'

DATE:	DECEMBER 12, 2022
COMP./DESIGN:	A. ESPOSITO
CHECK:	M. D. CASEY
DRAWN:	A. ESPOSITO
FIELD:	LJL/PS
APPROVED:	M. D. CASEY
DWG.No.	1908 ECP
JOB No.	1908


LOCUS MAP
NOT TO SCALE
LOCUS
BENCHMARK
TOP OF DH FOUND
ELEV =110.65 NAVD 88
OLD OAKEN
BUCKET RD.
*NOTE:
TOP OF INLAND BANK LOCATED
BY INSTRUMENT SURVEY BY
THIS FIRM
ON 11 JANUARY, 2020.
#269-271 OLD OAKEN BUCKET ROAD
OLD OAKEN BUCKET CONDOMINIUM
DEED(MASTER) BOOK/PAGE: 6148/75
ASSESSOR'S ID: 41-1-C-1, 41-1-C-2
#275 OLD OAKEN BUCKET ROAD
N/F JOHN S. & BARBARA A. MIRAGLIA
DEED BOOK/PAGE: 21490/123
ASSESSOR'S ID: 41-1-3-B
#0 OLD OAKEN BUCKET ROAD
N/F JESSIE BRANDT
CERT#: 122647
ASSESSOR'S ID: 41-1-8-0
#297 OLD OAKEN BUCKET ROAD
N/F JESSIE BRANDT
CERT#: 122647
ASSESSOR'S ID: 41-1-9-0
#179 MAPLE ST
N/F WILLIAM J. & ELIZABETH S. O'REILLY
DEED BOOK/PAGE: 13686/334
ASSESSOR'S ID: 41-1-12-0
#354 WINTER ST
NORWELL
N/F JAMES A. COLE
DEED BOOK/PAGE: 3715/216
ASSESSOR'S ID: 50-24
LOT 8 WINTER ST
NORWELL
N/F TOWN OF NORWELL
CONSERVATION COMMISSION
DEED BOOK/PAGE: 27322/98
ASSESSOR'S ID: 50-117
#0 OLD OAKEN BUCKET ROAD
N/F POPE'S POND CRANBERRY CO.
DEED BOOK/PAGE: 10413/329
ASSESSOR'S ID: 47-1-4-C
PROP. CHAMBER AREA 1
3 ROWS OF 7 CHAMBERS
WITH 2 FT OF STONE
ALL AROUND
PROP. CHAMBER AREA 2
6 ROWS OF 10 CHAMBERS
WITH 2 FT OF STONE
ALL AROUND
INV. IN=97.0
PROP. CHAMBER AREA 3
11 ROWS OF 6 CHAMBERS
WITH 2 FT OF STONE
ALL AROUND AND
A 8" ADS DROP CONNECTION FOR OUTLET
PROP. CHAMBER AREA 4
5 ROWS OF 11 CHAMBERS
WITH 2 FT OF STONE
ALL AROUND
PROP. SMH 11
PROP. SMH 12
RIM=104.5
INV.IN=97.32
INV. OUT=97.22
PROP. SMH 13
RIM=102.1
INV.IN=97.61
INV. OUT=97.51
PROP. SMH 14
RIM=102.1
4" INV.IN=97.92
INV. OUT=97.82
PROP. SMH 9
RIM=94.0
INV.IN=88.00
INV. OUT=85.24
PROP. CB 6
RIM=100.00
INV.OUT=97.50
PROP. HYDRO 4
RIM=100.10
INV. IN=97.30
INV. OUT=97.20
HYDRO 2
PROP. STORMWATER
TREATMENT UNIT
PROP. STORMWATER
TREATMENT UNIT
HYRO 3
PROP. HYDRANT (TYP.)
PROP. STREET LANTERN
AIR RELEASE MH
PROP. SEPTIC TANK (TYP.)
HYDRO 3
RIM=83.0
24" INV. IN=78.60
12" INV. IN=79.25
24" INV. OUT=78.50
HYDRO 5
RIM=81.0
INV. IN=78.53
INV. OUT=78.50
PROP. FILTERMITT SILTATION BARRIER
PROP. RETAINING WALL (TYP.)
PROP. CHAIN LINK FENCE
PROP. WETLAND ALTERATION AREA
1,458 SF
PROP. RESERVE AREA ACCESS
18' WIDE
PROP. WETLAND REPLICATION AREA
1,682 SF
SEPTIC RESERVE AREA FOR 72 BEDROOMS
ZONE 2 AQUIFER PROTECTION DISTRICT
FLOOD PLAIN & WATER PROTECTION DIST.
TOP OF INLAND BANK
INTERMITTENT STREAM
50' BUFFER
100' BUFFER
100' TO BVW
50' TO BVW
25' TO BVW
DETAIL (NOT TO SCALE)
SCALE: 1" = 10'
SCALE: 1" = 50'
1) 3" FORCE MAIN
2) VALVE PIT
3) PUMP CHAMBER
4) CONTROL PANEL
5) EMERGANCY GAS GENERATOR
6) RESERVE FORCE MAIN
DCB 8
DCB 9
DMH 3
DMH 4
COMMONWEALTH OF MASSACHUSETTS
ANTHONY A. ESPOSITO
CIVIL
No. 39782
REGISTERED PROFESSIONAL ENGINEER
12/12/2022

REVISIONS:

No.	DESCRIPTION	DATE

PROJECT TITLE:

THE COTTAGES AT OLD OAKEN BUCKET AT #279-281 OLD OAKEN BUCKET ROAD SCITUATE, MA

UTILITY LAYOUT PLAN

PARCEL 41-1-3-D
PARCEL 41-1-3-0

PREPARED BY:

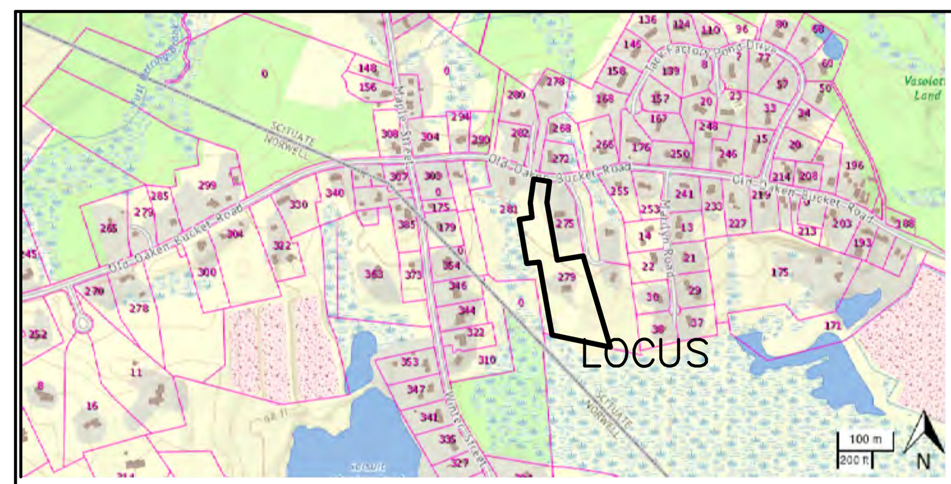
South Shore Survey Consultants, Inc.
REGISTERED LAND SURVEYORS & CIVIL ENGINEERS
167 R SUMMER STREET
KINGSTON, MA 02364
781-582-2185
mark@sssinc.net

PREPARED FOR:

LOVENDALE, LLC
S/O SALT MEADOW DEVELOPMENT
107 EAST STREET
DUXBURY, MA 02332

SCALE: 1" = 50'

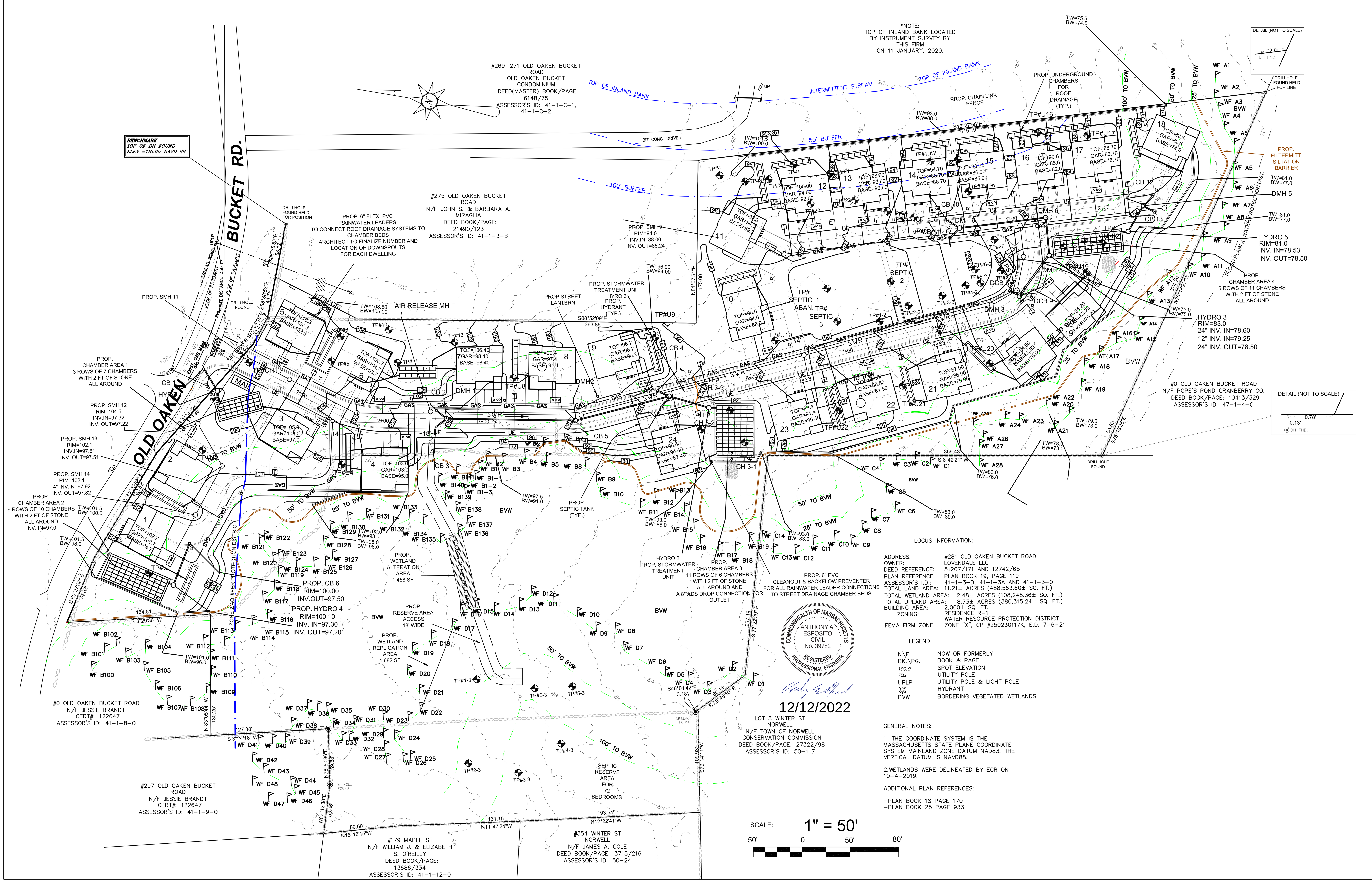
DATE:	DECEMBER 12, 2022
COMP./DESIGN:	A. ESPOSITO
CHECK:	M. D. CASEY
DRAWN:	A. ESPOSITO
FIELD:	LJL/PS
APPROVED:	M. D. CASEY
DWG.No.	1908 SP
JOB No.	1908



LOCUS MAP NOT TO SCALE

UTILITY LEGEND:

- SEWER LINE
- DRAINAGE LINE
- UNDERGROUND ELEC/TEL/CABLE
- WATER LINE
- GAS LINE
- MANHOLE
- CATCH BASIN
- HYDRANT
- WATER VALVE
- TRANSFORMER
- RETAINING WALL


OLD OAKEN BUCKET RD.
BENCHMARK
TOP OF DH FOUND
ELEV =110.65 NAVD 88
*NOTE:
TOP OF INLAND BANK LOCATED
BY INSTRUMENT SURVEY BY
THIS FIRM
ON 11 JANUARY, 2020.
INTERMITTENT STREAM
TOP OF INLAND BANK
50' BUFFER
100' BUFFER
ZONE 2 AQUIFER PROTECTION DISTRICT
ACCESS TO RESERVE AREA
FLOOD PLAIN & WATER PROTECTION DIST.
#269-271 OLD OAKEN BUCKET
ROAD
OLD OAKEN BUCKET
CONDOMINIUM
DEED(MASTER) BOOK/PAGE:
6148/75
ASSESSOR'S ID: 41-1-C-1,
41-1-C-2
#275 OLD OAKEN BUCKET
ROAD
N/F JOHN S. & BARBARA A.
MIRAGLIA
DEED BOOK/PAGE:
21490/123
ASSESSOR'S ID: 41-1-3-B
PROP. 6" FLEX. PVC
RAINWATER LEADERS
TO CONNECT ROOF DRAINAGE SYSTEMS TO
CHAMBER BEDS
ARCHITECT TO FINALIZE NUMBER AND
LOCATION OF DOWNSPOUTS
FOR EACH DWELLING
AIR RELEASE MH
PROP. STORMWATER
TREATMENT UNIT
HYRO 3
PROP. HYDRANT
(TYP.)
PROP STREET
LANTERN
PROP. CHAIN LINK
FENCE
PROP. UNDERGROUND
CHAMBERS
FOR
ROOF
DRAINAGE
(TYP.)
PROP.
FILTERMITT
SILTATION
BARRIER
HYDRO 5
RIM=81.0
INV. IN=78.53
INV. OUT=78.50
PROP.
CHAMBER AREA 4
5 ROWS OF 11 CHAMBERS
WITH 2 FT OF STONE
ALL AROUND
HYDRO 3
RIM=83.0
24" INV. IN=78.60
12" INV. IN=79.25
24" INV. OUT=78.50
#0 OLD OAKEN BUCKET ROAD
N/F POPE'S POND CRANBERRY CO.
DEED BOOK/PAGE: 10413/329
ASSESSOR'S ID: 47-1-4-C
PROP.
CHAMBER AREA 1
3 ROWS OF 7 CHAMBERS
WITH 2 FT OF STONE
ALL AROUND
PROP. SMH 11
PROP. SMH 12
RIM=104.5
INV.IN=97.32
INV. OUT=97.22
PROP. SMH 13
RIM=102.1
INV.IN=97.61
INV. OUT=97.51
PROP. SMH 14
RIM=102.1
4" INV.IN=97.92
INV. OUT=97.82
PROP.
CHAMBER AREA 2
6 ROWS OF 10 CHAMBERS
WITH 2 FT OF STONE
ALL AROUND
INV. IN=97.0
PROP. CB 6
RIM=100.00
INV.OUT=97.50
PROP. HYDRO 4
RIM=100.10
INV. IN=97.30
INV. OUT=97.20
PROP.
WETLAND
ALTERATION
AREA
1,458 SF
PROP.
RESERVE AREA
ACCESS
18' WIDE
PROP.
WETLAND
REPLICATION
AREA
1,682 SF
PROP.
SEPTIC TANK
(TYP.)
HYDRO 2
PROP. STORMWATER
TREATMENT
UNIT
PROP.
CHAMBER AREA 3
11 ROWS OF 6 CHAMBERS
WITH 2 FT OF STONE
ALL AROUND AND
A 8" ADS DROP CONNECTION FOR
OUTLET
PROP. 6" PVC
CLEANOUT & BACKFLOW PREVENTER
FOR ALL RAINWATER LEADER CONNECTIONS
TO STREET DRAINAGE CHAMBER BEDS.
SEPTIC
RESERVE
AREA
FOR
72
BEDROOMS
#0 OLD OAKEN BUCKET ROAD
N/F JESSIE BRANDT
CERT#: 122647
ASSESSOR'S ID: 41-1-8-0
#297 OLD OAKEN BUCKET
ROAD
N/F JESSIE BRANDT
CERT#: 122647
ASSESSOR'S ID: 41-1-9-0
#179 MAPLE ST
N/F WILLIAM J. & ELIZABETH
S. O'REILLY
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13686/334
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COMMONWEALTH OF MASSACHUSETTS
ANTHONY A.
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CIVIL
No. 39782
REGISTERED
PROFESSIONAL ENGINEER
12/12/2022

LOCUS INFORMATION:

ADDRESS:	#281 OLD OAKEN BUCKET ROAD
OWNER:	LOVENDALE LLC
DEED REFERENCE:	51207/171 AND 12742/65
PLAN REFERENCE:	PLAN BOOK 19, PAGE 119
ASSESSOR'S I.D.:	41-1-3-D, 41-1-3A AND 41-1-3-0
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BUILDING AREA:	2,000± SQ. FT.
ZONING:	RESIDENCE R-1 WATER RESOURCE PROTECTION DISTRICT
FEMA FIRM ZONE:	ZONE "X", CP #250230117K, E.D. 7-6-21

LEGEND

N\F	NOW OR FORMERLY
BK.\PG.	BOOK & PAGE
100.0	SPOT ELEVATION
(symbol)	UTILITY POLE
UPLP	UTILITY POLE & LIGHT POLE
(symbol)	HYDRANT
BVW	BORDERING VEGETATED WETLANDS

GENERAL NOTES:

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2. WETLANDS WERE DELINEATED BY ECR ON 10-4-2019.

ADDITIONAL PLAN REFERENCES:

- PLAN BOOK 18 PAGE 170
- PLAN BOOK 25 PAGE 933

SCALE: 1" = 50'

50' 0 50' 80'

FOR REGISTRY USE ONLY

PROJECT TITLE:

THE COTTAGES AT OLD OAKEN BUCKET AT #279-281 OLD OAKEN BUCKET ROAD SCITUATE, MA

GRADING & DRAINAGE PLAN

PARCEL 41-1-3-D
PARCEL 41-1-3-0

PREPARED BY:

South Shore Survey Consultants, Inc.

REGISTERED LAND SURVEYORS & CIVIL ENGINEERS
167 R SUMMER STREET
KINGSTON, MA 02364
781-582-2185
mark@ssscinc.net

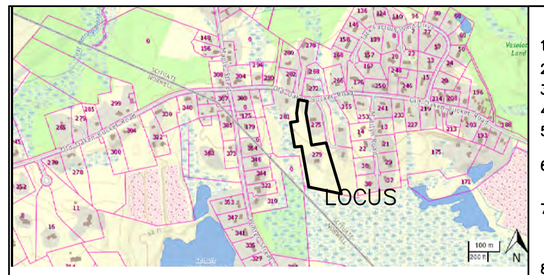
PREPARED FOR:

LOVENDALE, LLC
S/O SALT MEADOW DEVELOPMENT
107 EAST STREET
DUXBURY, MA 02332

SCALE: 1" = 50'

50' 0 50' 80'

DATE: DECEMBER 12, 2022
COMP./DESIGN: A. ESPOSITO
CHECK: M. D. CASEY
DRAWN: A. ESPOSITO
FIELD: LJL/PS
APPROVED: M. D. CASEY
DWG.No. 1908 SP
JOB No. 1908



LOCUS MAP
NOT TO SCALE

PHASE OF CONSTRUCTION:

1. CONSTRUCT GRAVITY SEWER MAIN
2. COMMENCE ROUGH GRADING OF MAIN DRIVES
3. CONSTRUCT DRAINAGE INFRASTRUCTURE
4. CONSTRUCT WATER MAIN
5. INSTALL SEWER AND WATER SERVICE STUBS OFF ROAD.
6. COMMENCE WORK ON SEPTIC SYSTEM AND PUMP STATION.
7. COMMENCE INSTALLATION OF UTILITYS INCLUDING GAS, ELECTRIC, CABLE AND INTERNET CONDUIT AND PEDESTALS.
8. FINAL GRADING OF DRIVES AND BASE COAT PAVING TO BE PROVIDED. FINAL HOOK UP OF PUMP STATION AND SEPTIC SYSTEM.
9. COMMENCE DWELLING CONSTRUCTION WHICH INCLUDES INSTALLATION OF SEPTIC TANKS, UTILITY, WATER AND SEWER CONNECTIONS AND ROOF DRAINAGE SYSTEMS.
10. FINAL PAVING AND LANDSCAPING

EROSION CONTROL NOTES

THE SITE CONTRACTOR AND THE OWNER SHALL BE RESPONSIBLE FOR THE OPERATIONS AND MAINTENANCE SCHEDULE, (O&M), DURING THE CONSTRUCTION PHASE. THE OUTLINE BELOW SHOULD BE ADHERED TO AS CLOSELY AS POSSIBLE TO ENSURE THE PROPER CONSTRUCTION AND TO ENSURE THE PROPER CONSTRUCTION AND FUNCTION OF THE DRAINAGE SYSTEM. A CONSTRUCTION PERIOD STORMWATER POLLUTION PREVENTION PLAN PER US EPA NPDES REQUIREMENTS SHALL BE PREPARED PRIOR TO COMMENCE OF CONSTRUCTION.

1. PRIOR TO CONSTRUCTION EROSION CONTROL DEVICES SHALL BE INSTALLED PER THE APPROVED PLANS. EROSION CONTROL BARRIERIS SHALL BE INSPECTED PRIOR TO LARGE STORM EVENTS TO ENSURE THAT THE EROSION CONTROL WILL FUNCTION AS REQUIRED AND FOLLOWING A STORM TO INSPECT FOR DAMAGE TO THE EROSION CONTROL ELEMENTS. ANY DAMAGE OR IMPROPER INSTALLATION THAT IS NOTICED PRIOR TO OR FOLLING A STORM EVENT SHALL BE PROMPTLY REPLACED OR REPAIRED IN A SATISFACTORY MANNER SO AS TO PREVENT SEDIMENT FROM BYPASSING EROSION CONTROL BARRIERS.

2. IN CONJUNCTION WITH THE SITE CONSTRUCTION, ALL DRAINAGE STRUCTURES INCLUDING CATCH BASINS, STORM TRAPS AND INFILTRATION CHAMBER BEDS SHALL BE CONSTRUCTED AND STABILIZED AS SOON AS POSSIBLE, CATCH BASINS SHALL BE PROTECTED WITH SILT SACKS AS SHOWN ON THE DETAIL.

3. THE CATCH BASINS AND STORM TRAPS SHALL BE INSPECTED WEEKLY DURING CONSTRUCTION. ANY SEDIMENT BUILDUP OF EIGHT, (8) INCHES OR MORE IN ANY OF THE STRUCTURES SHALL BE PROMPTLY REMOVED BY HAND OR MECHANICAL METHODS AND ALL DEBRIS REMOVED SHALL BE DISPOSED OF IN ACCORDANCE WITH ALL LOCAL, STATE AND FEDERAL REGULATIONS. PROTECT CATCH BASINS FROM RECIEVING SEDIMENT LADEN STORM RUNOFF THAT MAY CLOG UNDERGROUND INFILTRATION SYSTEMS BY GRADING A GRAVEL SUBBASE AWAY FROM THESE INLETS PRIOR TO PAVING.

4. THE SITE SHALL BE INSPECTED WEEKLY OR AFTER ALL RAINFALL EVENTS GREATER THAN ½ INCH OF RAINFALL DEPTH, WHICHEVER OCCURS SOONER. ANY EROSION SHALL BE FILLED AND RESTABILIZED IN A MANNER TO PREVENT FURTHER EROSION.

5.THE CONTRACTOR MAY SELECT FROM THOSE DETAILED FOR INDIVIDUAL AREAS THAT MAY BEST FIT HIS/HER CONSTRUCTION OPERATIONS WHILE STILL MAINTAINING PROTECTIONS THAT MEET ALL CONTRACT AND REGULATORY REQUIREMENTS.

6. ALL AREAS DISTURBED BY CONSTRUCTION ACTIVITIES, WHETHER INSIDE THE CONTRACT LIMIT LINE OR BEYOND, NOT COVERED BY BUILDINGS OR PAVEMENTS SHALL BE TOPSOILED AND SEEDED AS LAWN.

7. THE CONTRACTOR SHALL MONITOR ALL NEW AND MODIFIED DRAINAGE STRUCTURES SUMPS WITHIN THE CONTRACT LIMITS AND SHALL PUMP SUMPS CLEAN OF SILT AND DEBRIS WHEN MORE THAN HALF FULL AND/OR IMMEDIATELY PRIOR TO FINAL ACCEPTANCE.

8. AREAS THAT ARE NOT THE LOCATION OF ACTIVE CONSTRUCTION WHICH ARE LEFT BARE FOR OVER A MONTH BEFORE FINISHED GRADING AND SEEDING IS ACHIEVED, SHALL BE MULCHED OR RECIEVE TEMPORARY STABILIZATION SUCH AS JUTE MATTING OR RECIEVE A TEMPORARY SEEDING OF PERRENIAL RYE GRASS APPLIED AT A RATE OF 2 LBS/1,000 SF LIMESTONE, (EQUIVALENT TO BE 50 % CALCIUM PLUS MAGNESIUM OXIDE) SHALL BE APPLIED AS SEEDBED PREPARATION AT A RATE OF 90 LBS/1,000 SF PLANTING SEASONS SHALL BE APRIL 1 TO JUNE 1 AND AUGUST 1 TO OCTOBER 1, AREAS TO BE LEFT BARE BEFORE FINISH GRADING AND SEEDING OUTSIDE OF PLANTING SEASONS SHALL RECIEVE AN AIR-DRIED WOOD CHIP MULCH, FREE OF COARSE MATTER.

9. STABILIZATION OF SLOPES IN CUT AREAS, (USING MULCH OR GRASS) AND THE INSTALLATION OF THE CONTROL LINE, (FILTERMITT OR SILT FENCE) AT THE TOE OF SLOPE SHALL BE INITIATED WITHIN FOURTEEN (14) DAYS OF COMPLETION.

10. SEDIMENT REMOVED FROM CONTROL STRUCTURES WILL BE DISPOSED IN A MATTER WHICH IS CONSISTENT WITH THE INTENT OF THE PLAN. ALL LINEAR EROSION CONTROLS RETAINING SEDIMENT OVER ½ THEIR HEIGHT SHALL HAVE SEDIMENT REMOVED AND ALL DAMAGED EROSION CONTROLS SHALL BE REPAIRED OR REPLACED.

11.THE CONTRACTOR WILL BE ASSIGNED THE RESPONSIBILITY FOR IMPLEMENTING THIS EROSION AND SEDIMENT CONTROL PLAN. THIS RESPONSIBILITY INCLUDES THE INSTALLATION AND MAINTENANCE OF CONTROL MEASURES , INFORMING ALL PARTIES ENGAGED ON THE SITE CONSTRUCTION SIDE OF THE REQUIREMENTS AND OBJECTIVES OF THE PLAN.

12. STOCKPILES OF SOIL SHALL BE SURROUNDED BY AN EROSION CONTROL BARRIER. SOIL STOCKPILES TO BE LEFT BARE FOR MORE THAN FOURTEEN (14) DAYS SHALL BE STABILIZED WITH TEMPORARY VEGETATION OR MULCH. IF SOIL STOCKPILES ARE TO REMAIN FOR MORE THAN SIXTY (60) DAYS, FILTERMITT SHALL BE USED. SIDE SLOPES SHOULD NOT EXCEED 2:1.

13. THE COTRACTOR SHALL BE RESPONSIBLE TO CONTROL DUST AND WIND EROSION THROUGHOUT THE LIFE OF THE CONTRACT. DUST CONTROL SHALL INCLUDE, BUT NOT LIMITED TO SPRINKLING OF WATER OF EXPOSED SOILS AND HAUL ROADS. CONTRACTOR SHALL CONTROL DUST TO PREVENT A HAZARD TO TRAFFIC.

*NOTE:
TOP OF INLAND BANK LOCATED BY INSTRUMENT SURVEY BY THIS FIRM ON 11 JANUARY, 2020.

BENCHMARK
TOP OF DH FOUND
ELEV =110.65 NAVD 88

#269-271 OLD OAKEN BUCKET ROAD
OLD OAKEN BUCKET CONDOMINIUM
DEED(MASTER) BOOK/PAGE: 6148/75
ASSESSOR'S ID: 41-1-C-1, 41-1-C-2

#275 OLD OAKEN BUCKET ROAD
N/F JOHN S. & BARBARA A. MIRAGLIA
DEED BOOK/PAGE: 21490/123
ASSESSOR'S ID: 41-1-3-B

#0 OLD OAKEN BUCKET ROAD
N/F JESSIE BRANDT
CERT#: 122647
ASSESSOR'S ID: 41-1-8-O

#297 OLD OAKEN BUCKET ROAD
N/F JESSIE BRANDT
CERT#: 122647
ASSESSOR'S ID: 41-1-9-O

#179 MAPLE ST
N/F WILLIAM J. & ELIZABETH S. O'REILLY
DEED BOOK/PAGE: 13686/334
ASSESSOR'S ID: 41-1-12-0

#354 WINTER ST
NORWELL
N/F JAMES A. COLE
DEED BOOK/PAGE: 3715/216
ASSESSOR'S ID: 50-24

LOT 8 WINTER ST
NORWELL
N/F TOWN OF NORWELL
CONSERVATION COMMISSION
DEED BOOK/PAGE: 27322/98
ASSESSOR'S ID: 50-117

#0 OLD OAKEN BUCKET ROAD
N/F POPE'S POND CRANBERRY CO.
DEED BOOK/PAGE: 10413/329
ASSESSOR'S ID: 47-1-4-C

BUCKET RD.
OLD OAKEN
ROAD A
ROAD B
TOP OF INLAND BANK
INTERMITTENT STREAM
BIT CONC. DRIVE
REMOVE EXIST. ELEC. SERVICE
50' BUFFER
100' BUFFER
DRILLHOLE FOUND HELD FOR POSITION
DRILLHOLE FOUND
DRILLHOLE FOUND HELD FOR LINE
EDGE OF PAVEMENT
TEMPORARY CONSTRUCTION ENTRANCE PAD 50 FT DEEP OFF EXIST. EOP.
PROVIDE SILT SACK BAGS FOR ALL CATCHBASINS DURING CONSTRUCTION
DEMOLISH 281 OLD OAKEN BUCKET RD AND SEPTIC SYSTEM IN ACCORDANCE OF TITLE 5.
STOCKPILES SHALL BE PROVIDED WITH STRAW WATTLES AROUND ITS PERIMETER TO PROTECT RESOURCE AREAS
TEMPORARY STOCKPILE AREA
6" X 15'W X 50'L LAYER OF GRAVEL FOR REFUELING, PARKING AND MATERIAL STAGING
PROP.STREET LANTERN
PROP. STORMWATER TREATMENT UNIT HYRO 3
PROP. CHAMBER AREA 1 3 ROWS OF 7 CHAMBERS WITH 2 FT OF STONE ALL AROUND
PROP. CHAMBER AREA 2 6 ROWS OF 10 CHAMBERS WITH 2 FT OF STONE ALL AROUND INV. IN=97.0
PROP. CHAMBER AREA 3 11 ROWS OF 6 CHAMBERS WITH 2 FT OF STONE ALL AROUND AND A 8" ADS DROP CONNECTION FOR OUTLET
PROP. CHAMBER AREA 4 5 ROWS OF 11 CHAMBERS WITH 2 FT OF STONE ALL AROUND
PROP. CB 6 RIM=100.00 INV.OUT=97.50
PROP. HYDRO 4 RIM=100.10 INV. IN=97.30 INV. OUT=97.20
HYDRO 2 PROP. STORMWATER TREATMENT UNIT
HYDRO 3 RIM=83.0 24" INV. IN=78.60 12" INV. IN=79.25 24" INV. OUT=78.50
HYDRO 5 RIM=81.0 INV. IN=78.53 INV. OUT=78.50
PROP. WETLAND ALTERATION AREA 1,458 SF
PROP. WETLAND REPLICATION AREA 1,682 SF
PROP. RESERVE AREA ACCESS 18' WIDE
ACCESS TO RESERVE AREA
ZONE 2/AQUIFER PROTECTION DISTRICT
FLOOD PLAIN & WATER PROTECTION DIST
PROP. FILTERMITT SILTATION BARRIER
TEMPORY 3 FT. DEEP SEDIMENTATION AND DEWATERING LOCATION, SEE DETAIL
5X5 CONCRETE WASHOUT STATION
CB 1 CB 2 CB 3 CB 4 CB 5 CB 10 CB 11 CB 12 CB 13
DMH 1 DMH 2 DMH 3 DMH 4 DMH 5 DMH 6
DCB 8 DCB 9
MAIN
100' TO BVW
50' TO BVW
25' TO BVW
BVW
WF A1 WF A2 WF A3 WF A4 WF A5 WF A6 WF A7 WF A8 WF A9 WF A10 WF A11 WF A12 WF A13 WF A14 WF A15 WF A16 WF A17 WF A18 WF A19 WF A20 WF A21 WF A22 WF A23 WF A24 WF A25 WF A26 WF A27 WF A28
WF B1 WF B1-1 WF B1-2 WF B1-3 WF B2 WF B3 WF B4 WF B5 WF B6 WF B7 WF B8 WF B9 WF B10 WF B11 WF B12 WF B13 WF B14 WF B15 WF B16 WF B17 WF B18 WF B19 WF B100 WF B101 WF B102 WF B103 WF B104 WF B105 WF B106 WF B107 WF B108 WF B109 WF B110 WF B111 WF B112 WF B113 WF B114 WF B115 WF B116 WF B117 WF B118 WF B119 WF B120 WF B121 WF B122 WF B123 WF B124 WF B125 WF B126 WF B127 WF B128 WF B129 WF B130 WF B131 WF B132 WF B133 WF B134 WF B135 WF B136 WF B137 WF B138 WF B139 WF B140
WF C1 WF C2 WF C3 WF C4 WF C5 WF C6 WF C7 WF C8 WF C9 WF C10 WF C11 WF C12 WF C13 WF C14
WF D1 WF D2 WF D3 WF D4 WF D5 WF D6 WF D7 WF D8 WF D9 WF D10 WF D11 WF D12 WF D13 WF D14 WF D15 WF D16 WF D17 WF D18 WF D19 WF D20 WF D21 WF D22 WF D23 WF D24 WF D25 WF D26 WF D27 WF D28 WF D29 WF D30 WF D31 WF D32 WF D33 WF D34 WF D35 WF D36 WF D37 WF D38 WF D39 WF D40 WF D41 WF D42 WF D43 WF D44 WF D45 WF D46 WF D47 WF D48

DETAIL (NOT TO SCALE)
0.18'
DH FND.

DETAIL (NOT TO SCALE)
0.78'
0.13'
DH FND.

EROSION CONTROL NOTES CONT.

15. WHERE DEWATERING ACTIVITIES IS NECESSARY, THERE SHALL NOT BE DIRECT DISCHARGE TO WETLANDS OR WATERCOURSES, PROPER METHODS AND DEVICES SHALL BE UTILIZED TO THE EXTENT PERMITTED BY LAW, SUCH AS PUMPING WATER INTO A TEMPORARY SEDIMENTATION BASIN, PROVIDING SURGE PROTECTION AT THE INLET AND THE OUTLET OF PUMPS, OR FLOATING THE INTAKE OF THE PUMP. OR OTHER METHODS TO MINIMIZE AND RETAIN THE SUSPENDED SOLIDS. IF A PUMPING OPERATION IS CAUSING TURBIDITY PROBLEMS, SAID OPERATION SHALL CEASE UNTIL SUCH TIME IS FEASIBLE, MEANS OF CONTROLLING TURBIDITY ARE DETERMINED AND IMPLEMENTED. SAID DISCHARGE POINTS SHALL BE LOCATED OVER 100 FT FROM THE DELINEATED WETLANDS AS INDICATED ON THIS PLAN.

16. LOCATION OF PERMANENT DRYWELLS SHALL NOT BE USED FOR SEDIMENT CONTROL. CONCRETE WASHOUT AREA, MATERIAL STOCKPILING, OR EQUIPMENT STAGING/STORAGE AREAS DURING CONSTRUCTION.

17. CATCH BASINS AND LAWN DRAINS SHALL BE PROTECTED WITH SEDIMENT CONTROL STRUCTURES AND REMAIN OFF-LINE AND INOPERABLE UNTIL THE BINDER COURSE OF PAVEMENT IS INSTALLED AND THE CONTRIBUTING DRAINAGE AREA IS STABILIZED. STORMWATER RUOFF SHALL BE DIRECTED TO TEMPORARY SEDIMENT TRAPS DURING INITAL CONSTRUCTION STAGES.

18. THE CONTRACTOR MAY PROVIDE ALTERNATE LOCATIONS OR PROVIDE ADDITIONAL STOCKPILE AREAS PROVIDED THEY ARE PROVIDED FILTERMITT FOR EROSION CONTROL AND THE STOCKPILE LOCATIONS NOT BE ON CHAMBER BED OR SEPTIC SYSTEM LOCATIONS OR WITHIN 25 FT OF WETLAND RESOURCE AREAS.

TEMPORARY SEDIMENTATION CALCULATION
TYPICALLY 3600 CF OF STORAGE PER ROAD AREA ACRE
1300 LF X 34 FT WIDE X 1/43,560 X 3,600 CF = 3,653 CF
(3,724 SF + 2,519)/2 X 3 FT DEEP = 9,364.5 CF PROVIDED

COMMONWEALTH OF MASSACHUSETTS
ANTHONY A. ESPOSITO
CIVIL
No. 39782
REGISTERED PROFESSIONAL ENGINEER

12/12/2022

SCALE: 1" = 50'
50' 0 50' 80'

REVISIONS:

No.	DESCRIPTION	DATE

PROJECT TITLE:

THE COTTAGES AT OLD OAKEN BUCKET AT #279-281 OLD OAKEN BUCKET ROAD SCITUATE, MA

EROSION CONTROL PLAN

PARCEL 41-1-3-D
PARCEL 41-1-3-0

PREPARED BY:
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REGISTERED LAND SURVEYORS & CIVIL ENGINEERS
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SCALE: 1" = 50'
50' 0 50' 80'

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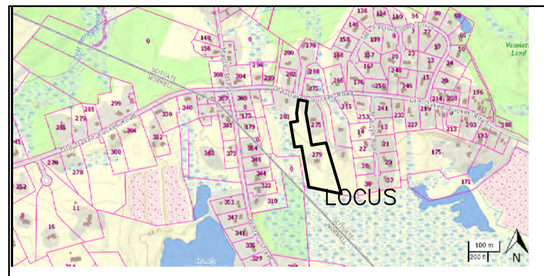
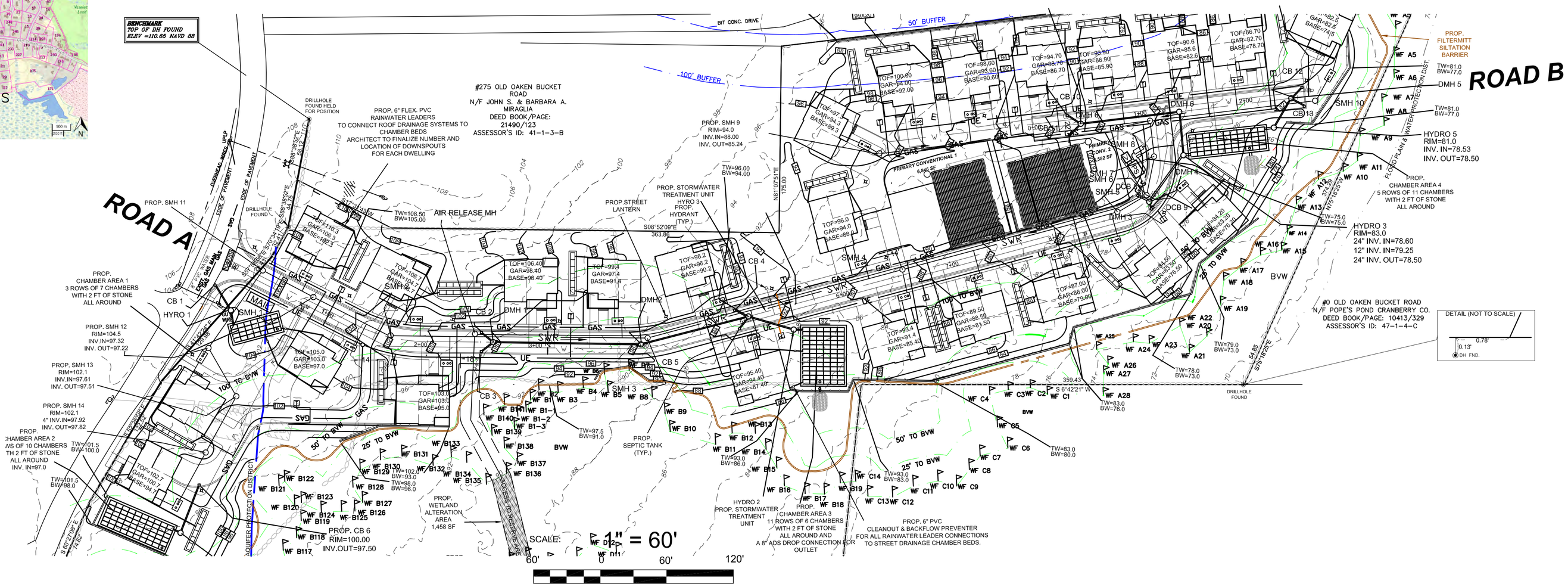
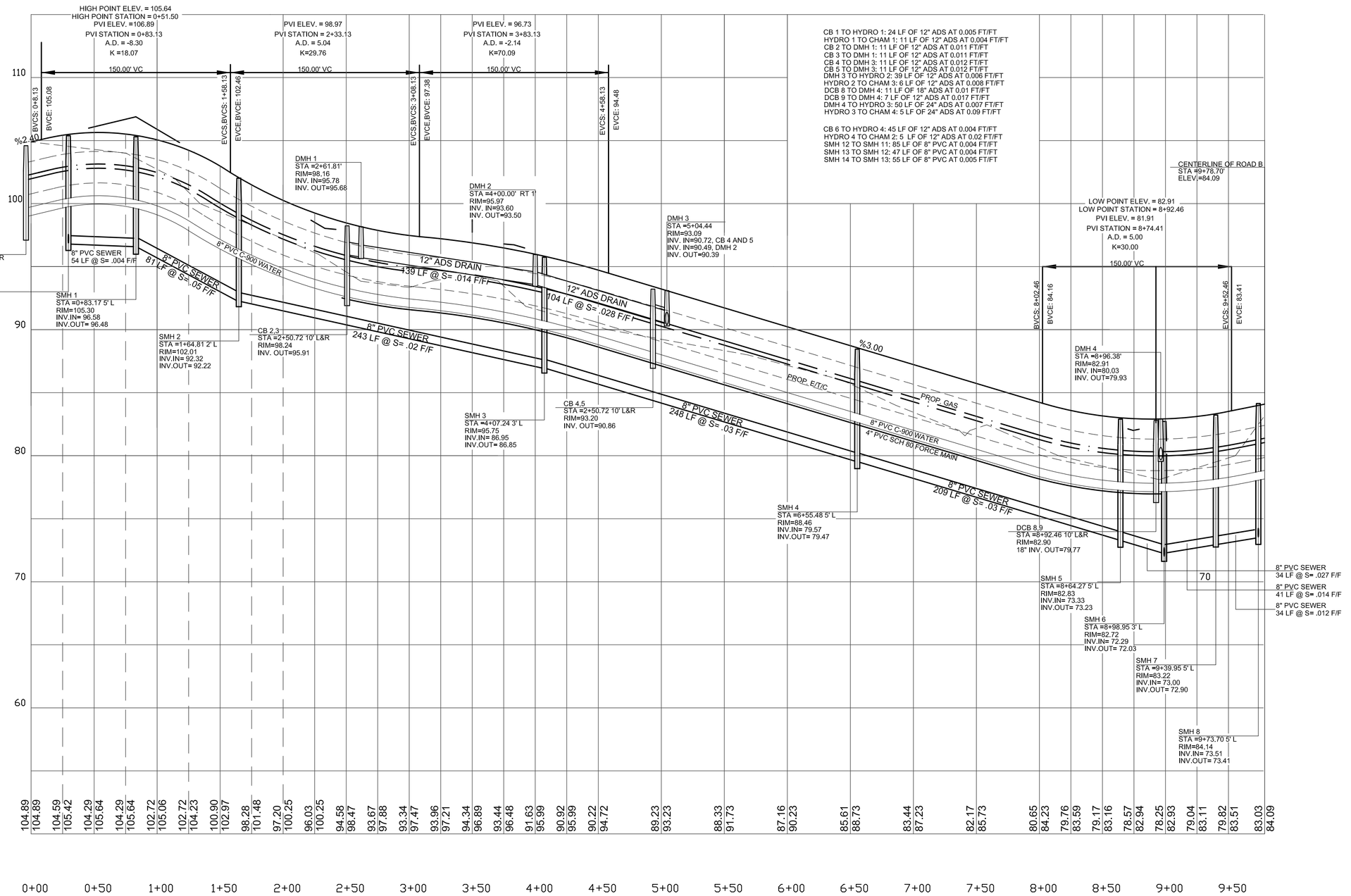
APPROVED:	M. D. CASEY
DWG.No.	1908 ERCP
JOB No.	1908

SHEET 5 OF 16



LOCUS MAP
NOT TO SCALE





ROAD A
SCALE: HORIZONTAL 1"=60'
VERTICAL 1"=6'

UTILITY LEGEND:

SEWER LINE — SWR
DRAINAGE LINE
UNDERGROUND ELEC/TEL/CABLE — UE
WATER LINE — W
GAS LINE — GAS — GAS
MANHOLE
CATCH BASIN
HYDRANT
WATER VALVE
TRANSFORMER
RETAINING WALL

DCB- DOUBLE CATCH BASIN
CB- CATCH BASIN
DMH-DRAIN MANHOLE
HYDRO- PROPRIETARY TREATMENT UNIT

REVISIONS:

No.	DESCRIPTION	DATE

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THE COTTAGES AT OLD OAKEN BUCKET AT #279-281 OLD OAKEN BUCKET ROAD SCITUATE, MA

PLAN & PROFILE ROAD A

PARCEL 41-1-3-D
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PREPARED FOR:
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S/O SALT MEADOW DEVELOPMENT
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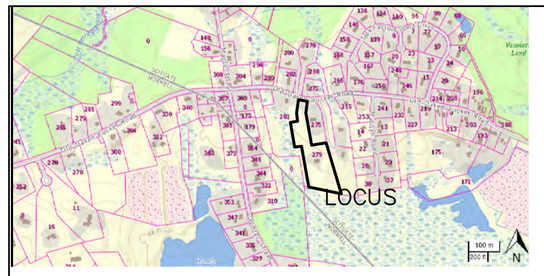

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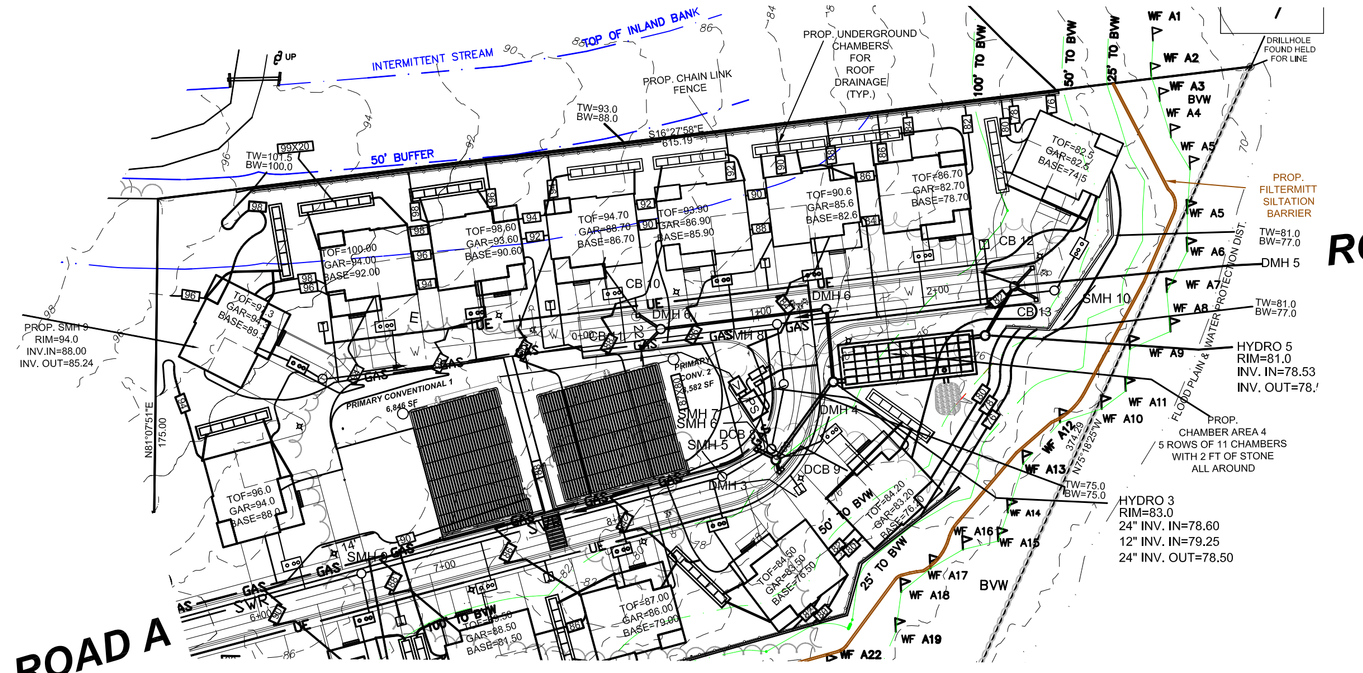
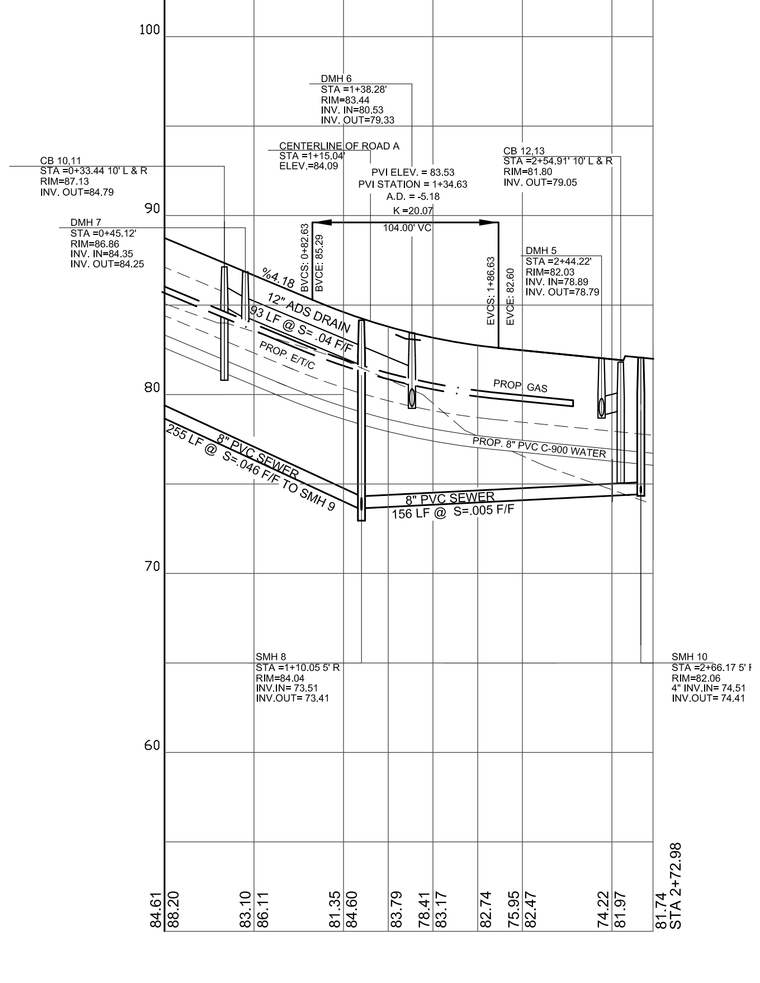


		CB 10 TO DMH 7: 14 LF OF 12" ADS AT 0.031 FT/FT CB 11 TO DMH 7: 11 LF OF 12" ADS AT 0.014 FT/FT CB 12 TO DMH 5: 12 LF OF 12" ADS AT 0.014 FT/FT CB 13 TO DMH 5: 11 LF OF 12" ADS AT 0.014 FT/FT DMH 5 TO HYDRO 5: 32 LF OF 12" ADS AT 0.005 FT/FT HYDRO 5 TO CHAM 4: 5 LF OF 12" ADS AT 0.006 FT/FT			



ROAD B
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UTILITY LEGEND:

SEWER LINE — SVR —
DRAINAGE LINE
UNDERGROUND ELEC/TEL/CABLE — UE —
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GAS LINE — GAS — GAS —
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PLAN & PROFILE ROAD B

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PARCEL 41-1-3-0

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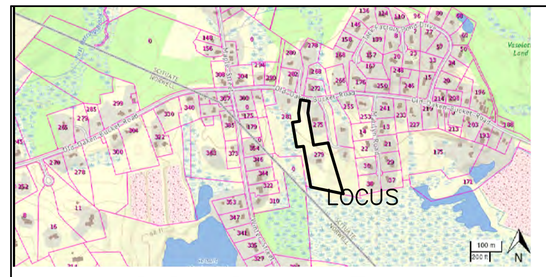

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OLD OAKEN
MAIL
TOP OF INLAND BANK
INTERMITTENT STREAM
BIT CONC. DRIVE
50' BUFFER
100' BUFFER
PROP. CHAIN LINK FENCE
PROP. STOP SIGN
PROP. STREET NAME SIGN
PROP. SIDEWALK
PROP. CROSS WALK (TYP.)
PROP. RETAINING WALL (TYP.)
PROP. 12" CAPE COD BERM BOTH SIDES
PROP. STREET LANTERN
PROP. YIELD TO PEDESTRIAN SIGN EACH SIDE
PROP. WETLAND ALTERATION AREA 1,458 SF
PROP. RESERVE AREA ACCESS 18' WIDE
PROP. WETLAND REPLICATION AREA 1,682 SF
ACCESS TO RESERVE AREA
PRIMARY CONVENTIONAL 1 6,846 SF
PRIMARY CONV. 7 8,582 SF
SEPTIC RESERVE AREA FOR 72 BEDROOMS
100' TO BVW
50' TO BVW
25' TO BVW
BVW
PROP. FILTERMITT SILTATION BARRIER
FLOOD PLAIN & WATER PROTECTION DIST.
ZONE 2/AQUIFER PROTECTION DISTRICT
DRILLHOLE FOUND
DRILLHOLE FOUND HELD FOR POSITION
DRILLHOLE FOUND HELD FOR LINE
DH FND.

VEHICLE TURNING RADIUS SHOWN BASED ON INFORMATION PROVIDED BY THE SCITUATE FIRE DEPARTMENT.

SCALE: 1" = 50'
50' 0 50' 80'

12/12/2022

REVISIONS:

No.	DESCRIPTION	DATE

PROJECT TITLE:

THE COTTAGES AT OLD OAKEN BUCKET AT #279-281 OLD OAKEN BUCKET ROAD SCITUATE, MA

EMERGENCY VEHICLE MOVEMENT PLAN

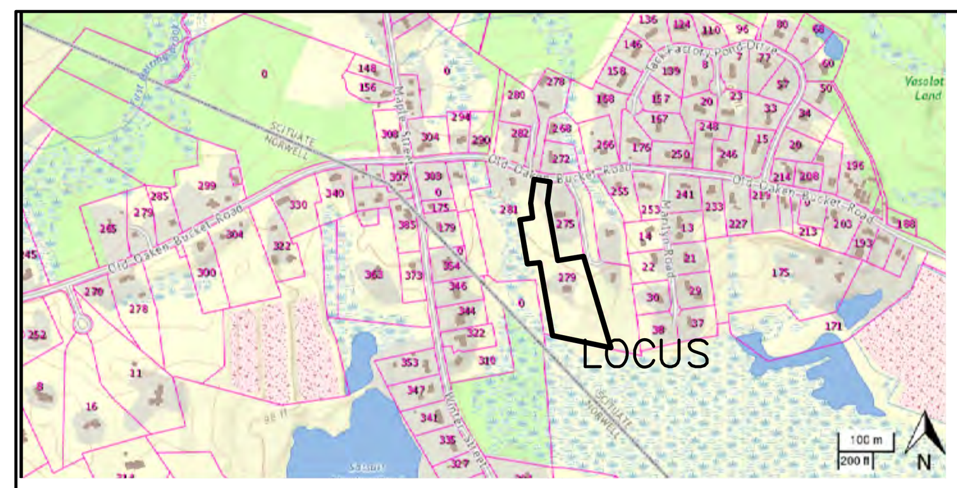
PARCEL 41-1-3-D
PARCEL 41-1-3-0

PREPARED BY:
South Shore Survey Consultants, Inc.
REGISTERED LAND SURVEYORS & CIVIL ENGINEERS
167 R SUMMER STREET
KINGSTON, MA 02364
781-582-2185
mark@ssscinc.net

PREPARED FOR:
LOVENDALE , LLC
S/O SALT MEADOW DEVELOPMENT
107 EAST STREET
DUXBURY, MA 02332

DATE:	DECEMBER 12, 2022
COMP./DESIGN:	A. ESPOSITO
CHECK:	M. D. CASEY
DRAWN:	A. ESPOSITO
FIELD:	LJL/PS
APPROVED:	M. D. CASEY
DWG.No.	1908 FAC
JOB No.	1908

SHEET 8 OF 16



LOCUS MAP
NOT TO SCALE

CONSTRUCTION NOTES
1) INSPECTION PORT SHALL CONFORM TO 310 CMR 15.240 (13).
2) MAGNETIC TAPE TO BE PROVIDED ON TOP OF ALL LEACHING COMPONENTS IN ACCORDANCE WITH TITLE 5.

SEWAGE DISPOSAL SYSTEM AND THE DWELLING DO NOT FALL WITHIN A "ZONE I" OF A SURFACE WATER PROTECTION AREA BUT DOES FALL IN A "ZONE II" OF A "INTERIM WELLHEAD PROTECTION AREA".

THIS SITE FALLS WITHIN A FLOOD ZONE "X" AND IS NOT IN A SPECIAL FLOOD HAZARD AREA AS SHOWN ON FIRM MAP 25023C0117K DATED NOVEMBER 4, 2016

THIS DESIGN DOES NOT REQUIRE VARIANCE FROM TITLE 5 AND DOES NOT REQUIRE A VARIANCE FROM THE DUXBURY SUPPLEMENTARY RULES & REGULATIONS TO TITLE 5.

THERE ARE NO KNOWN WETLANDS WITHIN 100' OF THE SOIL ABSORPTION SYSTEM.

THERE ARE NO KNOWN IRRIGATION WELLS WITHIN 100' OF THE SYSTEM. THERE ARE NO KNOWN PRIVATE WATER SUPPLY WELLS WITHIN 100' OF THE SYSTEM.

THE SITE IS NOT LOCATED IN A NATURAL HERITAGE ESTIMATED OR PRIORITY HABITAT MAPPED AREA.

TEST PIT LOGS

TEST PIT 6-3 — GRD. EL 89.0 — GW. EL 87.5
- 0–9": A SANDY LOAM 10YR 3/2
- 9"–18": B LOAMY SAND 10YR 5/6 FRIABLE
- 18"–110": MOTTLES @ 18" 7.5 Y 6/4; C SANDY LOAM 2.5 Y 4/3 LOOSE WEEPING @70"; STANDING @ 104"
- 110": BOTTOM OF PIT
- PERC 28" – 46"

TEST BY: ANTHONY A. ESPOSITO DATE: 2/1/2021 ANTHONY A. ESPOSITO SE888 — WITNESSED BY: PETER FALABELLA SCITUATE BOH PERC. RATE: 7 MIN./IN.

TEST PIT 5-3 — GRD. EL 87.5 — GW. EL 85.5
- 0–10": A SANDY LOAM 10YR 3/2
- 10"–24": B LOAMY SAND 10YR 5/4 FRIABLE
- 24"–112": MOTTLES @ 24" 7.5 Y 6/4; WEEPING @ 70"; C SANDY LOAM 2.5 Y 6/3 LOOSE; STANDING @ 100"
- 112": BOTTOM OF PIT
- PERC 18" – 36"

TEST BY: ANTHONY A. ESPOSITO DATE: 2/1/2021 ANTHONY A. ESPOSITO SE888 — WITNESSED BY: PETER FALABELLA SCITUATE BOH PERC. RATE: 6 MIN./IN.

TEST PIT 2-2 — GRD. EL 83.0 — GW. EL 79.6
- 0–22": A SANDY LOAM 10YR 4/4
- 22"–41": B LOAMY SAND 10YR 5/4 FRIABLE
- 41"–93": MOTTLES @ 41" 7.5 Y 5/8; C SANDY LOAM 2.5 Y 6/3 LOOSE
- 93": BOTTOM OF PIT
- PERC 41" – 59"

TEST BY: ANTHONY A. ESPOSITO DATE: 8/26/2020 ANTHONY A. ESPOSITO SE888 — WITNESSED BY: PETER FALABELLA SCITUATE BOH PERC. RATE: 11 MIN./IN.

TEST PIT 3-2 — GRD. EL 82.0 — GW. EL 80.1
- 0–8": A SANDY LOAM 10YR 4/4
- 8"–23": B LOAMY SAND 10YR 5/4 FRIABLE
- 23"–122": MOTTLES @ 23" 7.5 Y 5/8; C SANDY LOAM 2.5 Y 6/3 LOOSE
- 122": BOTTOM OF PIT
- PERC 38" – 56"

TEST BY: ANTHONY A. ESPOSITO DATE: 8/26/2020 ANTHONY A. ESPOSITO SE888 — WITNESSED BY: PETER FALABELLA SCITUATE BOH PERC. RATE: 5 MIN./IN.

TEST PIT 5-2 — GRD. EL 81.0 — GW. EL 78.1
- 0–10": A SANDY LOAM 10YR 4/4
- 10"–35": B LOAMY SAND 10YR 5/4 FRIABLE
- 35"–96": MOTTLES @ 35" 7.5 Y 5/8; C SANDY LOAM 2.5 Y 6/3 LOOSE
- 96": BOTTOM OF PIT
- PERC 39" – 57"

TEST BY: ANTHONY A. ESPOSITO DATE: 8/26/2020 ANTHONY A. ESPOSITO SE888 — WITNESSED BY: PETER FALABELLA SCITUATE BOH PERC. RATE: 9 MIN./IN.

TEST PIT 4-2 — GRD. EL 81.0 — GW. EL 78.1
- 0–8": A SANDY LOAM 10YR 4/4
- 8"–24": B LOAMY SAND 10YR 5/4 FRIABLE
- 24"–133": MOTTLES @ 35" 7.5 Y 5/8; C SANDY LOAM 2.5 Y 6/3 LOOSE; WEEPING @ 130" AND STANDING
- 133": BOTTOM OF PIT

TEST BY: ANTHONY A. ESPOSITO DATE: 8/26/2020 ANTHONY A. ESPOSITO SE888 — WITNESSED BY: PETER FALABELLA SCITUATE BOH PERC. RATE: N/A

TEST PIT 1-2 — GRD. EL 82.0 — GW. EL 79.0
- 0–8": A SANDY LOAM 10YR 4/4
- 8"–27": B LOAMY SAND 10YR 5/4 FRIABLE
- 27"–120": MOTTLES @ 36" 7.5 Y 5/8; C SANDY LOAM 2.5 Y 6/3 LOOSE
- 120": BOTTOM OF PIT
- PERC 42" – 60"

TEST BY: ANTHONY A. ESPOSITO DATE: 8/26/2020 ANTHONY A. ESPOSITO SE888 — WITNESSED BY: PETER FALABELLA SCITUATE BOH PERC. RATE: 7 MIN./IN.

TEST PIT SEPTIC-2 — GRD. EL 86.0 — GW. EL 82.7
- 0–12": FILL
- 12"–28": Ao SANDY LOAM 10YR 2/1 FRIABLE
- 28"–40": Bw SANDY LOAM 10YR 5/6 FRIABLE; MOTTLES @ 40" 7.5 Y 4/6
- 44"–120": C2 LOAMY SAND 2.5Y 6/3 FRIABLE
- 120"–140": C2 SANDY LOAM 2.5Y 6/3 FRIABLE
- 140": BOTTOM OF PIT
- PERC 55" – 73"

TEST BY: ANNA WIMMER DATE: 10/6/2022 ANNA WIMMER SE14615 — WITNESSED BY: JOSHUA GREEN SCITUATE BOH PERC. RATE: 59 MIN./IN.

TEST PIT 6-2 — GRD. EL 81.0 — GW. EL 77.3
- 0–10": A SANDY LOAM 10YR 4/4
- 10"–26": B LOAMY SAND 10YR 5/4 FRIABLE
- 26"–160": MOTTLES @ 44" 7.5 Y 5/8; C SANDY LOAM 2.5 Y 6/3 LOOSE; WEEPING @ 151"; STANDING @ 152"
- 160": BOTTOM OF PIT
- PERC 32" – 60"

TEST BY: ANTHONY A. ESPOSITO DATE: 8/26/2020 ANTHONY A. ESPOSITO SE888 — WITNESSED BY: PETER FALABELLA SCITUATE BOH PERC. RATE: 7 MIN/IN

TEST PIT 2-3 — GRD. EL 93.0 — GW. EL 90.00
- 0–10": A SANDY LOAM 10YR 3/2
- 10"–26": B LOAMY SAND 10YR 5/6 FRIABLE
- 26"–40": C1 GRAVELLY SAND 2.5 Y 4/3; MOTTLES @ 36" 7.5 Y 6/4
- 40"–120": WEEPING @ 40" FIRM; STANDING @ 76"; C2 SANDY LOAM 2.5 Y 3/2
- 120": BOTTOM OF PIT
- PERC 24" – 42"

TEST BY: ANTHONY A. ESPOSITO DATE: 2/1/2021 ANTHONY A. ESPOSITO SE888 — WITNESSED BY: PETER FALABELLA SCITUATE BOH PERC. RATE: 28 MIN./IN.

TEST PIT 3-3 — GRD. EL 87.0 — GW. EL 85.0
- 0–15": A SANDY LOAM 10YR 3/2
- 15"–36": B LOAMY SAND 10YR 5/6 FRIABLE
- 36"–120": MOTTLES @ 36" 7.5 Y 6/4; C LOAMY SAND 2.5 Y 4/3; LOOSE WEEPING @ 81"; STANDING @ 90"
- 120": BOTTOM OF PIT
- PERC 36" – 54"

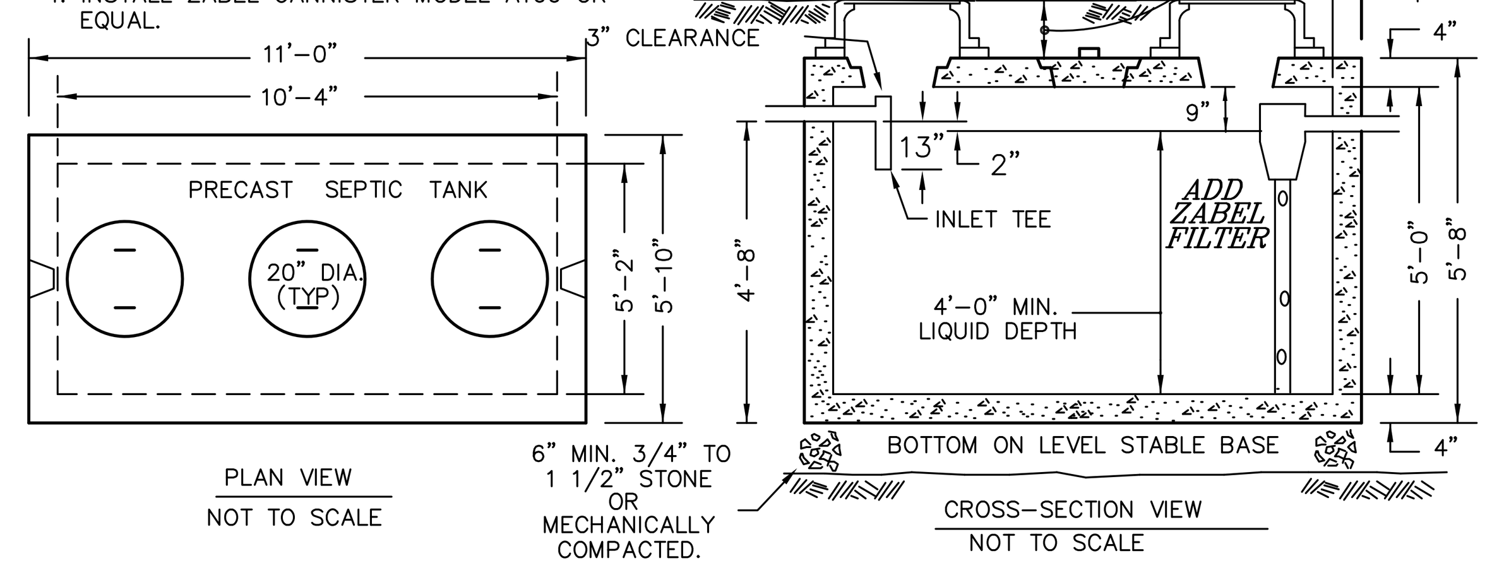
TEST BY: ANTHONY A. ESPOSITO DATE: 2/1/2021 ANTHONY A. ESPOSITO SE888 — WITNESSED BY: PETER FALABELLA SCITUATE BOH PERC. RATE: 2 MIN./IN.

TEST PIT 4-3 — GRD. EL 89.0 — GW. EL 87.2
- 0–18": A SANDY LOAM 10YR 3/2
- 18"–24": B LOAMY SAND 10YR 5/6 FRIABLE
- 24"–112": MOTTLES @ 22" 7.5 Y 6/4; C LOAMY SAND 2.5 Y 4/3; LOOSE WEEPING @ 70"; STANDING @ 94"
- 112": BOTTOM OF PIT

TEST BY: ANTHONY A. ESPOSITO DATE: 2/1/2021 ANTHONY A. ESPOSITO SE888 — WITNESSED BY: PETER FALABELLA SCITUATE BOH PERC. RATE: N/A

SEPTIC TANK DETAIL: 1500 GALLON

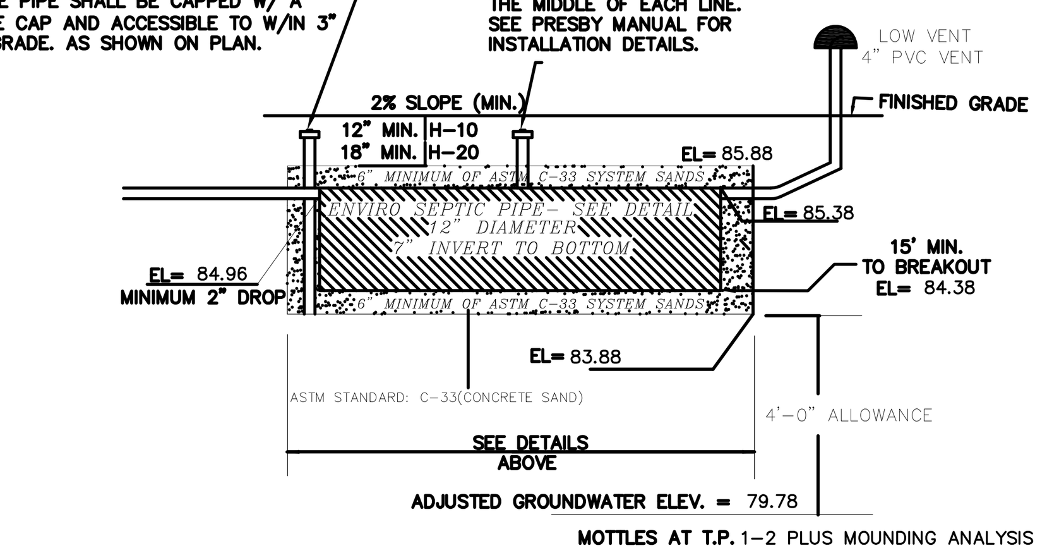
NOTES:
1. SEPTIC TANK SHALL BE STEEL REINFORCED 4000 PSI CONCRETE, WITH TWO (2) 20" MANHOLES.
2. SEPTIC TANK TO WITHSTAND H-10 LOADING UNLESS UNDER PAVEMENT, DRIVES OR TRAVELED WAYS, WHEREIN H-20 LOADING SHALL APPLY.
3. ALL PIPE CONNECTIONS AND CONCRETE CONSTRUCTION SHALL BE WATERTIGHT.
4. INSTALL ZABEL CANNISTER MODEL A100 OR EQUAL.
5. INLET AND OUTLET TEES TO BE CAST IRON, SCHED. 40 PVC OR CAST-IN-PLACE CONCRETE. TEES TO BE UNDER MANHOLE COVER WITHIN 12" OF END WALL.
6. RECOMMENDED MANUFACTURER-SCITUATE CONCRETE OR APPROVED EQUAL.
7. TANK SHALL BE EMBOSSED WITH SEAL INDICATING CONFORMANCE WITH ASTM STANDARD C 1227-96.



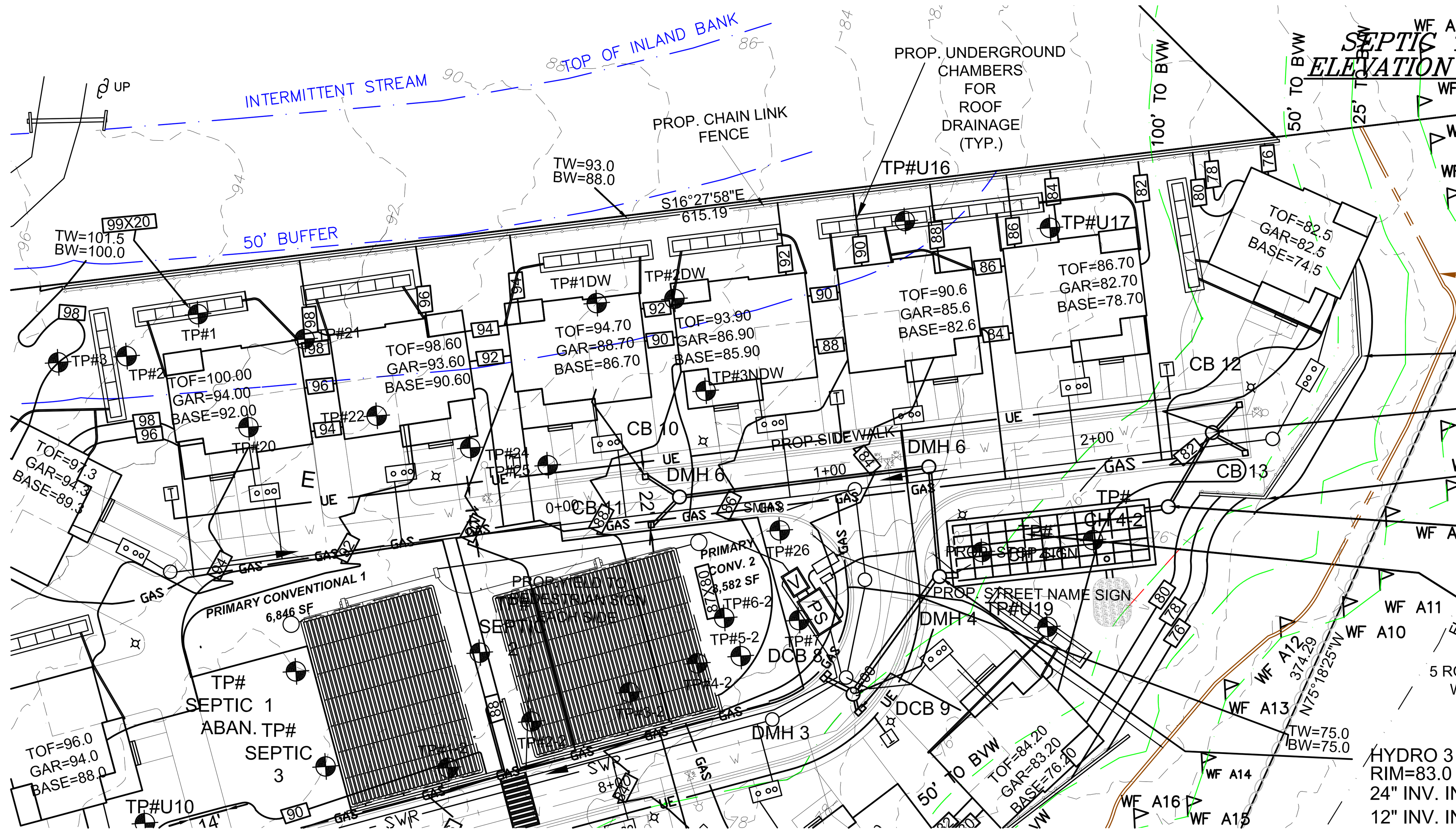
SEPTIC TANK ELEVATION CHART

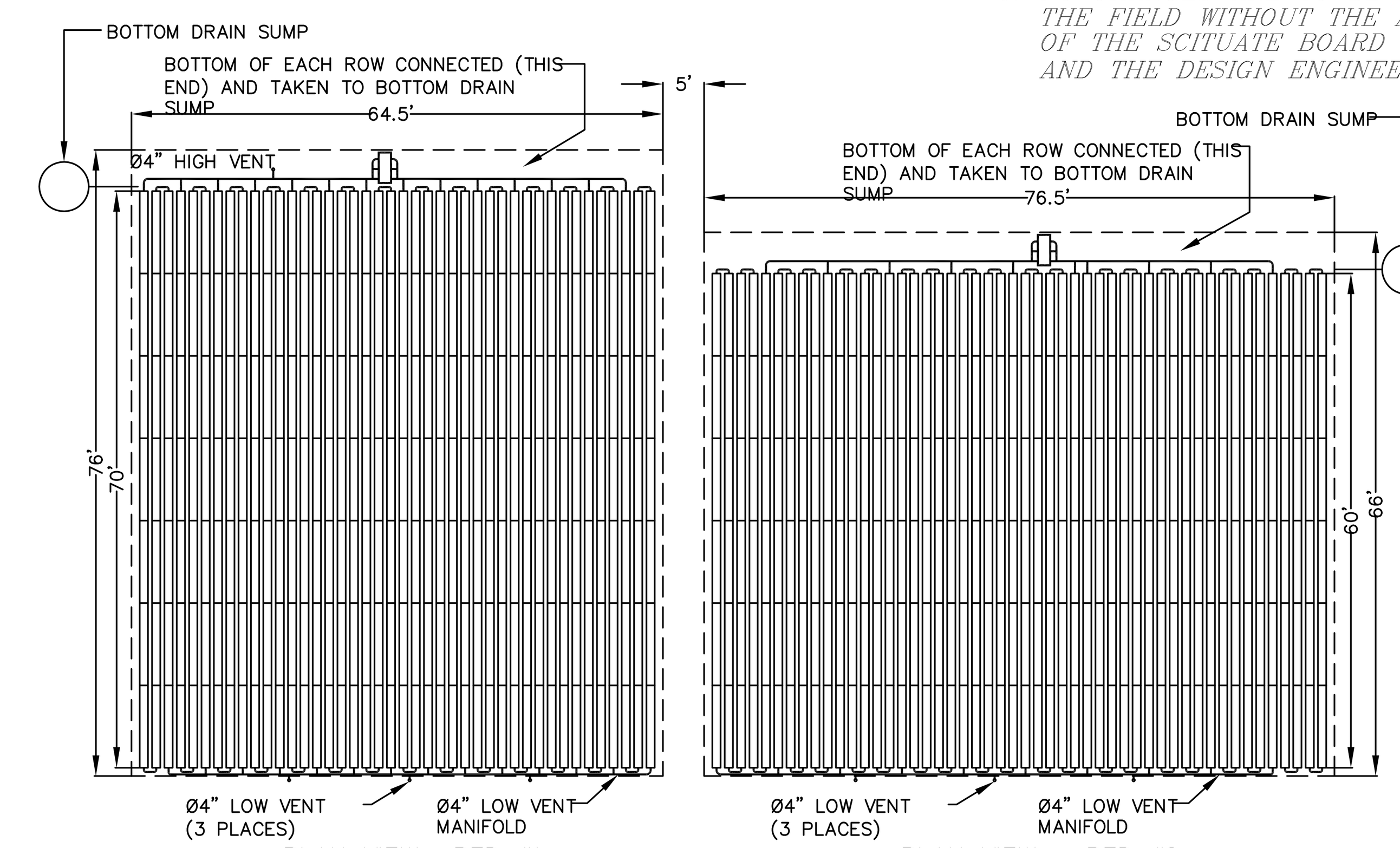
DWELL.	INV. OUT	TANK IN	TANK OUT	FIN. GRD @ TANK	TOP OF FND.	TOP OF BASE. SLAB	TOP OF TANK
1	99.53	99.13	98.88	100.50	101.60	93.60	98.00
2	99.77	99.55	99.30	103.00	104.00	96.00	99.50
3	100.80	100.50	100.25	104.10	105.00	97.00	101.60
4	96.95	96.50	96.25	100.00	102.00	94.00	97.50
5	104.63	104.33	104.08	105.83	110.30	102.30	103.33
6	98.34	98.00	97.75	101.50	106.70	98.70	99.00
7	99.40	94.00	93.75	97.50	106.40	98.40	95.00
8	93.74	93.10	92.85	96.60	99.40	91.40	94.10
9	91.96	90.50	90.25	94.00	98.20	90.20	91.50
10	96.82	86.50	86.25	90.00	96.00	88.00	87.50
11	90.88	90.50	90.25	94.00	97.30	89.30	91.50
12	90.28	90.00	89.75	93.50	100.00	92.00	91.00
13	88.78	88.00	87.75	92.00	98.60	90.60	89.50
14	84.98	84.70	84.45	88.20	94.70	86.70	85.70
15	82.78	82.00	81.75	86.00	93.90	85.90	83.50
16	80.78	80.00	79.75	84.00	90.60	82.60	81.50
17	79.58	79.30	79.05	82.80	86.70	78.70	80.30
18	78.98	78.00	77.75	81.50	82.50	74.50	79.00
19	80.28	79.80	79.55	83.30	84.20	76.20	80.80
20	80.50	79.80	79.55	83.30	84.50	76.50	80.80
21	81.34	81.00	80.75	84.50	87.00	79.00	82.00
22	82.64	82.30	82.05	86.80	89.50	81.50	84.30
23	85.86	85.40	85.15	88.90	93.40	85.40	86.40
24	90.82	90.50	90.25	94.00	95.40	87.40	91.50

MINIMUM OF 2 INSPECTION PORTS CONSISTING OF A 4" PERF. PIPE PLACED VERTICALLY DOWN INTO THE SYSTEM SANDS TO THE NATURALLY OCCURRING SOIL OR SAND FILL BELOW THE SYSTEM. THE PIPE SHALL BE CAPPED W/ A SCREW TYPE CAP AND ACCESSIBLE TO W/IN 3" OF FINISH GRADE. AS SHOWN ON PLAN.



PRESBY BED PROFILE
NOT TO SCALE





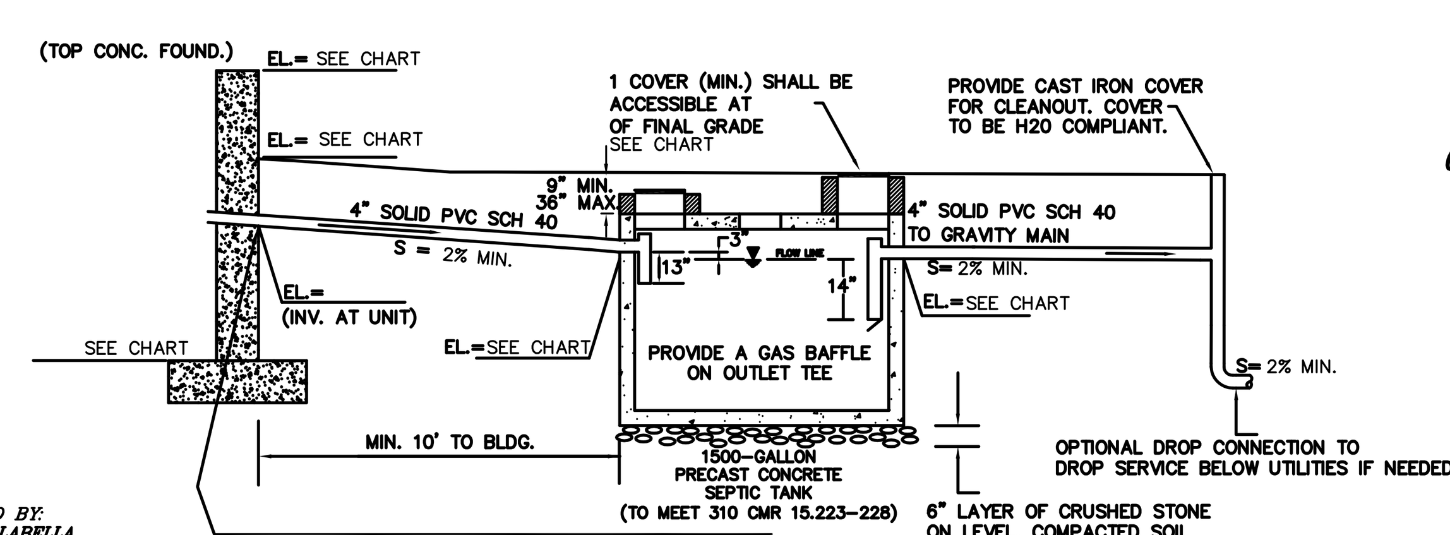
PLAN VIEW– BED #1

BED#1 DESIGN CRITERIA:
1. 4,565 GPD
2. SOIL APPLICATION RATE: 0.933 GPD/SF
3. SAND BED AREA REQUIRED: 4,893 SF
4. SAND BED PROVIDED: 4,902 SF
5. AES PIPE REQUIRED: 2,905 FT
6. AES PROVIDED: 42 ROWS X 70' = 2,940 FT
7. PEI COUPLINGS: 252
8. PEI OFFSET ADAPTERS: 42
9. PEI DOUBLE OFFSET ADAPTERS: 42
10. BOTTOM OF EACH ROW CONNECTED ON DBOX END OF FIELD

PLAN VIEW – BED #2

BED #2 DESIGN CRITERIA:
1. 4,565 GPD
2. SOIL APPLICATION RATE: 0.933 GPD/SF
3. SAND BED AREA REQUIRED: 4,893 SF
4. SAND BED PROVIDED: 4,902 SF
5. AES PIPE REQUIRED: 2,905 FT
6. AES PROVIDED: 50 ROWS X 60' = 3,000 FT
7. PEI COUPLINGS: 250
8. PEI OFFSET ADAPTERS: 50
9. PEI DOUBLE OFFSET ADAPTERS: 50
10. BOTTOM OF EACH ROW CONNECTED ON DBOX END OF FIELD

PRESBY BED DETAIL
NOT TO SCALE



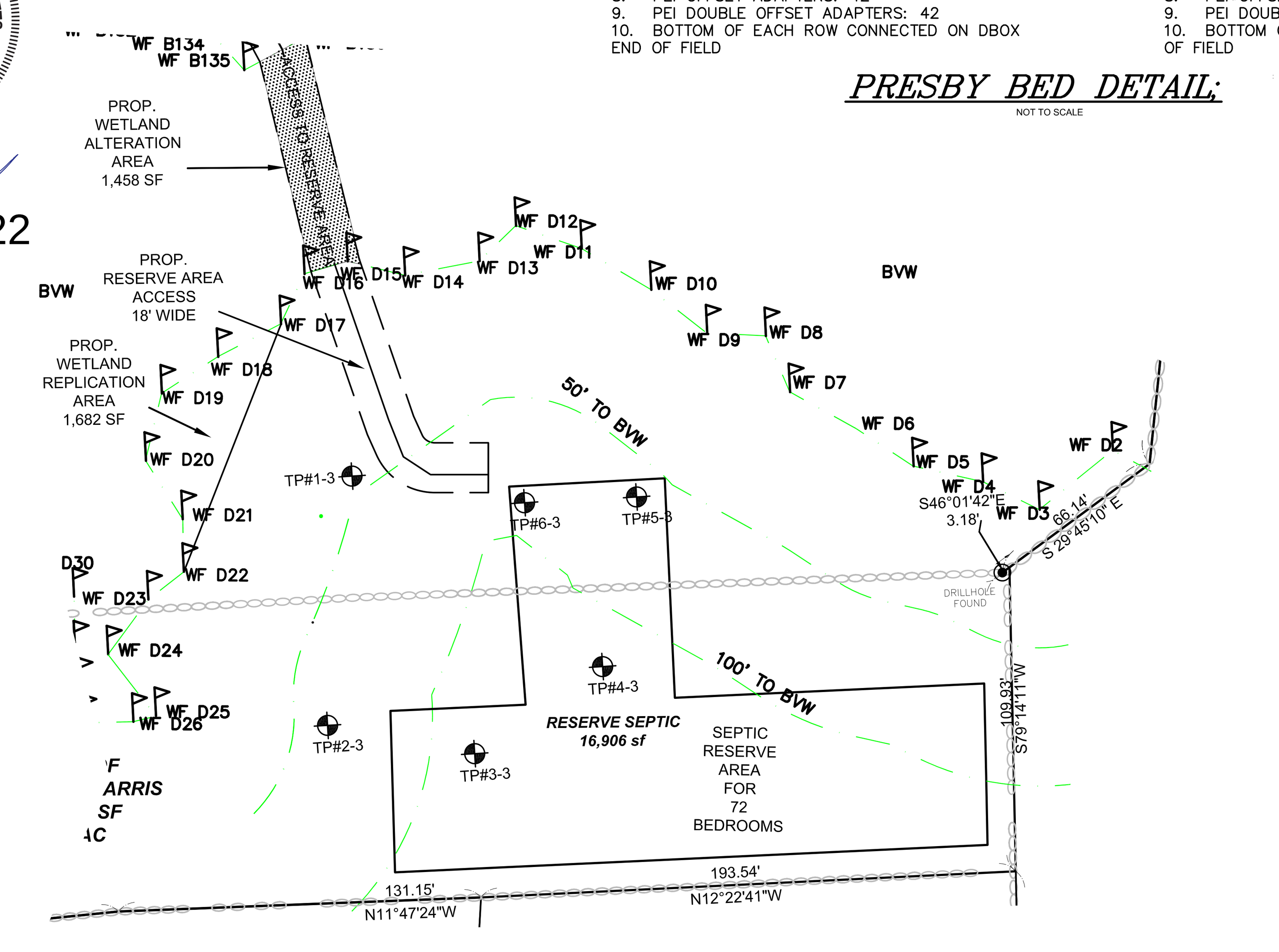
NOTE: INVERT OUT OF THE HOUSE TO BE VERIFIED PRIOR TO CONSTRUCTION. THE DESIGN ENGINEER MUST BY NOTIFIED OF ANY DISCREPANCIES.

SEPTIC TANK PROFILE
NOT TO SCALE

SCALE: 1"=40'
0 20 40 60 80 100 FEET

COMMONWEALTH OF MASSACHUSETTS — ANTHONY A. ESPOSITO — CIVIL — No. 39782 — REGISTERED PROFESSIONAL ENGINEER

12/12/2022



GENERAL NOTES:
1. THIS PLAN IS FOR DESIGN AND CONSTRUCTION OF THE SEWAGE DISPOSAL FACILITY ONLY.
2. ALL CONSTRUCTION METHODS AND MATERIALS SHALL CONFORM TO MASS. D.E.P. TITLE 5 AND LOCAL BOARD OF HEALTH REGULATIONS.
3. ALL PIPES SHALL BE 4" PVC SCH 40 OR EQUAL.
4. THERE ARE NO KNOWN WELLS LOCATED WITHIN 150 FT OF THE PROPOSED LEACHING FACILITY NOR ANY WELLS PROPOSED WITHIN 150 FT OF ANY KNOWN LEACHING FACILITY.
5. THIS SYSTEM **IS NOT** DESIGNED FOR THE USE OF A GARBAGE GRINDER.
6. WITHIN LIMIT OF EXCAVATION REMOVE ALL TOPSOIL(A), SUBSOIL (B) AND OTHER UNSUITABLE MATERIAL BELOW EXISTING GRADE.
7. REPLACE WITH CLEAN WASHED SAND OR OTHER CLEAN GRANULAR MATERIAL IN CONFORMANCE WITH 310 CMR 15.255.
8. EXISTING UTILITIES AS SHOWN ON THIS DRAWING(S) ARE APPROXIMATE. THE CONTRACTOR SHALL BE RESPONSIBLE FOR PROPER LOCATION AND THE COORDINATION OF PROPOSED CONSTRUCTION ACTIVITY WITH DIG-SAFE AND THE APPLICABLE UTILITY COMPANY(S). THE CONTRACTOR SHALL MAINTAIN ANY EXISTING UTILITY SYSTEM IN SERVICE. DIG-SAFE WILL BE NOTIFIED PER STATE OF MASSACHUSETTS STATUTE CHAPTER 82, SECTION 409 AT TEL. 811. THE ENGINEER DOES NOT GUARANTEE THE ACCURACY OF, OR THAT ALL UTILITIES AND SUBSURFACE STRUCTURES ARE SHOWN. LOCATIONS AND ELEVATIONS, IF ANY, OF UNDERGROUND UTILITIES ARE TAKEN FROM RECORD PLANS. THE CONTRACTOR SHALL VERIFY SIZE, LOCATION AND INVERTS OF UTILITIES AND STRUCTURES AS REQUIRED PRIOR TO THE START OF CONSTRUCTION.
9. NO CHANGES ARE TO BE MADE IN THE FIELD WITHOUT THE APPROVAL OF THE SCITUATE BOARD OF HEALTH AND THE DESIGN ENGINEER.

DESIGN CRITERIA:

DESIGN FLOW PER TITLE 5.:
72 BEDROOMS AT 110 G.P.B/D — 7,920 G.P.D.

REQUIRED SEPTIC TANK PER STRUCTURE
7,920 GALS = 15,840 GAL.
SEPTIC TANKS PROVIDED 19 TANKS X 1500 = 36,000 GAL.

SIZE OF LEACHING FACILITY REQUIRED:
DESIGN PERC RATE: 11 MIN./IN.

CLASS II SOIL 0.56 g.p.d/s.f.
7,920 ÷ 0.56 = 14,143 S.F. (Min.)
CONVENTIONAL SYSTEM
15,428 SF PROVIDED

USE: PRESBY SYSTEM
72 BEDROOMS X 70 LF= 5,040 LF OF PIPE REQ.

567 SF FOR 6 BEDROOMS + (66 BEDROOMS X 95 SF) = 6,837 SF OF BED

2,940 LF + 3,000 LF = 5,940 LF
= 5,700 LF PROVIDED
3,671 SF + 4,370 SF = 8,041 SF PROVIDED.

CLASS II SOIL 0.56 g.p.d/s.f.
7,920 ÷ 0.56 = 14,143 S.F. (Min.)
CONVENTIONAL SYSTEM
16,906 SF PROVIDED

REVISIONS:

No.	DESCRIPTION	DATE

PROJECT TITLE:

THE COTTAGES AT OLD OAKEN BUCKET AT #279-281 OLD OAKEN BUCKET ROAD SCITUATE, MA

SEPTIC SYSTEM DESIGN PLAN

PARCEL 41-1-3-D
PARCEL 41-1-3-0

PREPARED BY:
South Shore Survey Consultants, Inc.
REGISTERED LAND SURVEYORS & CIVIL ENGINEERS
167 R SUMMER STREET
KINGSTON, MA 02364
781-582-2185
mark@ssscinc.net

PREPARED FOR:
LOVENDALE , LLC
S/O SALT MEADOW DEVELOPMENT
107 EAST STREET
DUXBURY, MA 02332

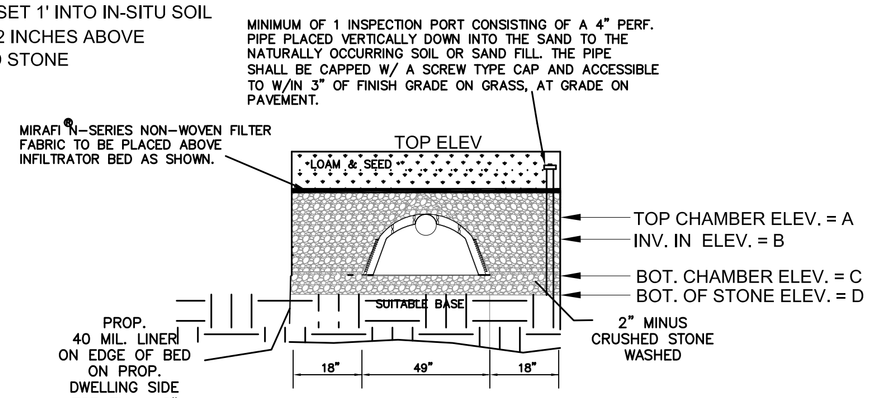
SCALE: 1" = 40'
40' 0 40' 80'

DATE: DECEMBER 12, 2022
COMP./DESIGN: A. ESPOSITO
CHECK: M. D. CASEY
DRAWN: A. ESPOSITO
FIELD: LJL/PS
APPROVED: M. D. CASEY
DWG.No. 1908 SEP
JOB No. 1908

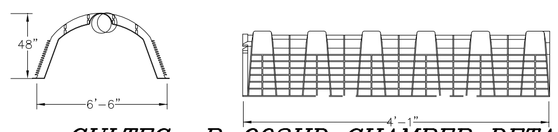
DWELL.	A	B	C	D	TOP MIN.	GROUND WATER
1	100.00	96.00	96.00	95.50	101.00	93.40
2	102.50	98.60	98.50	98.00	100.35	95.90
4	99.60	98.60	95.60	95.10	100.35	93.00
5	107.70	106.70	103.70	103.20	108.70	101.30
6	103.60	102.60	99.60	99.10	104.60	97.00
7	103.60	100.60	99.60	99.10	104.60	97.00
8	98.60	95.60	94.60	94.10	99.60	92.00
9	95.10	94.10	91.10	90.60	96.10	88.50
10	94.10	91.10	90.10	89.60	95.10	87.50
11	97.30	93.30	93.30	92.80	98.30	90.70
12	98.00	96.00	94.00	93.50	99.00	91.40
13	95.80	94.80	92.30	91.80	96.80	89.70
14	91.00	90.00	87.50	87.00	92.00	84.90
15	91.00	89.00	87.50	87.00	92.00	84.90
16	86.10	84.10	82.10	81.60	87.10	79.50
17	83.30	80.30	79.30	78.80	84.30	76.70
18	79.40	78.40	75.40	74.90	80.40	72.80
19	80.80	78.80	76.80	76.30	81.80	74.20
20	81.60	77.60	77.60	77.10	82.60	75.00
21	84.60	83.60	80.60	80.10	85.60	78.00
22	86.10	83.10	82.10	81.60	87.10	79.50
23	86.10	83.10	82.10	81.60	87.10	79.50

ROOF DRAIN CHAMBER ELEVATION CHART

40 MIL. LINER ON ALL SIDES
BOTTOM SET 1' INTO IN-SITU SOIL
TOP SET 2 INCHES ABOVE CRUSHED STONE



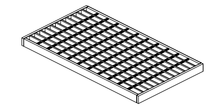
ROOF DRAIN CHAMBER LAYOUT DETAIL: SIDE VIEW
NOT TO SCALE

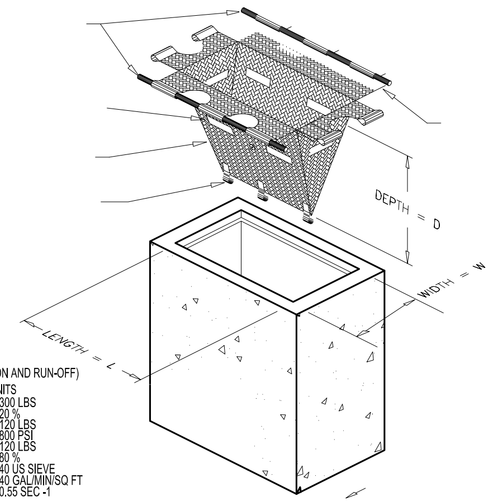


CULTEC R-902HD CHAMBER DETAIL
OR EQUAL
NOT TO SCALE

SILTSACK
SPECIFICATIONS

NOTE: THE SILTSACK WILL BE MANUFACTURED FROM A WOVEN POLYPROPYLENE FABRIC THAT MEETS OR EXCEEDS THE FOLLOWING SPECIFICATIONS.





REGULAR FLOW SILTSACK
(FOR AREAS OF LOW TO MODERATE PRECIPITATION AND RUN-OFF)

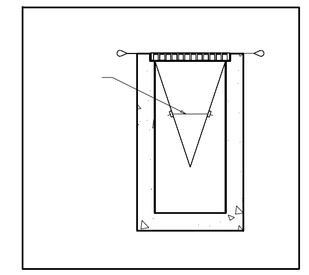
PROPERTIES	TEST METHOD	UNITS
GRAB TENSILE STRENGTH	ASTM D-4632	300 LBS
GRAB TENSILE ELONGATION	ASTM D-4632	20 %
PUNCTURE	ASTM D-4833	120 LBS
MULLEN BURST	ASTM D-3786	600 PSI
TRAPEZOID TEAR	ASTM D-4533	120 LBS
UV RESISTANCE	ASTM D-4355	90 %
APPARENT OPENING SIZE	ASTM D-4751	40 US SIEVE
FLOW RATE	ASTM D-4491	40 GAL/MIN/SQ.FT
PERMITTIVITY	ASTM D-4491	0.55 SEC -1

HI-FLOW SILTSACK
(FOR AREAS OF MODERATE TO HEAVY PRECIPITATION AND RUN-OFF)

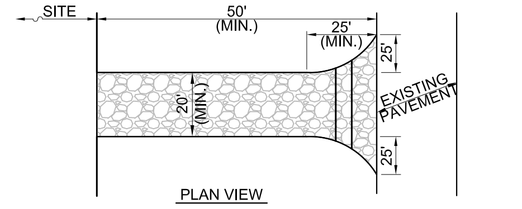
PROPERTIES	TEST METHOD	UNITS
GRAB TENSILE STRENGTH	ASTM D-4632	265 LBS
GRAB TENSILE ELONGATION	ASTM D-4632	20 %
PUNCTURE	ASTM D-4833	120 LBS
MULLEN BURST	ASTM D-3786	420 PSI
TRAPEZOID TEAR	ASTM D-4533	40 LBS
UV RESISTANCE	ASTM D-4355	90 %
APPARENT OPENING SIZE	ASTM D-4751	20 US SIEVE
FLOW RATE	ASTM D-4491	200 GAL/MIN/SQ.FT
PERMITTIVITY	ASTM D-4491	1.5 SEC -1

OIL-ABSORBANT SILTSACK
(FOR AREAS WHERE THERE IS A CONCERN FOR OIL RUN-OFF OR SPILLS)

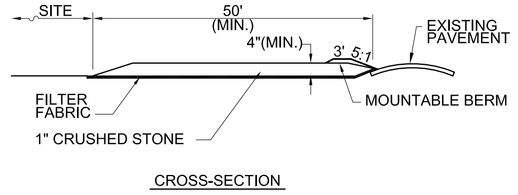
DEPENDING ON YOUR PARTICULAR APPLICATION, THE SILTSACK CAN BE MADE FROM EITHER ONE OF THE ABOVE FABRICS WITH AN OIL-ABSORBANT PILLOW INSERT OR, MADE COMPLETELY FROM AN OIL-ABSORBANT SILTSACK , WITH A WOVEN PILLOW INSERT.



SILT SACK DETAIL
NOT TO SCALE



PLAN VIEW

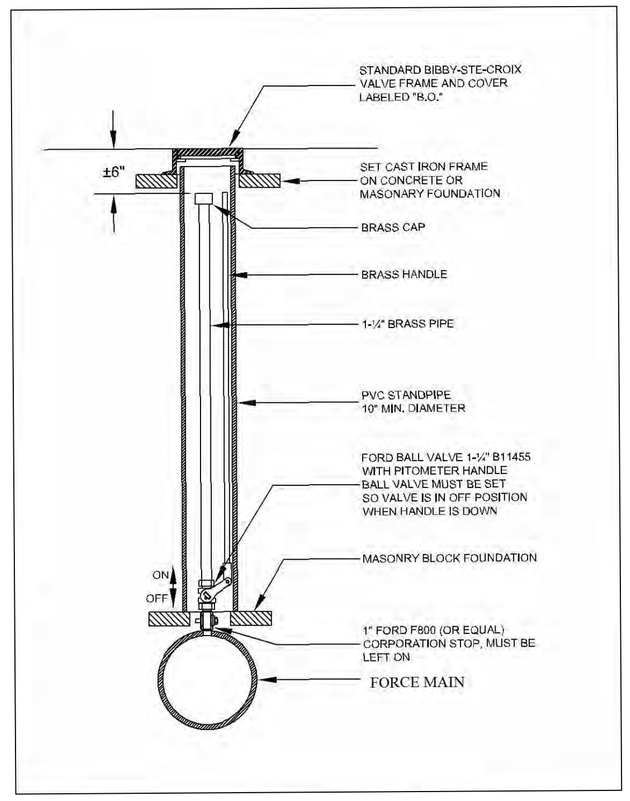


CROSS-SECTION

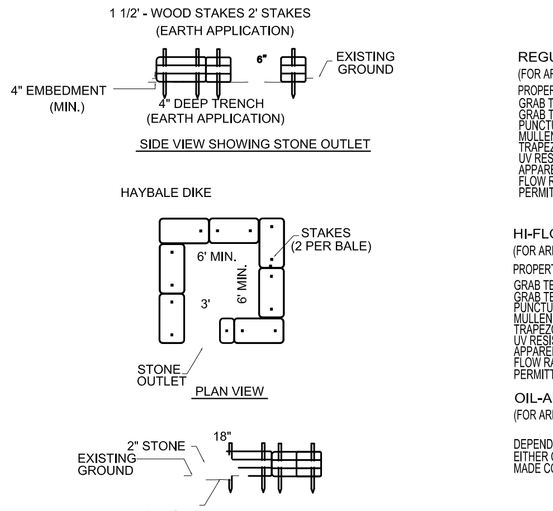
NOTES:

1. ENTRANCE WIDTH SHALL BE A EIGHTEEN (18) FOOT MINIMUM, BUT NOT LESS THAN THE FULL WIDTH AT POINTS WHERE INGRESS OR EGRESS OCCURS. THE ENTRANCE PAD SHALL BE PLACED AT THE PROPOSED ENTRANCE TO PADDOCK CIRCLE.
2. THE ENTRANCE SHALL BE MAINTAINED IN A CONDITION WHICH SHALL PREVENT TRACKING OR FLOWING OF SEDIMENT ONTO PUBLIC RIGHTS-OF-WAY. THIS MAY REQUIRE PERIODIC TOP DRESSING WITH ADDITIONAL STONE AS CONDITIONS DEMAND AND REPAIR OR CLEANOUT OF ANY MEASURES USED TO TRAP SEDIMENT. ALL SEDIMENT SPILLED, DROPPED, WASHED OR TRACKED ONTO PUBLIC RIGHTS-OF-WAY MUST BE REMOVED IMMEDIATELY . BERM SHALL BE PERMITTED. PERIODIC INSPECTION AND MAINTENANCE SHALL BE PROVIDED AS NEEDED.
3. USE 4-8" QUARRY SPILL STONES.

CONSTRUCTION ENTRANCE DETAIL
NOT TO SCALE



AIR RELEASE DETAIL
NOT TO SCALE



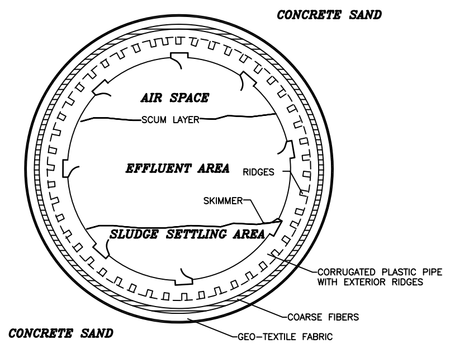
1. WHEN USED ON EXISTING PAVEMENT PLACE HAYBALES AND STONE ON SURFACE OF PAVEMENT. SECURE HAYBALES BY DRIVING 5/8" REBAR THROUGH BALES AND INTO PAVEMENT A MINIMUM OF 6". AFTER USE REMOVE, RODS, AND HAYBALES.
2. BALES SHALL BE INSPECTED PERIODICALLY AND AFTER ALL STORM EVENTS AND REPAIR OR REPLACEMENT SHALL BE PERFORMED PROMPTLY AS NEEDED.

TEMPORARY SEDIMENTATION BASIN
NOT TO SCALE

CONSTRUCTION PROCESS FOR PRESBY SAND BEDS:

INSTALLER TO COMPLY WITH THE MOST RECENT PRESBY ENVIRO-SEPTIC WASTEWATER TREATMENT SYSTEM DESIGN AND INSTALLATION MANUAL FOR MASSACHUSETTS. THE FOLLOWING IS A GENERAL INSTALLATION GUIDE:

1- CONTRACTOR IS TO EXCAVATE TOTAL BOTTOM AREA OF 73'x74' AND 86'x75' TO A DEPTH OF THE C1 LAYER ON SLOPE.
2- CONTRACTOR IS TO TILL ENTIRE BOTTOM HOLE AREA FOR A DEPTH OF 12".
3- TITLE 5 SANDS TO BE PUT IN PLACE TO BOTTOM ELEVATION IMMEDIATELY AFTER TILLING TO PROTECT BED FROM PRECIPITATION DAMAGE.
4- A 6" LAYER OF ASTM C-33 SYSTEM SANDS SHOULD THEN BE PLACED IN CENTER OF HOLE COVERING THE BOTTOM OF THE HOLE TO BOTTOM ELEVATION (SEE SCHEDULE).
5- PIPE NETWORK SHALL BE LAID IN PLACE AND CONNECTED.
6- SYSTEM SAND SHOULD THEN BE PLACED OVER ENTIRE PIPE NETWORK TO A TOP ELEVATION (SEE SCHEDULE).
7- SURROUNDING TITLE 5 SANDS SHOULD BE SET IN PLACE AROUND PERIMETER OF SYSTEM TO MAINTAIN SYSTEM SIZE.
8- COMPLETE VENTING AND INSPECTION PORTS. PORTS SHALL BE INSTALLED PER TITLE 5 AS SHOWN ON SITE PLAN AND DETAILS AS WELL AS 1 PORT IN THE MIDDLE OF EACH ENVIRO SEPTIC LINE.
9- AS-BUILT SHALL BE PERFORMED BY THE DESIGN ENGINEER AND TOWN BOARD OF HEALTH.
10- CLEAN FILL PLACED OVER SYSTEM.
11- AS-BUILT FOR FINAL GRADES BY ENGINEER.



ENVIRO-SEPTIC SYSTEM DETAIL
NOT TO SCALE

NOTES:

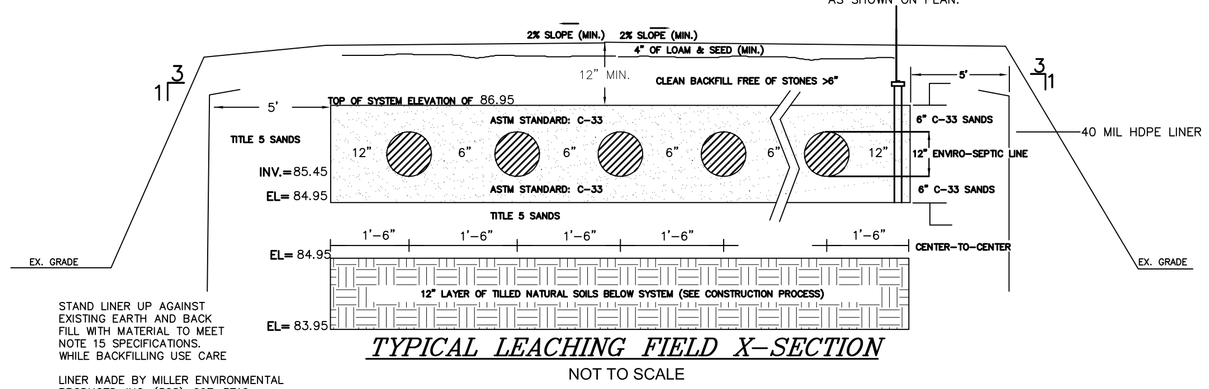
1.) ENVIRO-SEPTIC SUPPLIED BY PRESBY ENVIRONMENTAL INC INNOVATIVE SEPTIC TECHNOLOGIES.(143 AIRPORT ROAD, WHITEFIELD, NH 03598, 1-800-473-5298)

2.) OPERATION AND MAINTENANCE PLAN TO BE OBTAINED BY HOMEOWNER WITH A CERTIFIED INSPECTOR FOR A MINIMUM OF 2YEARS AND MAINTAINED IN ACCORDANCE WITH D.E.P. GUIDELINES FOR REMEDIAL USE.

3.) CURRENTLY, THE SYSTEM SHALL BE MONITORED ANNUALLY WITH ALL DATA SUBMITTED TO THE LOCAL BOARD OF HEALTH AND D.E.P. WITHIN 30 DAYS.

4.) ONLY AN APPROVED INSTALLER WHO HAS ATTENDED THE ENVIRO-SEPTIC CERTIFICATION CLASS CAN BE ALLOWED TO INSTALL THE ENVIRO-SEPTIC WASTEWATER TREATMENT SYSTEM.

MINIMUM OF 2 INSPECTION PORT CONSISTING OF A 4" PERF. PIPE PLACED VERTICALLY DOWN INTO THE STONE TO THE NATURALLY OCCURRING SOIL OR SAND FILL BELOW THE STONE. THE PIPE SHALL BE CAPPED W/ A SCREW TYPE CAP AND ACCESSIBLE TO W/IN 3" OF FINISH GRADE. AS SHOWN ON PLAN.



STAND LINER UP AGAINST EXISTING EARTH AND BACK FILL WITH MATERIAL TO MEET NOTE 15 SPECIFICATIONS. WHILE BACKFILLING USE CARE

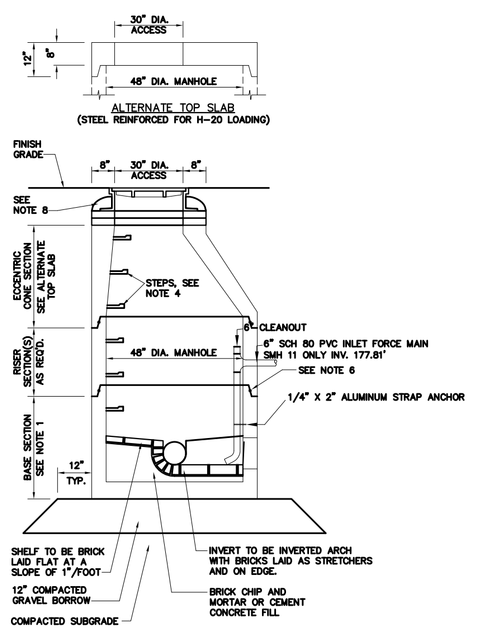
LINER MADE BY MILLER ENVIRONMENTAL PRODUCTS, INC. (508)-697-3710.

TYPICAL LEACHING FIELD X-SECTION
NOT TO SCALE

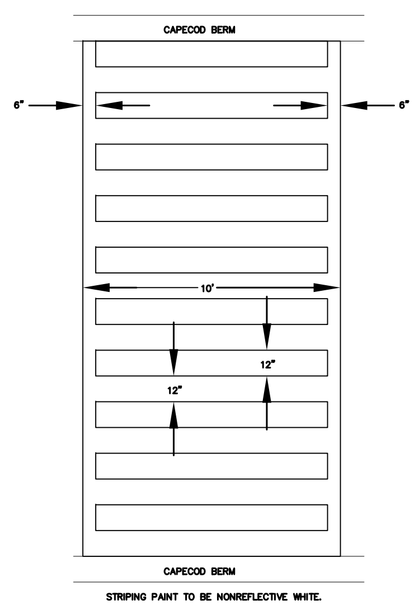
PRESBY SYSTEM DETAILS
NOT TO SCALE

NOTES:

1. BASE SECTION SHALL BE MONOLITHIC WITH A 48" INSIDE DIAMETER.
2. ALL SECTIONS SHALL BE DESIGNED FOR H-20 LOADING.
3. CONCRETE SHALL BE COMPRESSIVE STRENGTH 4000 PSI TYPE I CEMENT.
4. MANHOLE STEPS SHALL BE INSTALLED AT 12" O.C. FOR THE FULL DEPTH OF THE STRUCTURE.
5. ALL EXTERIOR SURFACES SHALL BE GIVEN TWO COATS OF BITUMINOUS WATER-PROOFING MATERIAL.
6. JOINT SEALANT BETWEEN PRECAST SECTIONS SHALL BE PREFORMED BUTYL RUBBER.
7. STANDARD SEWER MANHOLE FRAME AND COVER SHALL MEET MUNICIPAL AND/OR STATE SPECIFICATIONS WHEN APPLICABLE.
8. STANDARD SEWER MANHOLE FRAME AND COVER SHALL BE SET IN FULL MORTAR BED, ADJUST TO GRADE WITH CLAY BRICK AND MORTAR (2 BRICK COURSES TYPICALLY, 5 BRICK COURSES MAXIMUM)



SEWER MANHOLE DETAIL
NOT TO SCALE



CROSSWALK DETAIL
NOT TO SCALE

COMMONWEALTH OF MASSACHUSETTS
ANTHONY A. ESPOSITO
CIVIL
No. 39782
REGISTERED PROFESSIONAL ENGINEER

12/12/2022

REVISIONS:

No.	DESCRIPTION	DATE

PROJECT TITLE:

THE COTTAGES AT OLD OAKEN BUCKET AT #279-281 OLD OAKEN BUCKET ROAD SCITUATE, MA

CONSTRUCTION DETAILS 1 PLAN

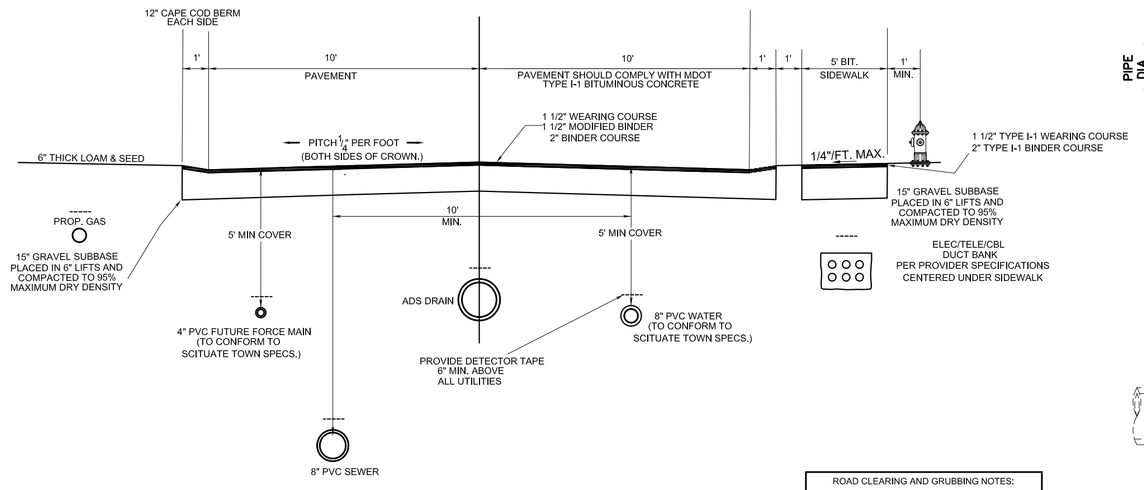
PARCEL 41-1-3-D
PARCEL 41-1-3-0

PREPARED BY:
South Shore Survey Consultants, Inc.
REGISTERED LAND SURVEYORS & CIVIL ENGINEERS
167 R SUMMER STREET
KINGSTON, MA 02364
781-582-2185
mark@ssscinc.net

PREPARED FOR:
LOVENDALE , LLC
S/O SALT MEADOW DEVELOPMENT
107 EAST STREET
DUXBURY, MA 02332

SCALE: 1" = 50'
50 0 50 100

DATE: DECEMBER 12, 2022
COMP./DESIGN: A. ESPOSITO
CHECK: M. D. CASEY
DRAWN: A. ESPOSITO
FIELD: LJL/PS
APPROVED: M. D. CASEY
DWG.No. 1908 DET1
JOB No. 1908
SHEET 10 OF 16

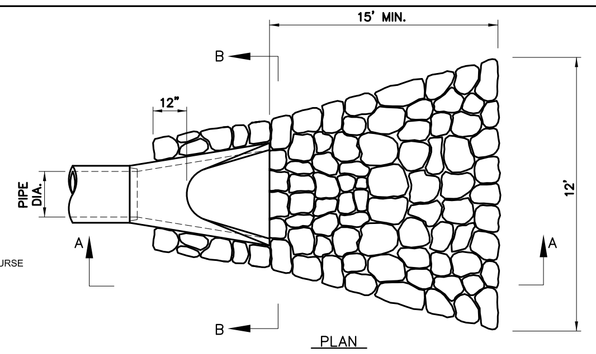


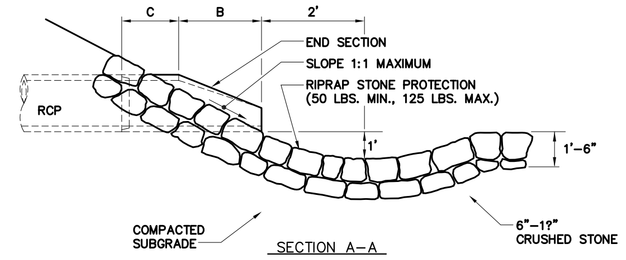
ROAD A SECTION DETAIL

NOT TO SCALE

ROAD CLEARING AND GRUBBING NOTES:
1. 8' MIN. BEYOND BACK OF BERM.
2. 4' MIN BEYOND BACK OF SIDEWALK
3. 10' MIN BEYOND UNDERGROUND UTILITY

AREA TO BE CLEARED AND GRUBBED SHALL BE CLEARED OF ALLSTUMPS, BRUSH AND ROOTS.

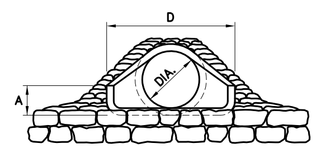




RIP RAP OUTLET PROTECTION

NOT TO SCALE

DIMENSIONAL TABLE						
PIPE DIA.	A	B	C	D	E	R
<=12"	4"	2'-0"	4'-µ"	2'-0"	2"	9"
15"	6"	2'-3"	3'-10"	2'-6"	2?"	11"
18"	9"	2'-3"	3'-10"	3'-0"	2?"	12"
24"	9"	3'-7?"	2'-6"	4'-0"	3"	14"
30"	12"	4'-6"	1'-7"	5'-0"	3?"	15"
36"	15"	5'-3"	2'-10"	6'-0"	4"	20"
42"	21"	5'-3"	2'-11"	6'-6"	4?"	22"
48"	24"	6'-0	2'-2"	7'-0"	5"	22"
54"	27"	5'-5"	2'-11"	7'-6"	5?"	24'
60"	30"	5'-0"	3'-3"	8'-0"	6"	24"



SECTION B-B

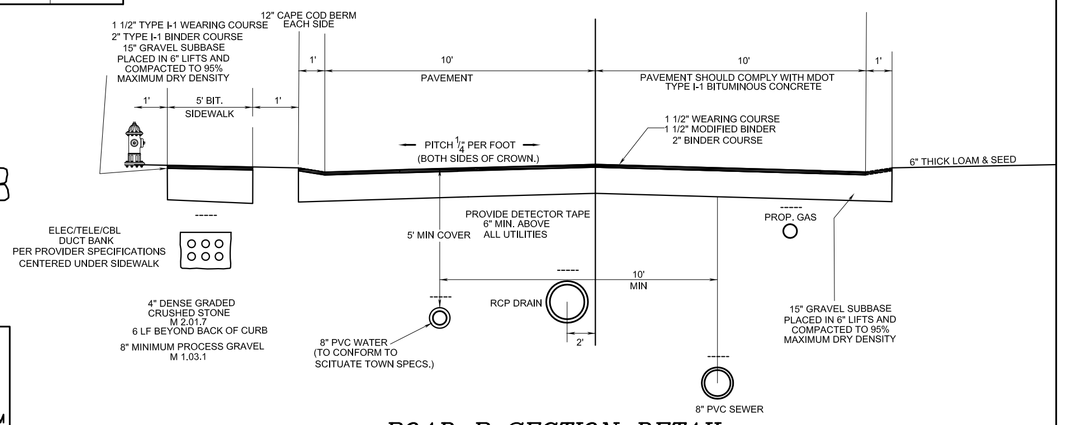
NOTES
1. THE FLARED END SECTION PIPE JOINT SHALL BE SIMILAR TO THE MAIN RUN OF PIPE JOINTS.
2. FLARED END SECTIONS SHALL CONFORM AS SHOWN IN THE TABLE OR AS APPROVED BY THE ENGINEER.

1. All fill, gravel and undisturbed material shall be non-frost susceptible and shall contain not more than ten (10) percent passing the #200 mesh sieve for a minimum depth of four (4) feet below the finished roadway grade.

2. No bituminous concrete may be placed on frozen sub-base in the case of the binder course, or if ambient daytime temperature falls below 50o in the case of the finish/wearing surface.

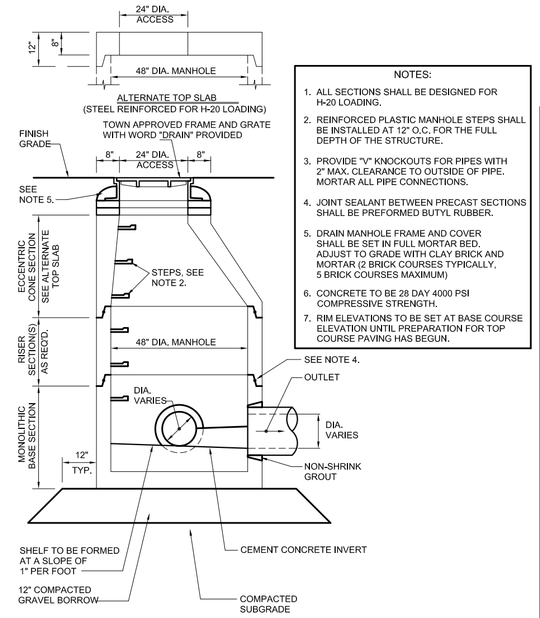
ROAD CLEARING AND GRUBBING NOTES:
1. 8' MIN. BEYOND BACK OF BERM.
2. 4' MIN BEYOND BACK OF SIDEWALK
3. 10' MIN BEYOND UNDERGROUND UTILITY

AREA TO BE CLEARED AND GRUBBED SHALL BE CLEARED OF ALLSTUMPS, BRUSH AND ROOTS.



ROAD B SECTION DETAIL

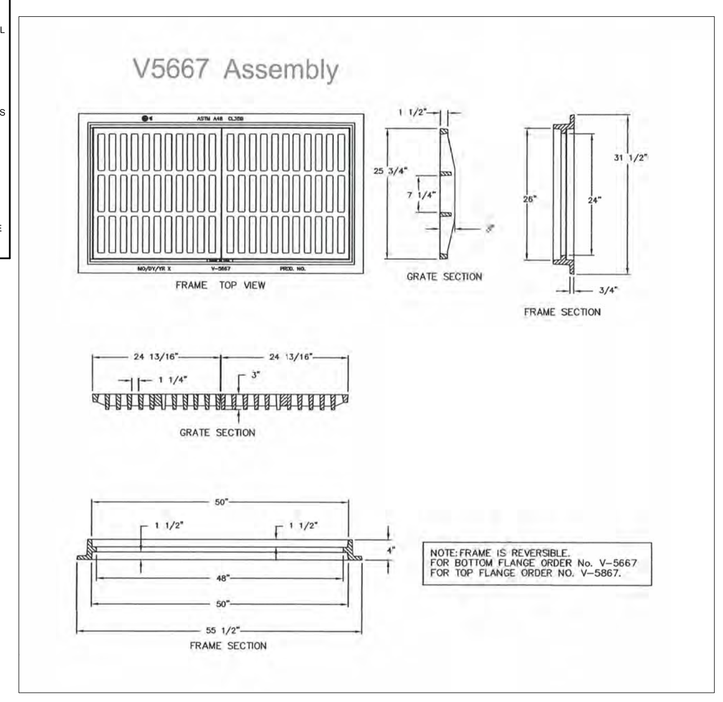
NOT TO SCALE



NOTES:
1. ALL SECTIONS SHALL BE DESIGNED FOR H-20 LOADING.
2. REINFORCED PLASTIC MANHOLE STEPS SHALL BE INSTALLED AT 12" O.C. FOR THE FULL DEPTH OF THE STRUCTURE.
3. PROVIDE "V" KNOCKOUTS FOR PIPES WITH 2" MAX. CLEARANCE TO OUTSIDE OF PIPE. MORTAR ALL PIPE CONNECTIONS.
4. JOINT SEALANT BETWEEN PRECAST SECTIONS SHALL BE PREFORMED BUTYL RUBBER.
5. DRAIN MANHOLE FRAME AND COVER SHALL BE SET IN FULL MORTAR BED, ADJUST TO GRADE WITH CLAY BRICK AND MORTAR.(2 BRICK COURSES TYPICALLY, 5 BRICK COURSES MAXIMUM)
6. CONCRETE TO BE 28 DAY 4000 PSI COMPRESSIVE STRENGTH.
7. RIM ELEVATIONS TO BE SET AT BASE COURSE ELEVATION UNTIL PREPARATION FOR TOP COURSE PAVING HAS BEGUN.

DRAIN MANHOLE DETAIL

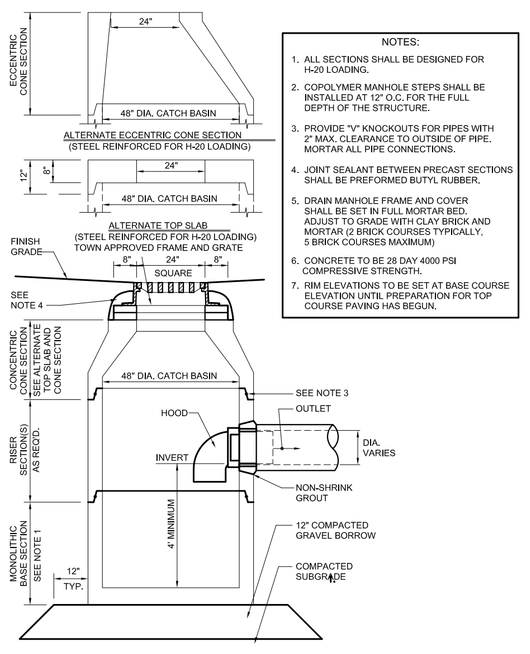
NOT TO SCALE



NOTE: FRAME IS REVERSIBLE. FOR BOTTOM FLANGE ORDER No. V-5667 FOR TOP FLANGE ORDER NO. V-5867.

DOUBLE CATCH BASIN RIM FOR DCB 15 DETAIL

NOT TO SCALE

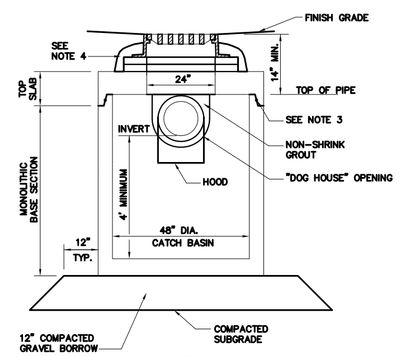


NOTES:
1. ALL SECTIONS SHALL BE DESIGNED FOR H-20 LOADING.
2. COPOLYMER MANHOLE STEPS SHALL BE INSTALLED AT 12" O.C. FOR THE FULL DEPTH OF THE STRUCTURE.
3. PROVIDE "V" KNOCKOUTS FOR PIPES WITH 2" MAX. CLEARANCE TO OUTSIDE OF PIPE. MORTAR ALL PIPE CONNECTIONS.
4. JOINT SEALANT BETWEEN PRECAST SECTIONS SHALL BE PREFORMED BUTYL RUBBER.
5. DRAIN MANHOLE FRAME AND COVER SHALL BE SET IN FULL MORTAR BED, ADJUST TO GRADE WITH CLAY BRICK AND MORTAR (2 BRICK COURSES TYPICALLY, 5 BRICK COURSES MAXIMUM)
6. CONCRETE TO BE 28 DAY 4000 PSI COMPRESSIVE STRENGTH.
7. RIM ELEVATIONS TO BE SET AT BASE COURSE ELEVATION UNTIL PREPARATION FOR TOP COURSE PAVING HAS BEGUN.

CATCH BASIN DETAIL

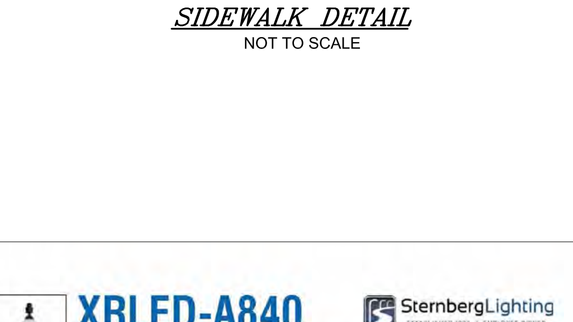
NOT TO SCALE

NOTES:
1. ALL SECTIONS SHALL BE DESIGNED FOR H-20 LOADING.
2. COPOLYMER MANHOLE STEPS SHALL BE INSTALLED AT 12" O.C. FOR THE FULL DEPTH OF THE STRUCTURE.
3. PROVIDE "V" KNOCKOUTS FOR PIPES WITH 2" MAX. CLEARANCE TO OUTSIDE OF PIPE. MORTAR ALL PIPE CONNECTIONS.
4. JOINT SEALANT BETWEEN PRECAST SECTIONS SHALL BE PREFORMED BUTYL RUBBER.
5. DRAIN MANHOLE FRAME AND COVER SHALL BE SET IN FULL MORTAR BED, ADJUST TO GRADE WITH CLAY BRICK AND MORTAR (2 BRICK COURSES TYPICALLY, 5 BRICK COURSES MAXIMUM)
6. INSTALL GAS TRAP AT OUTLET IN ACCORDANCE WITH LOCAL REGULATIONS.



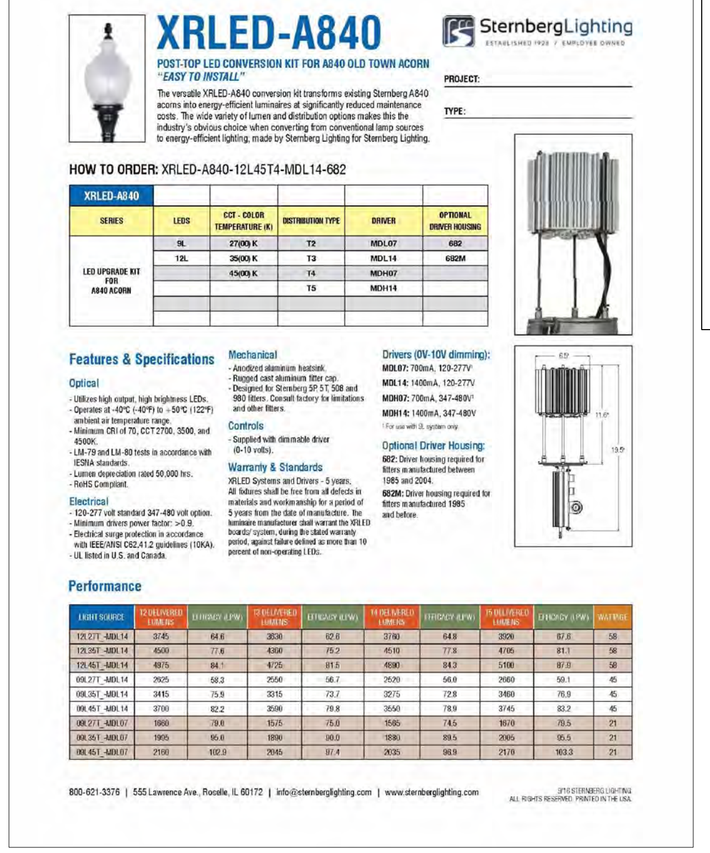
SHALLOW CATCH BASINS DETAIL

NOT TO SCALE



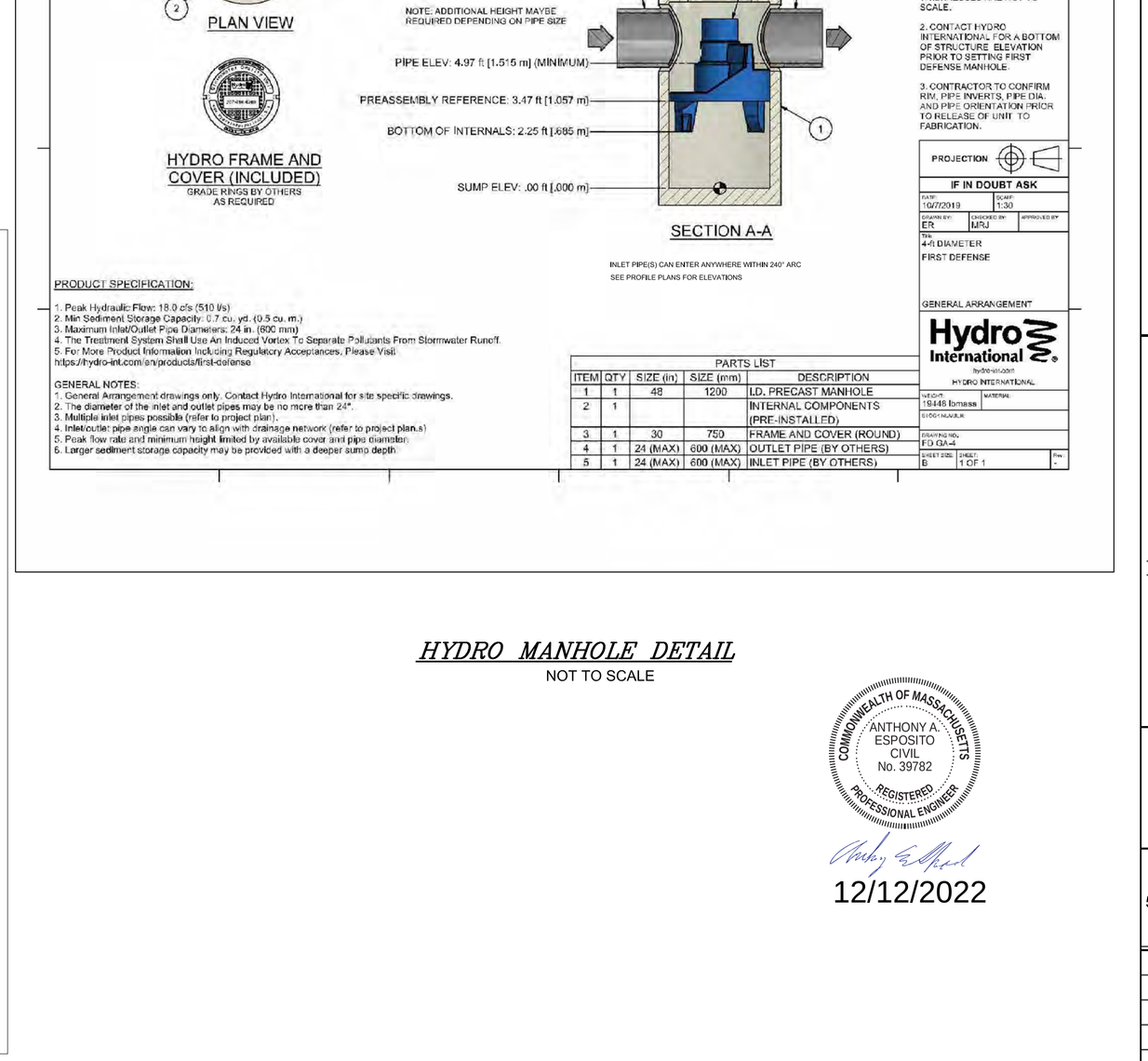
SIDEWALK DETAIL

NOT TO SCALE



STREET LIGHT DETAIL

NOT TO SCALE



HYDRO MANHOLE DETAIL

NOT TO SCALE

COMMONWEALTH OF MASSACHUSETTS
ANTHONY A. ESPOSITO
CIVIL
No. 39782
REGISTERED PROFESSIONAL ENGINEER

12/12/2022

REVISIONS:

No.	DESCRIPTION	DATE

PROJECT TITLE:

THE COTTAGES AT OLD OAKEN BUCKET AT #279-281 OLD OAKEN BUCKET ROAD SCITUATE, MA

CONSTRUCTION DETAILS 2 PLAN

PARCEL 41-1-3-D
PARCEL 41-1-3-0

PREPARED BY:
South Shore Survey Consultants, Inc.
REGISTERED LAND SURVEYORS & CIVIL ENGINEERS
167 R SUMMER STREET
KINGSTON, MA 02364
781-582-2185
mark@ssscinc.net

PREPARED FOR:
LOVENDALE , LLC
S/O SALT MEADOW DEVELOPMENT
107 EAST STREET
DUXBURY, MA 02332

SCALE: 1" = 50'
50 0 50 100

DATE: DECEMBER 12, 2022
COMP./DESIGN: A. ESPOSITO
CHECK: M. D. CASEY
DRAWN: A, ESPOSITO
FIELD: LJL/PS
APPROVED: M. D. CASEY
DWG.No. 1908 DET2
JOB No. 1908
SHEET 11 OF 16

NOTES:

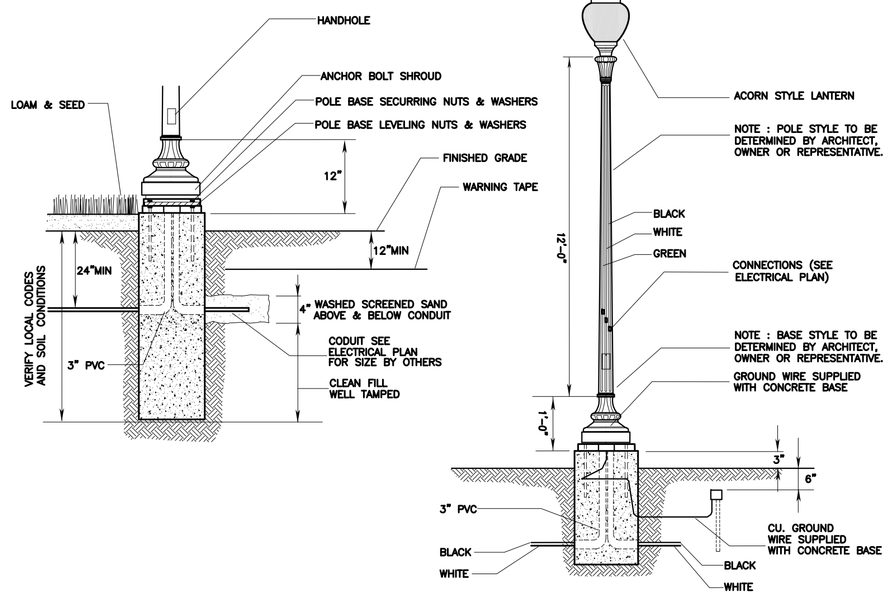
LIGHT TO MEET LOCAL FOOTCANDLE REQUIREMENTS.

LIGHTING SUPPLIER TO DETERMINE WIND LOADS AND LOCAL ORDINANCES PRIOR TO CONSTRUCTION.

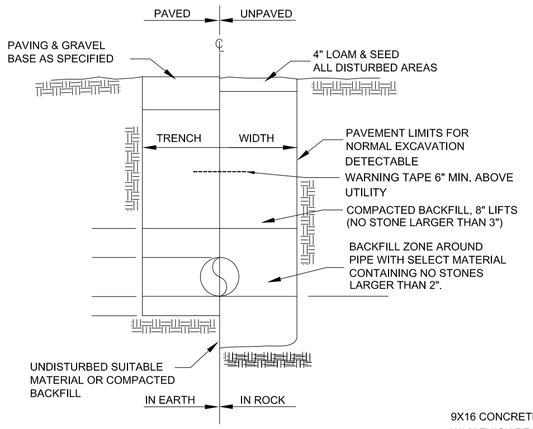
LIGHT POLE TO BE FURNISHED AND INSTALLED BY THE ELECTRICAL CONTRACTOR.

LIGHT ,BASE AND POLE STYLES TO BE DETERMINED PRIOR TO CONTRACT BID . DETAILS OF LIGHT COMPONENTS SHALL BE PROVIDED BY MANUFACTURE AND APPROVED BY ARCHITECT PRIOR TO ANY CONSTRUCTION.

STYLE NO.
2207 POLE
CAST ALUMINUM
WITH LUMINAIRE
STYLE NO. 5100
ACORN AND FITTER.
AVAILABLE IN
HEIGHTS UP TO FROM
(12') TO
(18') PLUS LUMINAIRE.
AVAILABLE UP TO;
200 W INCANDESCENT,
150 W H.P.S. OR
175 W M.V.



STREET LIGHT DETAIL
NOT TO SCALE



TRENCH DETAIL
NOT TO SCALE

BUOYANCY CALCULATIONS
MAXIMUM GROUNDWATER ELEVATION = **77.90**

VALVE CHAMBER
PROPOSED TANK BOTTOM ELEV. =
1. BUOYANCY FORCE ON EMPTY TANK:
VOLUME DISPLACED = 9' X 7' X (**77.90 – 77.00**)
= **56.7**C.F.
WT. OF DISPLACED WATER = **56.7**C.F. X 62.4 #/C.F.
=**3,538.08** #↑

2. WEIGHT OF EMPTY TANK:
VOLUME: TOP SLAB = 9' X 7' X 0.67' = 42.21 CF
BOTTOM SLAB = 9' X 7' X 0.5' = 31.50 CF
ENDS = 2 X (6.00' X 7' X 0.5') = 42 .C.F.
SIDES = 2 X (9' X 7' X 0.5') = 63 C.F.

TOTAL VOLUME = 178.71 C.F.
WT. OF EMPTY TANK = 178.71 C.F. X 150 #/C.F.
= 26,806.5 #↓ GOOD

BUOYANCY CALCULATIONS
MAXIMUM GROUNDWATER ELEVATION = **77.90**

PUMP CHAMBER
PROPOSED TANK BOTTOM ELEV. =
1. BUOYANCY FORCE ON EMPTY TANK:
VOLUME DISPLACED = 10.33' X 17.33' X (**77.90 – 67.28**)
= **1,901.18** C.F.
WT. OF DISPLACED WATER = **1,901.18**C.F. X 62.4 #/C.F.
=**118,633.68**#↑

2. WEIGHT OF EMPTY TANK:
VOLUME: TOP SLAB = 10.33' X 17.33' X 0.67' = 119.95 CF
BOTTOM SLAB = 10.33' X 17.33' X 0.5' = 89.51 CF
ENDS = 2 X (9.00' X 11.19' X 0.5') = 100.71 C.F.
SIDES = 2 X (17.33' X 11.19' X 0.5') = 193.93 C.F.
FILLET = 0.5 X (1' X 1' X 46') = 23 C.F.
TOTAL VOLUME = 527.10 C.F.
WT. OF EMPTY TANK = 527.10 C.F. X 150 #/C.F.
= 79,065 #↓NO GOOD

3. USE 14.33'W X 21.33'L X 1'D SLAB FOR BALLAST
BUOYANCY FORCE ON BALLAST
VOLUME DISPLACED = 14.33'W X 21.33'L X 1'D=305.66 CF
WT. OF DISPLACED WATER = 305.66 X 62.4=19,073.12 #↑

BALLAST VOLUME = 14.33'W X 21.33'L X 1'=305.66 CF
WT. OF CONCRETE = 305.66 CF X 150=45,849 #

4. SUM OF FORCES FROM BACKFILL
SUM OF BACKFILL FORCE: 2'W X (14.33+14.33+17.33+17.33) X (85.5–67.28) X 120 #=276,885.70 #↓

4. SUM OF FORCES
SUM OF BOUYANT FORCE: 118,633.68 + 19,073.12 =137,706.80 #↑
SUM OF DOWNWARD FORCE: 45,849 + 79,065 + 276,885.70 =401,799.70 #↓

PUMP CALCULATIONS

DESIGN FLOW = **7,920** GPD

VOLUME OF DELIVERY PIPE = 3.14 X (2"/12 FT)^2 X **135**FT = **14.22** C.F.
= **11.77** C.F. X 7.48 GAL/C.F. = **88.03** GAL.

TOTAL FLOW PLUS PIPE VOLUME SHALL APPLIED IN 8 DOSES.
(7,920 GPD +88.03 GALS)/8 = 1,002 GALS/DOSE

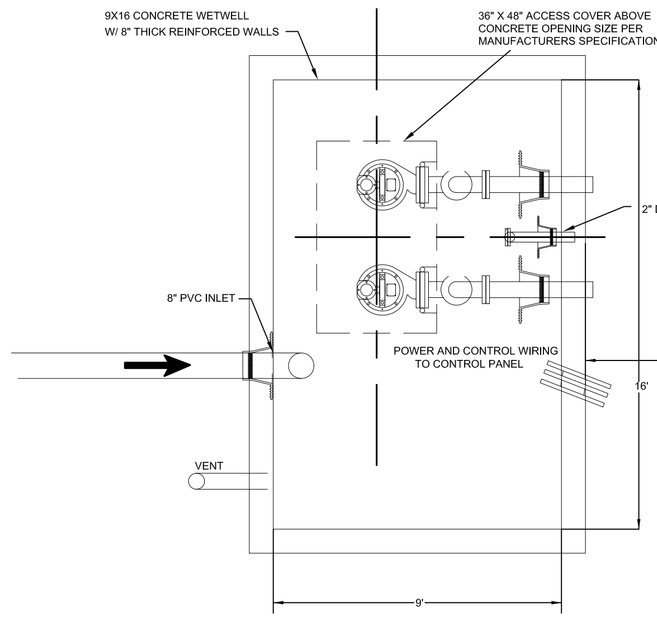
$\frac{1{,}002 \text{ GALLONS}}{7.48 \text{ GAL/FT}^3}$ = **133.96** FT^3

AREA OF PUMP CHAMBER = 9' X 16' = 144 SF.
DEPTH PUMPED PER CYCLE = $\left(\frac{133.96 \text{ CF}}{144.00 \text{ SF}}\right)$ = **0.93**'

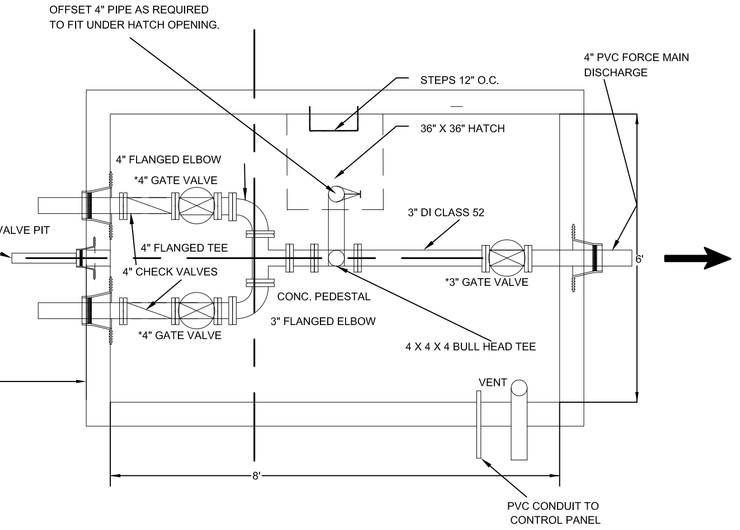
AMOUNT OF HEAD REQUIRED = (INVERT OF COLLECTION SYSTEM IN) – (ELEVATION OF INTERIOR BOTTOM OF PUMP CHAMBER)
= **85.45** – **67.78** = **17.67**'

FRICTION LOSS
USE A 4" PVC SCHED 80 FORCE MAIN
TRY PUMPING AT ± **100** GPM
EQUIVALENT PIPE LENGTH FOR 2–90° BENDS =22.00'
EQUIVALENT PIPE LENGTH FOR TEE THRU STEM = 22.00'
EQUIVALENT PIPE LENGTH FOR 2–45 DEG. BENDS = 10.00'
EQUIVALENT PIPE LENGTH FOR FULLY OPEN GATE VALVE = 3.00'

TOTAL LENGTH OF PIPE = **135'**+ **22'** + **22'** + **10'** + **3** =**192** LF
FRICTION LOSS PER 100' OF PIPE = **0.19** '
TOTAL LOSS DUE TO FRICTION = (**192** '/(**0.019** '
= **3.648**
TOTAL DYNAMIC HEAD = **17.67**' +**3.65** ' = **21.32** '
USE 22 AND A 2.5 HP DUPLEX PUMP

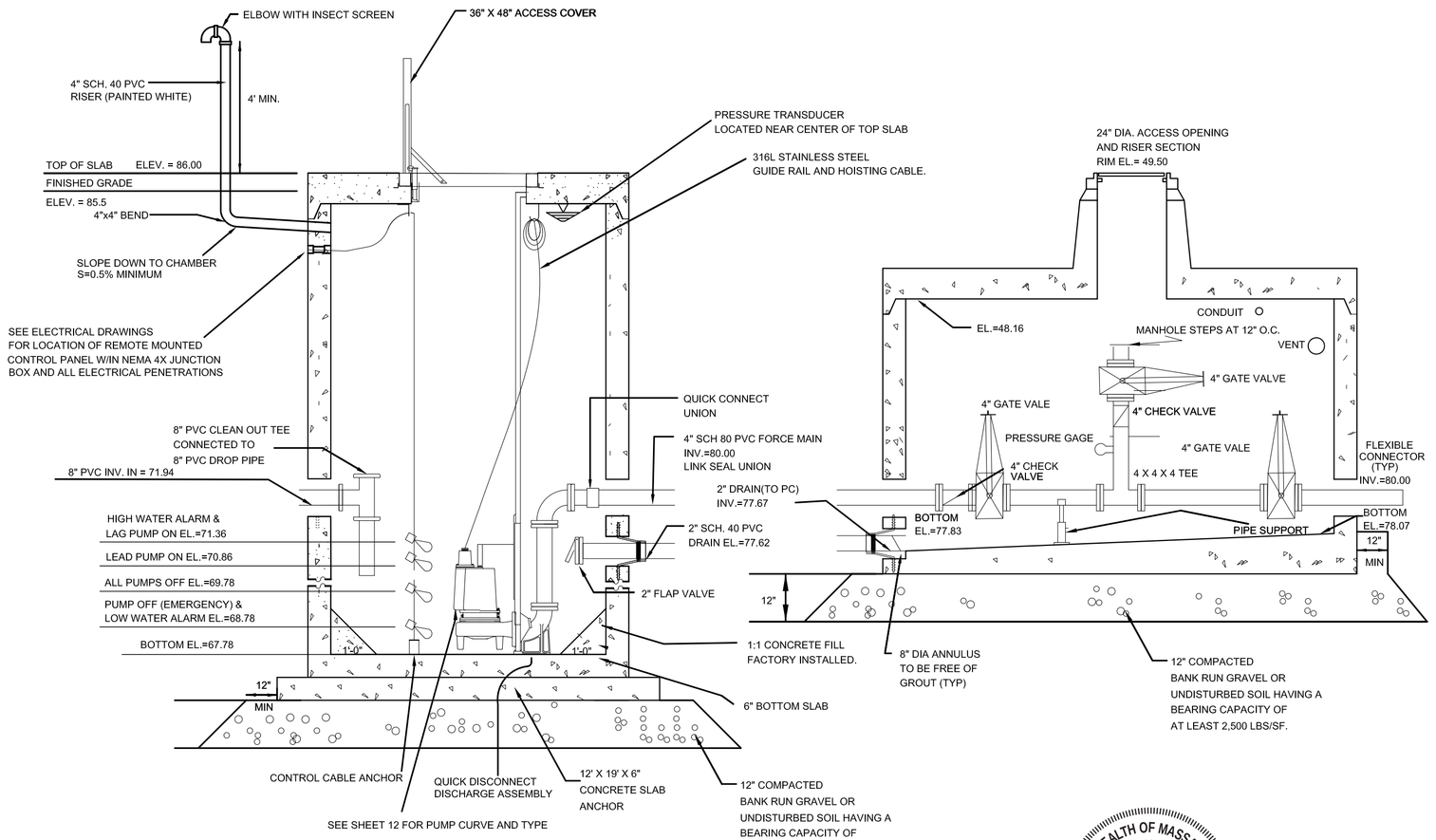


PUMP STATION PLAN
NOT TO SCALE



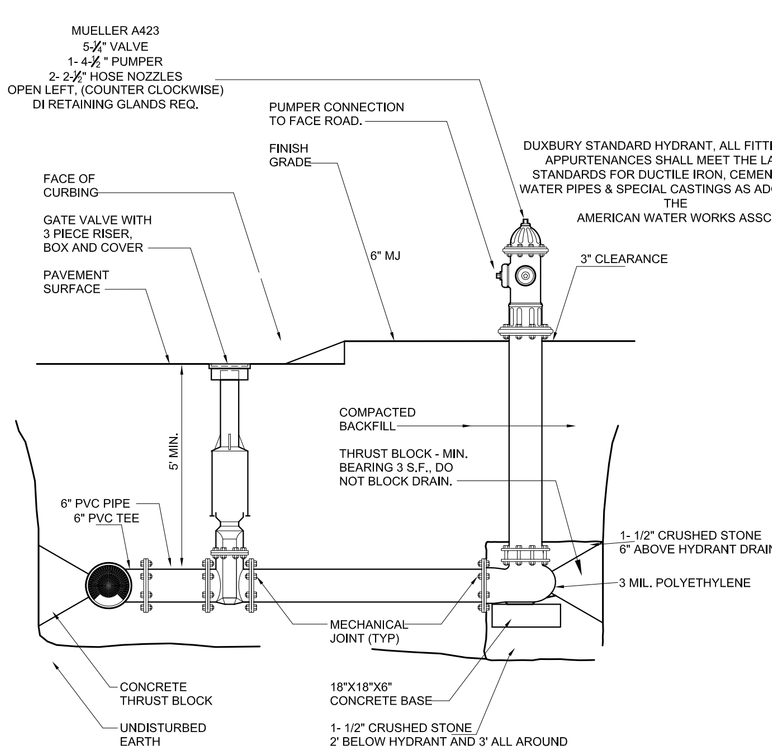
* - 4" GATE VALVE TO BE N.R.S. FLANGE TO FLANGE ENDS.

VALVE CHAMBER PLAN
NOT TO SCALE



SEE SHEET 12 FOR PUMP CURVE AND TYPE

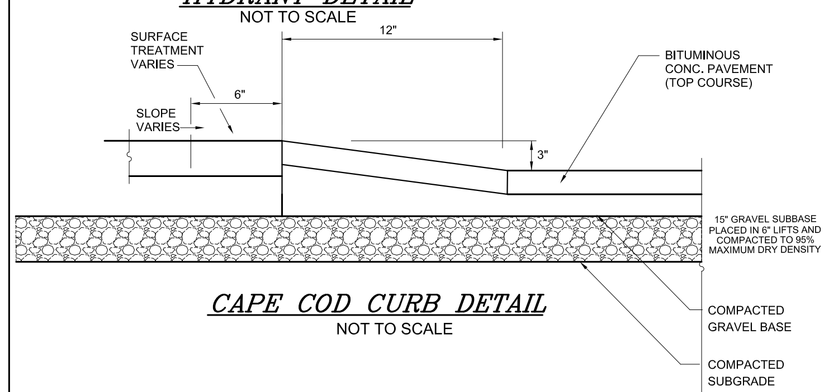
PUMP STATION DETAIL
NOT TO SCALE



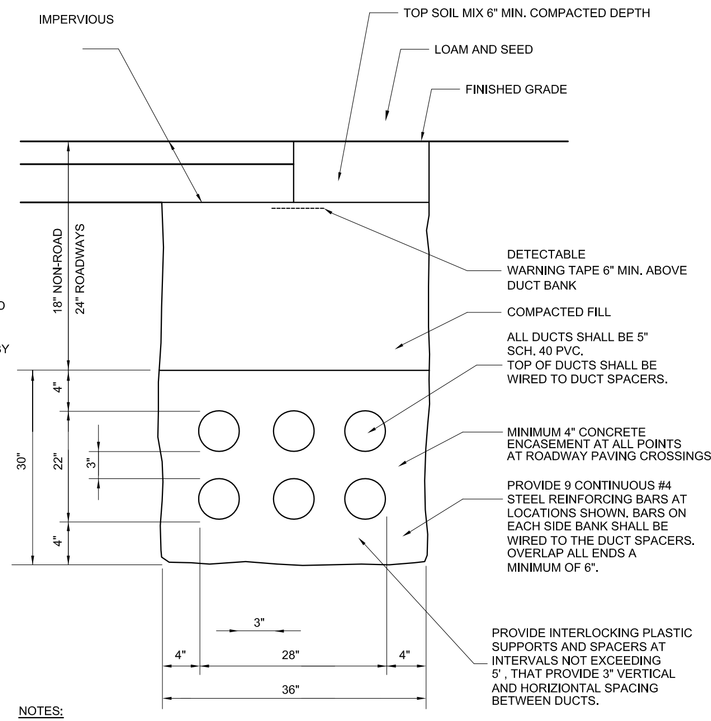
NOTES:
CONCRETE THRUST BLOCKS TO BE USED ONLY WHERE THEY CAN BEAR ON UNDISTURBED EARTH. USE CLAMPS AND TIE RODS OR OTHER ACCEPTABLE METHOD OF JOINT RESTRAINT WHERE SOIL CONDITIONS PROHIBIT THE USE OF THRUST BLOCKS.

ALL VALVES AND FITTINGS ARE TO BE MECHANICAL JOINTS. VALVE BOXES SHALL BE CAST IRON ADJUSTABLE, SLIP AND MANUFACTURED IN NORTH AMERICA. MUELLER, AM, FLOW CONTROL OR CLOW CORP. OPEN LEFT, (COUNTER CLOCKWISE).

HYDRANT DETAIL
NOT TO SCALE

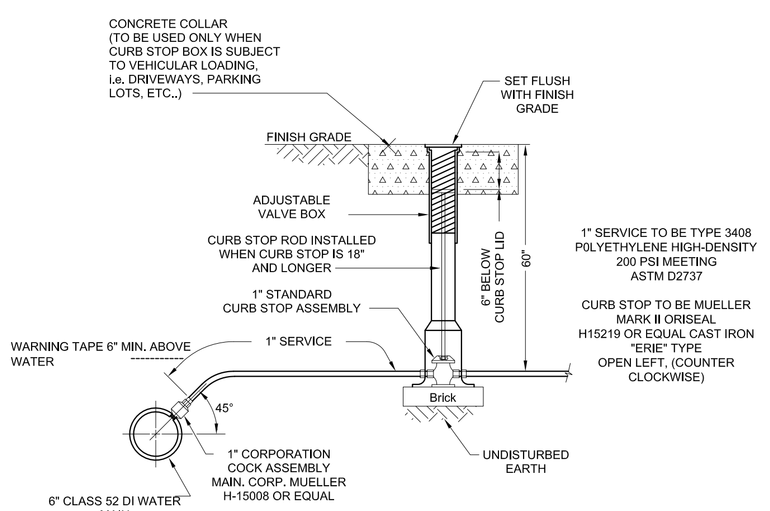


CAPE COD CURB DETAIL
NOT TO SCALE



NOTES:
1. 4000 PSI CONCRETE FILL AROUND DUCTS.
2. CONCRETE MAY BE POURED DIRECTLY INTO OPEN TRENCH WITHOUT FORMWORK.
3. DUCT SPACERS TO BE USED AT 5'-0" CENTERS. BETWEEN DUCTS.

UTILITY TRENCH DETAIL
NOT TO SCALE



WATER SERVICE DETAIL
NOT TO SCALE

REVISIONS:

No.	DESCRIPTION	DATE

PROJECT TITLE:

THE COTTAGES AT OLD OAKEN BUCKET AT #279-281 OLD OAKEN BUCKET ROAD SCITUATE, MA

CONSTRUCTION DETAILS 3 PLAN

PARCEL 41–1–3–D
PARCEL 41–1–3–0

PREPARED BY:
South Shore Survey Consultants, Inc.
REGISTERED LAND SURVEYORS & CIVIL ENGINEERS
167 R SUMMER STREET
KINGSTON, MA 02364
781–582–2185
mark@sssinc.net

PREPARED FOR:
LOVENDALE , LLC
S/O SALT MEADOW DEVELOPMENT
107 EAST STREET
DUXBURY, MA 02332

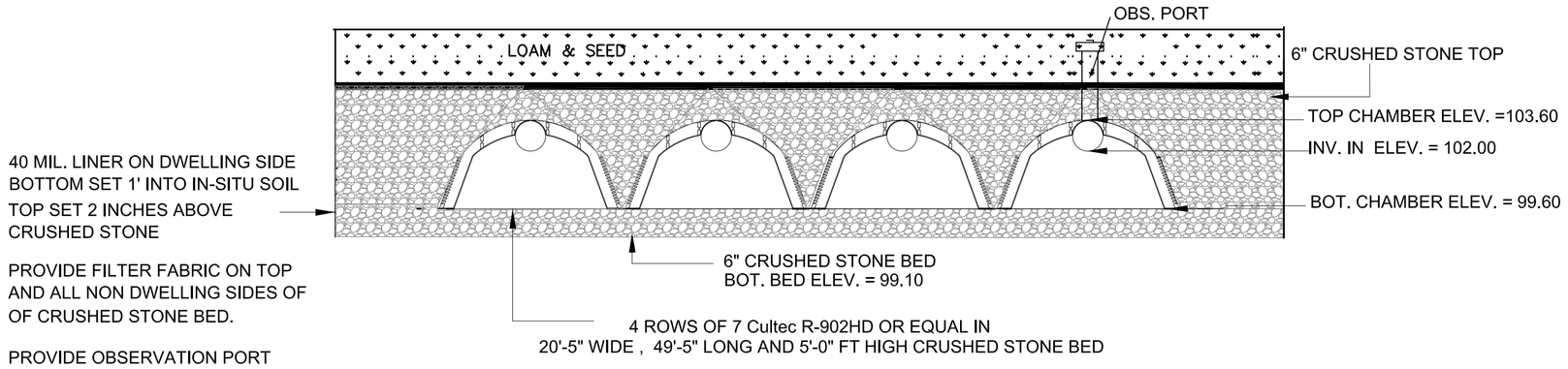
SCALE: 1" = 50'
50 0 50 100

COMMONWEALTH OF MASSACHUSETTS
ANTHONY A. ESPOSITO
CIVIL
No. 39782
REGISTERED PROFESSIONAL ENGINEER

12/12/2022

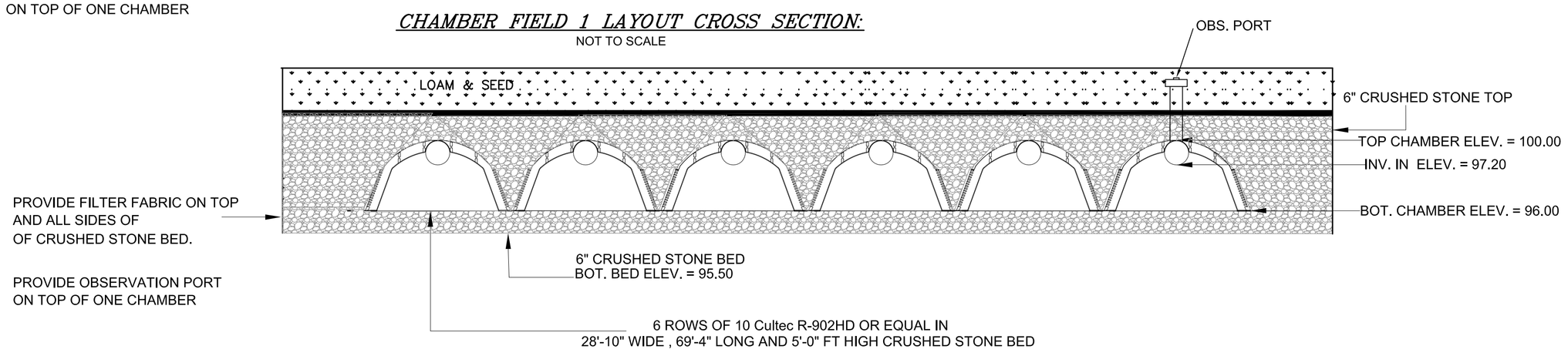
DATE:	DECEMBER 12, 2022
COMP./DESIGN:	A. ESPOSITO
CHECK:	M. D. CASEY
DRAWN:	A. ESPOSITO
FIELD:	LJL/PS
APPROVED:	M. D. CASEY
DWG.No.	1908 DET3
JOB No.	1908

SHEET 12 OF 16



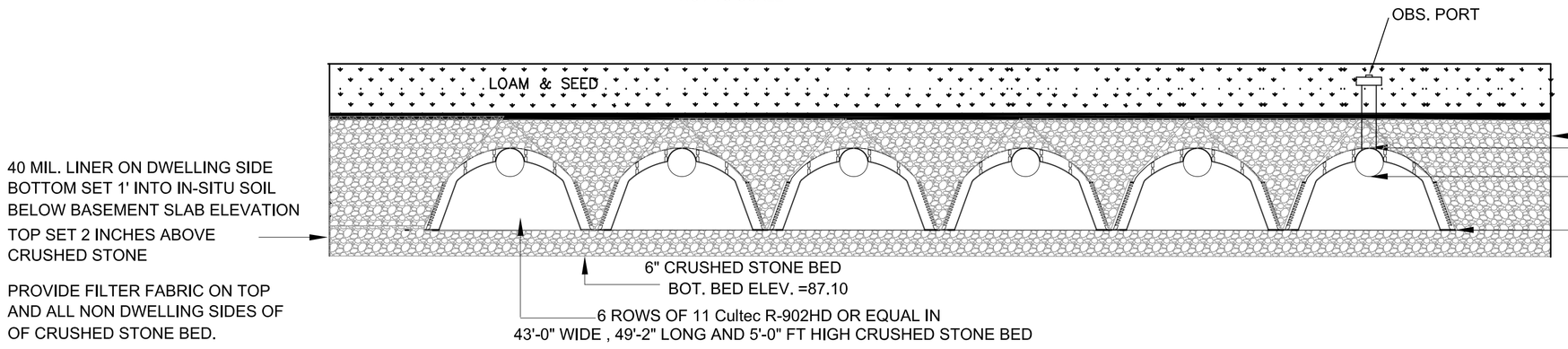
CHAMBER FIELD 1 LAYOUT CROSS SECTION:

NOT TO SCALE



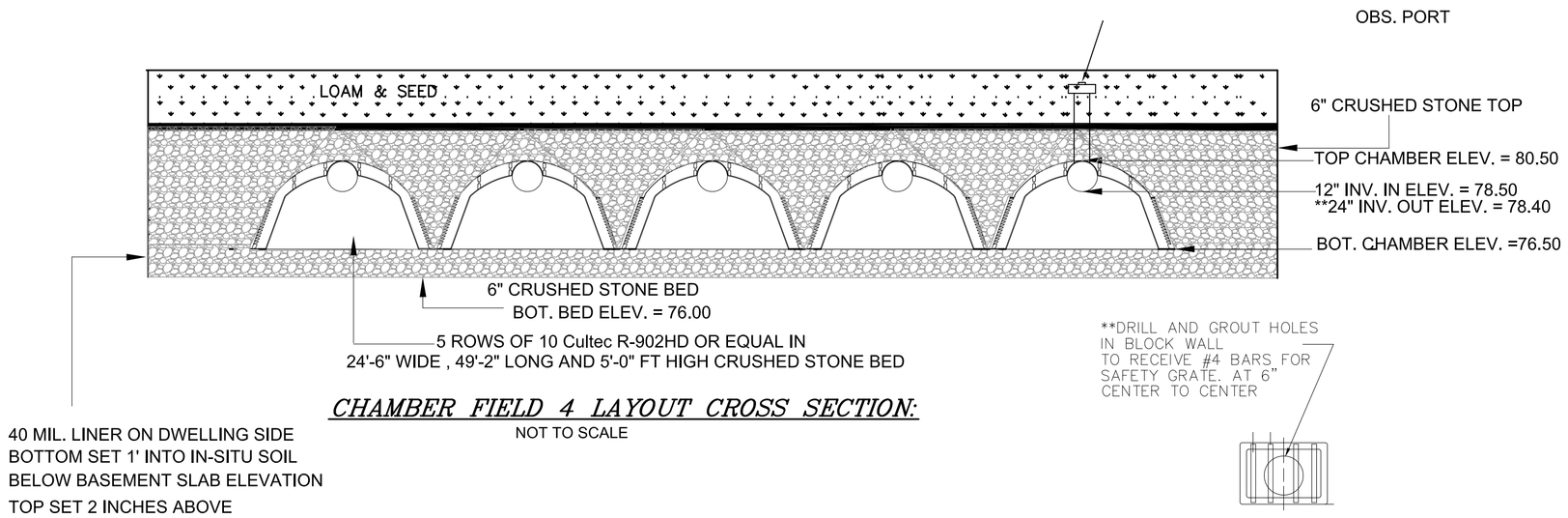
CHAMBER FIELD 2 LAYOUT CROSS SECTION:

NOT TO SCALE



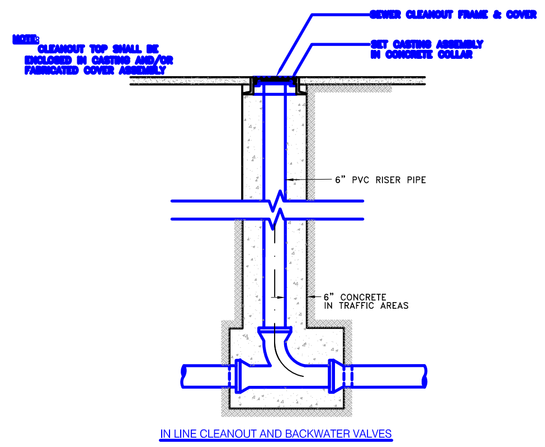
CHAMBER FIELD 3 LAYOUT CROSS SECTION:

NOT TO SCALE



CHAMBER FIELD 4 LAYOUT CROSS SECTION:

NOT TO SCALE



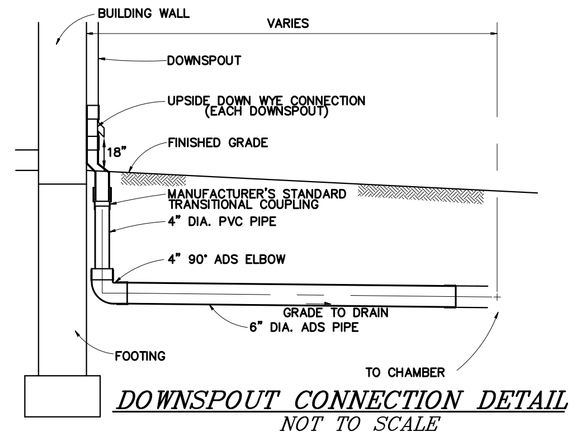
IN LINE CLEANOUT AND BACKWATER VALVES

ACCESS DETAIL

NOT TO SCALE

ROOF LEADER BACKFLOW PREVENTER DETAIL

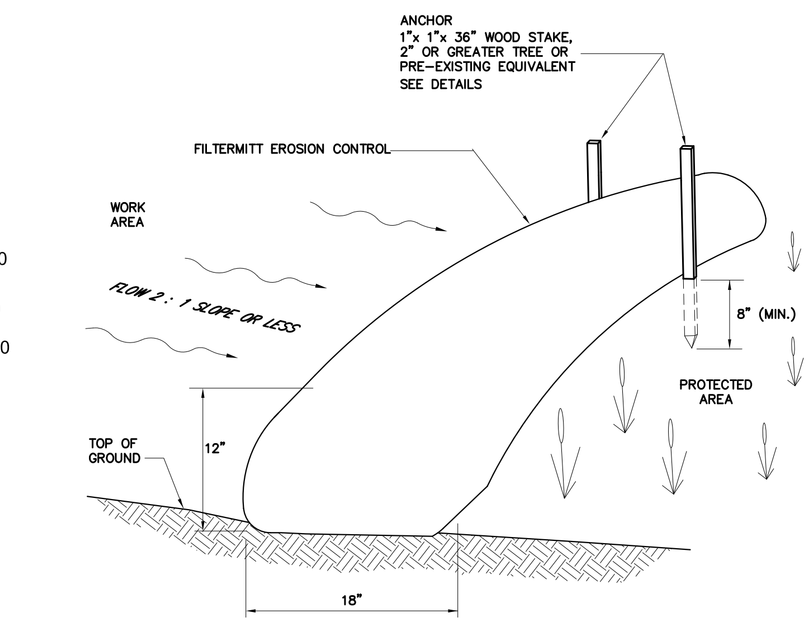
TO BE PROVIDED AT CONNECTIONS OF ROOF LEADERS TO STREET DRAINAGE SYSTEMS

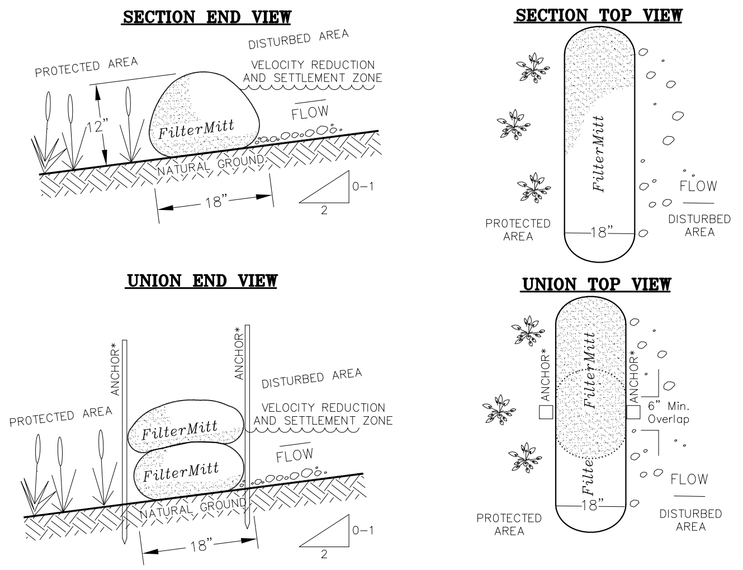


DOWNSPOUT CONNECTION DETAIL

NOT TO SCALE

12/12/2022





*ANCHOR
1"x1"x36" OAK STAKE
OR
2" OR GREATER TREE
OR
OTHER PRE-EXISTING,
EQUIVALENTLY
ANCHORED OBJECT.

FILTERMITT EROSION CONTROL BARRIER DETAIL

NOT TO SCALE

***FilterMitt* COMPONENTS:**

OUTSIDE CASING: 100% organic hessian.

FILLER INGREDIENT: ***FiberRoot Mulch***

A blend of coarse and fine compost and shredded wood.

- Particle sizes: 100% passing a 3" screen; 90–100% passing a 1" screen; 70–100% passing a 0.75" screen; 30–75% passing a 0.25" screen.
- Weight: Approx. 850 lbs./cu.yd. (Ave. 30 lbs./l.f.)

***FilterMitt* INSTALLATION:**

With the newest technology and equipment, sections can be constructed on site in lengths from 1' to 100'.

Sections can also be delivered to the site in lengths from 1' to 8'.

The flexibility of FILTERMITT allows it to conform to any contour or terrain while holding a slightly oval shape at 12" high by 18" wide.

Where section ends meet, there shall be an overlap of 6" or greater. Both sides shall be anchored (oak stakes, trees, etc.) to stabilize the union.

2:1 SLOPES OR LESS

For more information visit:
www.groundscapesexpress.com
or contact us at:
Groundscapes Express, Inc.
P.O. Box 737
Wrentham, MA 02093
(508) 384-7140

REVISIONS:

No.	DESCRIPTION	DATE

PROJECT TITLE:

THE COTTAGES AT OLD OAKEN BUCKET AT #279-281 OLD OAKEN BUCKET ROAD SCITUATE, MA

CONSTRUCTION DETAILS

PARCEL 41-1-3-D
PARCEL 41-1-3-0

PREPARED BY:
South Shore Survey Consultants, Inc.
REGISTERED LAND SURVEYORS
& CIVIL ENGINEERS
167 R SUMMER STREET
KINGSTON, MA 02364
781-582-2185
mark@ssscinc.net

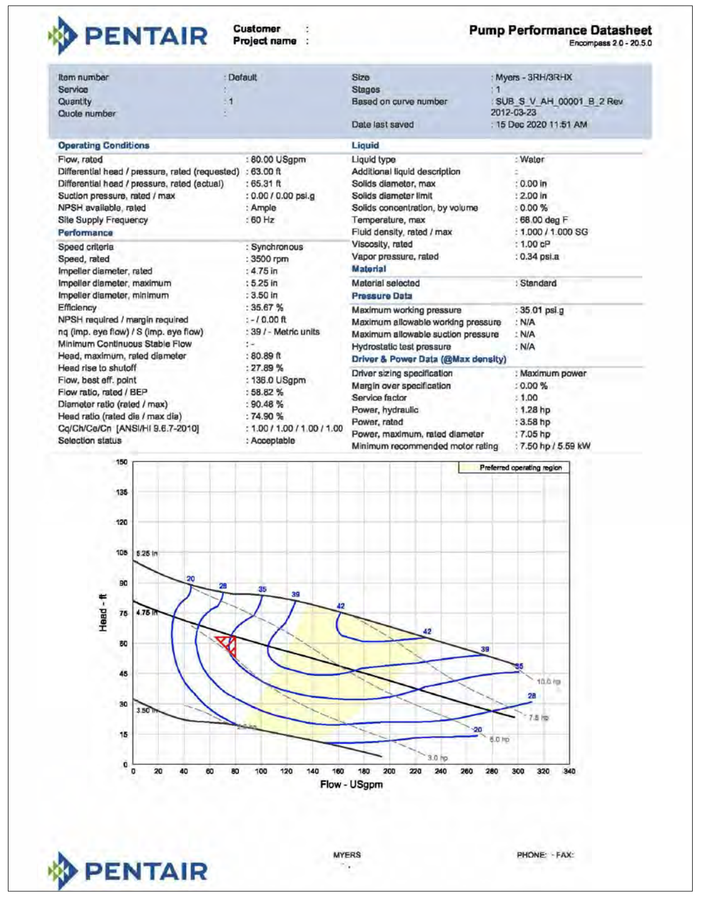
PREPARED FOR:

LOVENDALE , LLC
S/O SALT MEADOW DEVELOPMENT
107 EAST STREET
DUXBURY, MA 02332

SCALE: 1" = 50'

50 0 50 100

DATE: DECEMBER 12, 2022
COMP./DESIGN: A. ESPOSITO
CHECK: M. D. CASEY
DRAWN: A. ESPOSITO
FIELD: LJL/PS
APPROVED: M. D. CASEY
DWG.No. 1908 DET5
JOB No. 1908



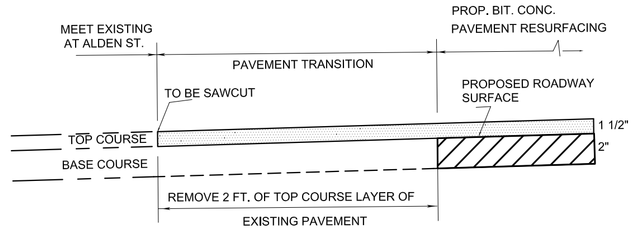
PUMP SELECTION DETAIL

NOT TO SCALE

SEE SHEET 13 FOR CALCULATIONS

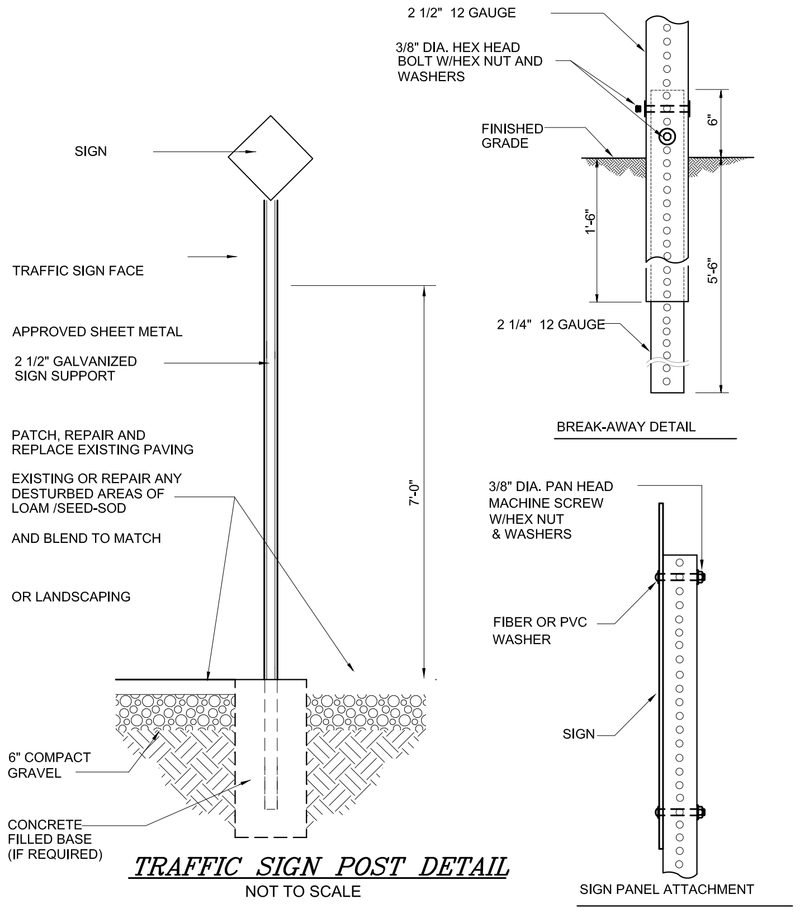
SEGMENTAL RETAINING WALL DETAIL

NOT TO SCALE



OLD OAKEN BUCKET RD. PAVEMENT TRANSISTION DETAIL

NOT TO SCALE

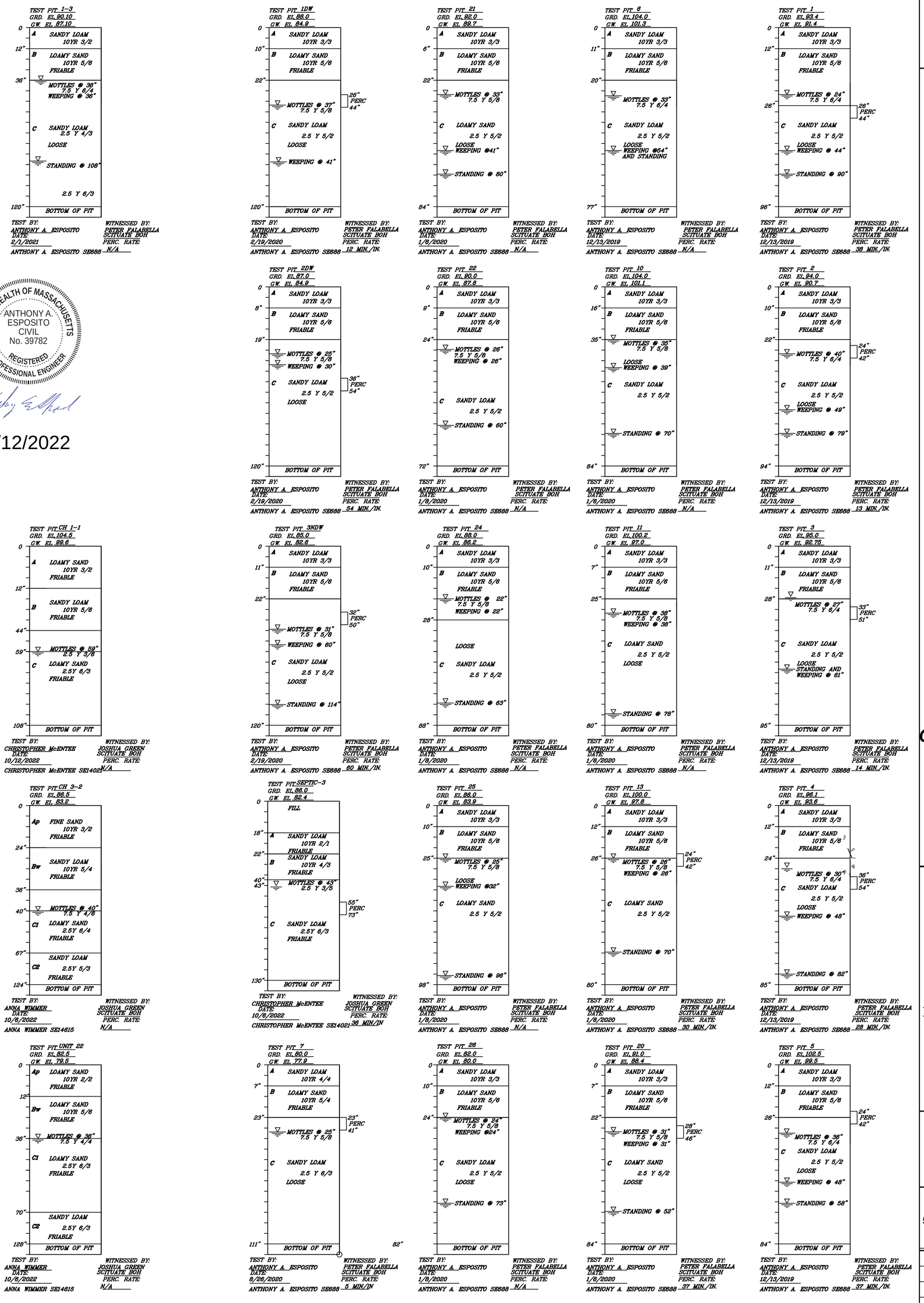


TRAFFIC SIGN POST DETAIL

NOT TO SCALE

COMMONWEALTH OF MASSACHUSETTS
ANTHONY A. ESPOSITO
CIVIL
No. 39782
REGISTERED PROFESSIONAL ENGINEER

12/12/2022



INDICATES TEST PIT

SOIL TEST PIT DATA:

INDICATES OBSERVED GROUND WATER

REVISIONS:

No.	DESCRIPTION	DATE

PROJECT TITLE:

THE COTTAGES AT OLD OAKEN BUCKET AT #279-281 OLD OAKEN BUCKET ROAD SCITUATE, MA

CONSTRUCTION DETAILS & TEST PIT LOGS

PARCEL 41-1-3-D
PARCEL 41-1-3-0

PREPARED BY:
South Shore Survey Consultants, Inc.
REGISTERED LAND SURVEYORS & CIVIL ENGINEERS
167 R SUMMER STREET
KINGSTON, MA 02364
781-582-2185
mark@ssscinc.net

PREPARED FOR:

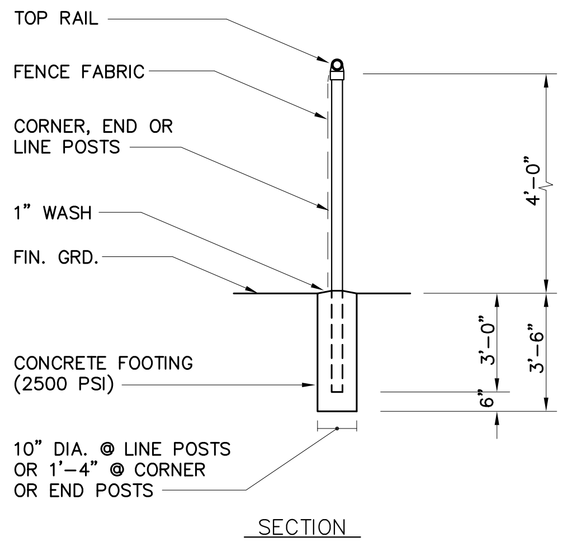
LOVENDALE , LLC
S/O SALT MEADOW DEVELOPMENT
107 EAST STREET
DUXBURY, MA 02332

SCALE: 1" = 50'

50 0 50 100

DATE:	DECEMBER 12, 2022
COMP./DESIGN:	A. ESPOSITO
CHECK:	M. D. CASEY
DRAWN:	A. ESPOSITO
FIELD:	LJL/PS
APPROVED:	M. D. CASEY
DWG.No.	1908 DET4
JOB No.	1908

SHEET 14 OF 16



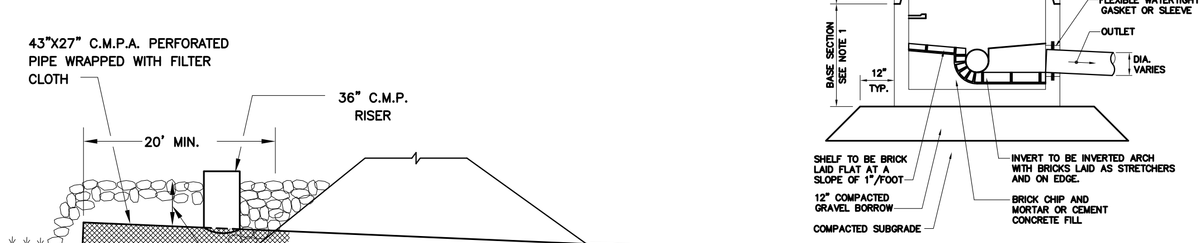
SECTION

NOTES

1. PULL POSTS SHALL BE SPACED AT INTERVALS NOT EXCEEDING 500 FEET.
2. END, GATE AND CORNER POSTS SHALL BE BRACED TO ADJACENT LINE POSTS. (MORE THAN 30° CHANGE IN DIRECTION CONSTITUTES A CORNER)
3. FABRIC SHALL BE 0.148" WIRE, WOVEN INTO APPROXIMATELY 2" DIAMOND MESH.
4. ZINC-COATED STEEL FABRIC BASE METAL SHALL BE COATED WITH PRIME WESTERN SPELTER OR EQUASL.
5. ALUMINUM COATED STEEL FABRIC BASE METAL SHALL BE COATED WITH ALUMINUM ALLOY.
6. FENCE POSTS AND RAILS SHALL RECEIVE THE SAME COATING AND TREATMENT AS THE FENCE FABRIC (DESCRIBED ABOVE).

CHAIN LINK FENCE DETAIL

NOT TO SCALE



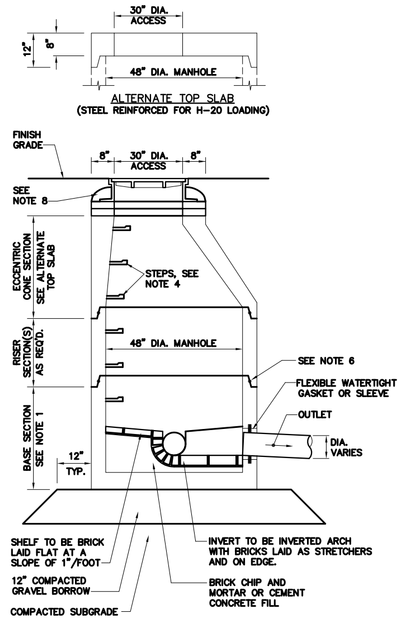
CROSS-SECTION

SPECIFICATIONS

1. AREA UNDER EMBANKMENT AND OUTLET STRUCTURE SHALL BE CLEARED AND GRUBBED. THE POOLING AREA SHALL BE LEFT NATURAL, DISTURBANCE ONLY OCCURING AS REQUIRED FOR MAINTENANCE AND CONSTRUCTION.
2. PERFORATE PIPE WITH HOLES SPACED SIX (6) INCHES VERTICALLY AND HORIZONTALLY. PERFORATIONS SHALL BE LOCATED WITHIN CONCAVE SECTION OF PIPE CORRUGATION. HOLE SIZE SHALL BE APPROXIMATELY THREE-EIGHTHS (3/8) OF AN INCH.
3. CUT A 36" DIAMETER HOLE IN THE TOP OF THE PERFORATED SECTION OF PIPE. WELD A 36" C.M.P. RISER TO PERFORATED PIPE. (SEE SHEET 6 OF 18 FOR ELEVATIONS).
4. TRAP SHALL BE CLEANED WHEN SEDIMENT ACCUMULATES TO APPROXIMATELY ONE HALF (1/2) THE DESIGN DEPTH OF THE TRAP.
5. THE STRUCTURE SHALL BE INSPECTED AFTER EACH RAIN AND REPAIRS MADE AS NEEDED TO ENSURE PROPER FUNCTIONING OF STRUCTURE.

SEDIMENTATION AND DEWATERING DETAIL

NOT TO SCALE



NOTES:

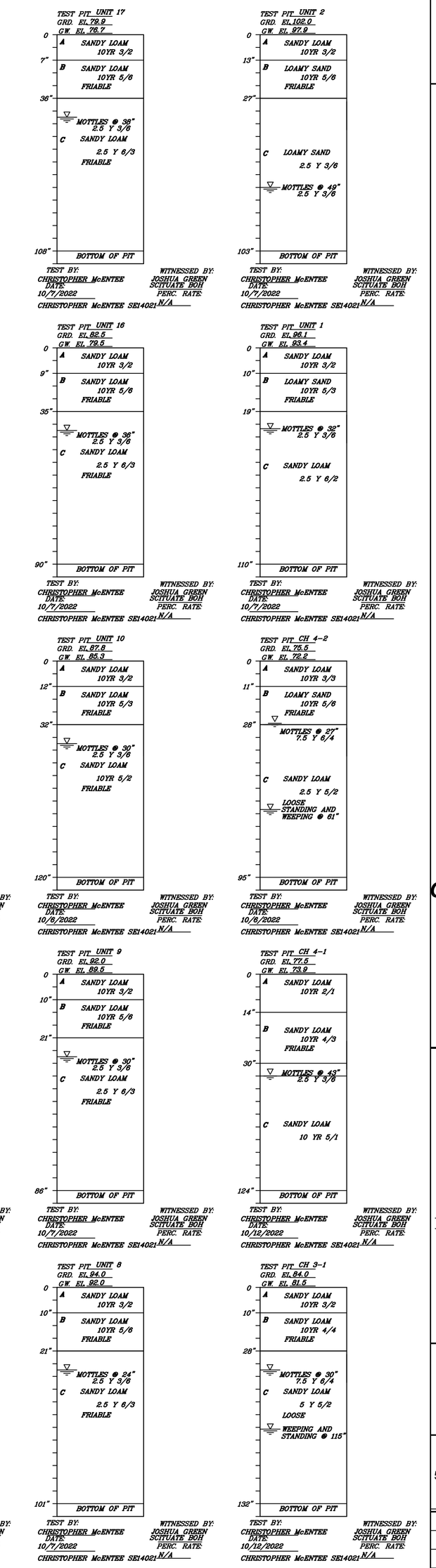
1. BASE SECTION SHALL BE MONOLITHIC WITH A 48" INSIDE DIAMETER.
2. ALL SECTIONS SHALL BE DESIGNED FOR H-20 LOADING.
3. CONCRETE SHALL BE COMPRESSIVE STRENGTH 4000 PSI TYPE II CEMENT.
4. MANHOLE STEPS SHALL BE INSTALLED AT 12" O.C. FOR THE FULL DEPTH OF THE STRUCTURE.
5. ALL EXTERIOR SURFACES SHALL BE GIVEN TWO COATS OF BITUMINOUS WATER-PROOFING MATERIAL.
6. JOINT SEALANT BETWEEN PRECAST SECTIONS SHALL BE PREFORMED BUTYL RUBBER.
7. STANDARD SEWER MANHOLE FRAME AND COVER SHALL MEET MUNICIPAL AND/OR STATE SPECIFICATIONS WHEN APPLICABLE.
8. STANDARD SEWER MANHOLE FRAME AND COVER SHALL BE SET IN FULL MORTAR BED. ADJUST TO GRADE WITH CLAY BRICK AND MORTAR (2 BRICK COURSES TYPICALLY, 5 BRICK COURSES MAXIMUM)

SEWER MANHOLE DETAIL

NOT TO SCALE

COMMONWEALTH OF MASSACHUSETTS
ANTHONY A. ESPOSITO
CIVIL
No. 39782
REGISTERED PROFESSIONAL ENGINEER

12/12/2022



INDICATES TEST PIT

SOIL TEST PIT DATA:

INDICATES GROUND WATER

REVISIONS:

No.	DESCRIPTION	DATE

PROJECT TITLE:

THE COTTAGES AT OLD OAKEN BUCKET AT #279-281 OLD OAKEN BUCKET ROAD SCITUATE, MA

CONSTRUCTION DETAILS & TEST PIT LOGS

PARCEL 41-1-3-D
PARCEL 41-1-3-0

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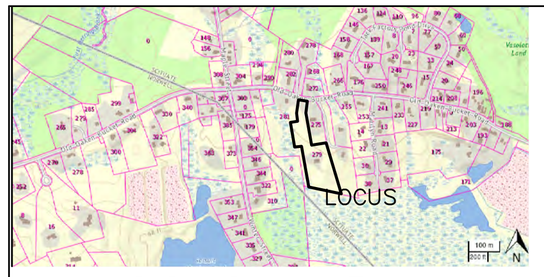
DRAWN: A, ESPOSITO
FIELD: LJL/PS
APPROVED: M. D. CASEY
DWG.No. 1908 DET5
JOB No. 1908



LOCUS MAP NOT TO SCALE

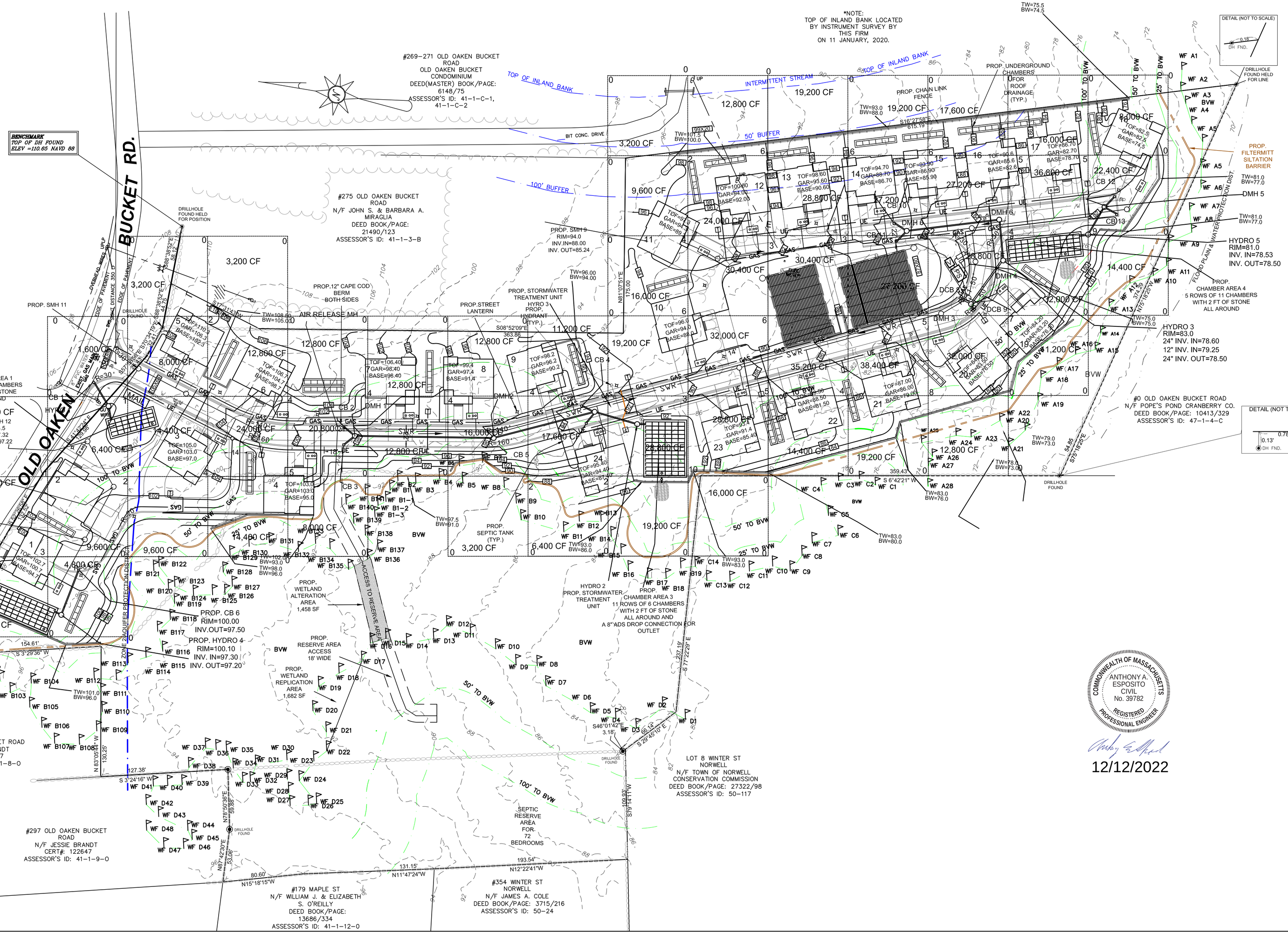
4 4 3,200 CF 4 4 QUANTITY CELL 80' X 80'

CF = SQUARE FEET FOR FILL AREA IN CUBIC FEET

NET FILL MATERIAL = 1,011,200 OR 37,452 CYS
EXCESS MATERIAL FROM SITE WORK
MINUS 5 FT (AVERAGE EXCAVATION FOR FOUNDATIONS MINUS PORCHES)
THE COTTAGE: 24 EA X 5 FT DEEP X 1,992 SF =239,040 CF
OR 8,854 CYS
NET FILL VOLUME = 37,452 CYS - 8,854 CYS = 28,599 CYS

UTILITY LEGEND:

SEWER LINE — SVR —
DRAINAGE LINE
UNDERGROUND ELEC/TEL/CABLE — UE —
WATER LINE — W —
GAS LINE — GAS — GAS —
MANHOLE
CATCH BASIN
HYDRANT
WATER VALVE
TRANSFORMER



FOR REGISTRY USE ONLY

PROJECT TITLE:

THE COTTAGES AT OLD OAKEN BUCKET AT #279-281 OLD OAKEN BUCKET ROAD SCITUATE, MA

EXCAVATION QUANITY PLAN

PARCEL 41-1-3-D
PARCEL 41-1-3-0

PREPARED BY:

South Shore Survey Consultants, Inc.

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COMMONWEALTH OF MASSACHUSETTS
ANTHONY A. ESPOSITO
CIVIL
No. 39782
REGISTERED PROFESSIONAL ENGINEER

12/12/2022

SCALE: 1" = 50'
50' 0 50' 80'

DATE: DECEMBER 12, 2022
COMP./DESIGN: A. ESPOSITO
CHECK: M. D. CASEY
DRAWN: A. ESPOSITO
FIELD: LJL/PS
APPROVED: M. D. CASEY
DWG.No. 1908 SP
JOB No. 1908

SHEET 16 OF 16