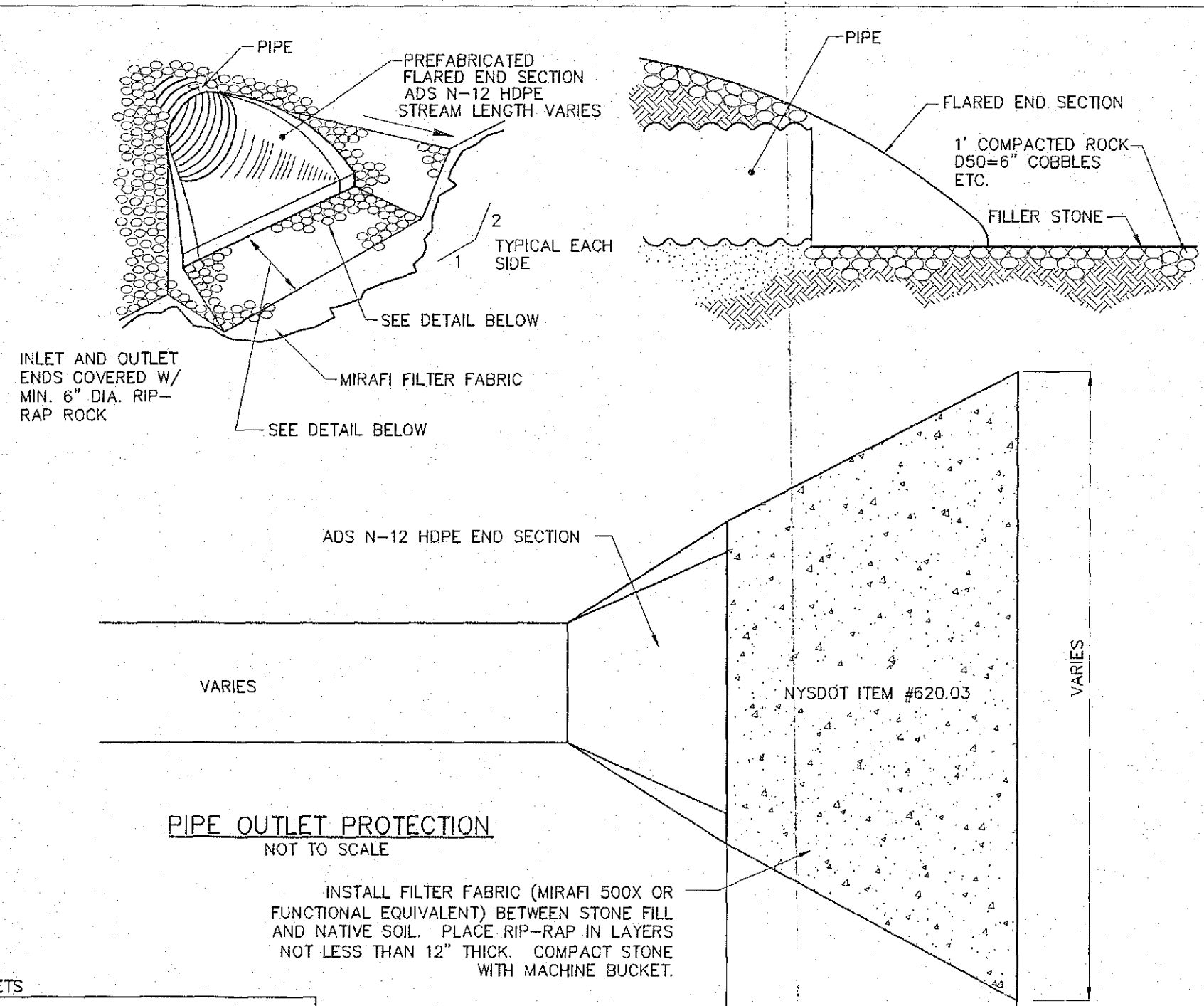


1
8
BIORETENTION FILTER DETAIL
SCHEMATIC (NOT TO SCALE)

BIORETENTION AREA PROVIDED=4570SF
VOLUME PROVIDED=7342CF
WQV=4179CF
75% WQV=3134CF

NOTES:

1. ALL DRAINAGE AREAS TO A BIORETENTION FACILITY ARE TO BE STABILIZED PRIOR TO INSTALLATION OF AMENDED SOILS, MULCH OR PLANTINGS.
2. AMENDED SOIL WILL ONLY BE PERMITTED WITH A VALID SOIL ANALYSIS REPORT. NO AMENDED SOIL SHALL BE ALLOWED ON THE SIDE SLOPES.
3. INSTALL WIRE SCREENING AROUND ALL OUTLET OPENINGS TO PREVENT LOSS OF MULCH.
4. PVC UNDERDRAIN PIPE SHOULD HAVE 3/8" PERFORATIONS SPACED AT 6" CENTERS, MIN. 4 HOLES PER ROW. MAX SPACING OF UNDERDRAIN PIPE IS 10 FEET ON CENTER. HDPE SHALL ADHERE TO AASHTO M252 SPECS.
5. UNDERDRAIN CLEANOUTS SHOULD EXTEND A MIN. OF 6" ABOVE TOP SURFACE OF MULCH LAYER. CLEANOUTS MAY BE FLUSH WITH TOP OF SURFACE TO ALLOW DRAW DOWN.
6. ONLY SMALL MATURING TREES ARE ALLOWED TO BE PLANTED IN THE AMENDED SOILS.
7. FILTER SYSTEM SHALL REMAIN 'OFF-LINE' UNTIL THE SITE IS STABILIZED AND APPROVED BY THE DESIGN ENGINEER.
8. DURING CONSTRUCTION, ALL SLOPES IN THE FILTER AREA SHALL BE PROTECTED BY EROSION CONTROL MATTING AND SEEDED IMMEDIATELY AFTER THE COMPLETION OF GRA.

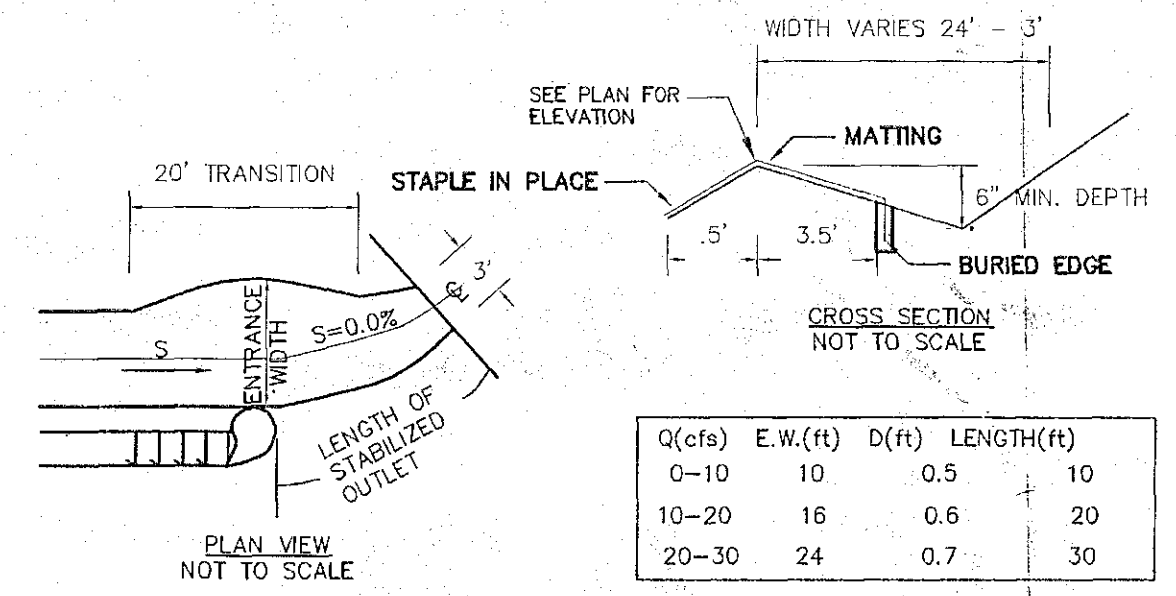


2
8
PIPE W/ FLARED END SECTION
NOT TO SCALE

PIPE OUTLETS

OUTLET DESC.	DIA.	Ld.	W	T	SIZE
POND INLET	18"	10'	12'	14'	D50=6"
POND OUTLET	18"	10'	12'	14'	D50=6"

*REFERENCE FIG. 59.12 OF NYS STANDARDS & SPECIFICATIONS FOR EROSION & SEDIMENT CONTROL.

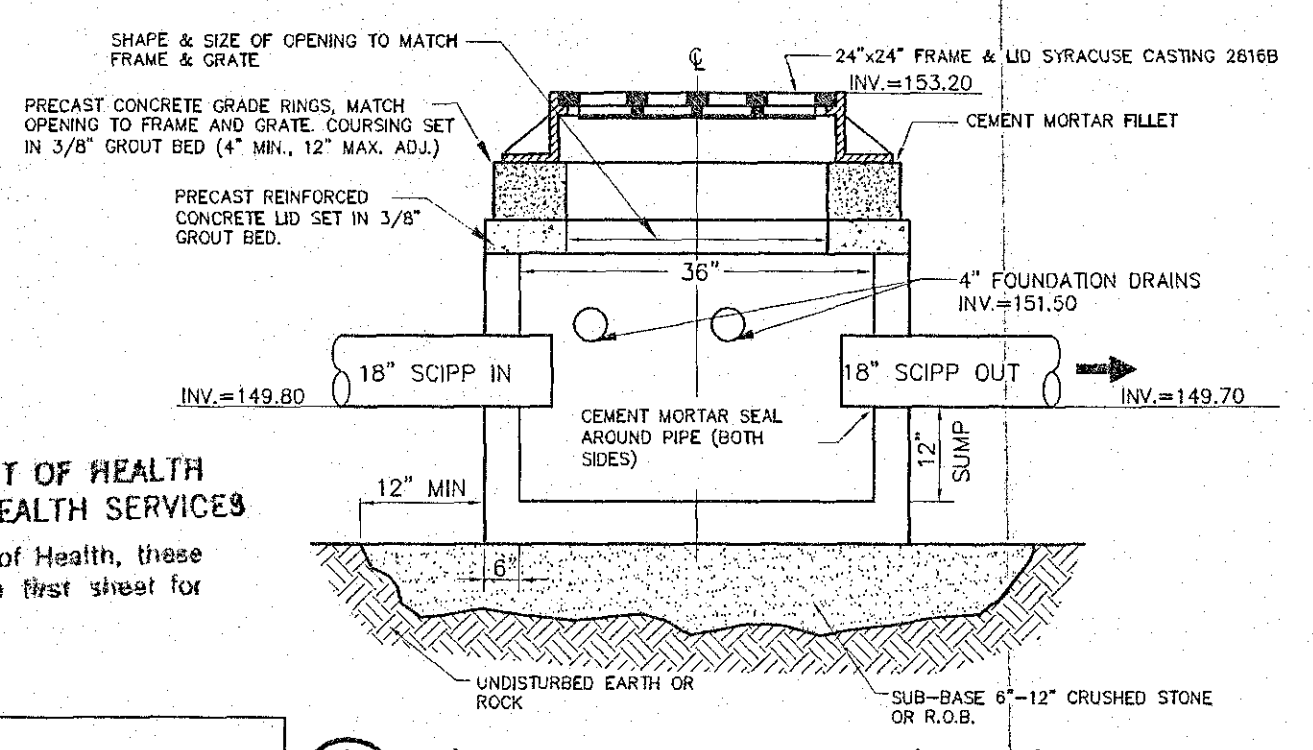


4
8
VEGETATED SWALE DETAIL
(NOT TO SCALE)

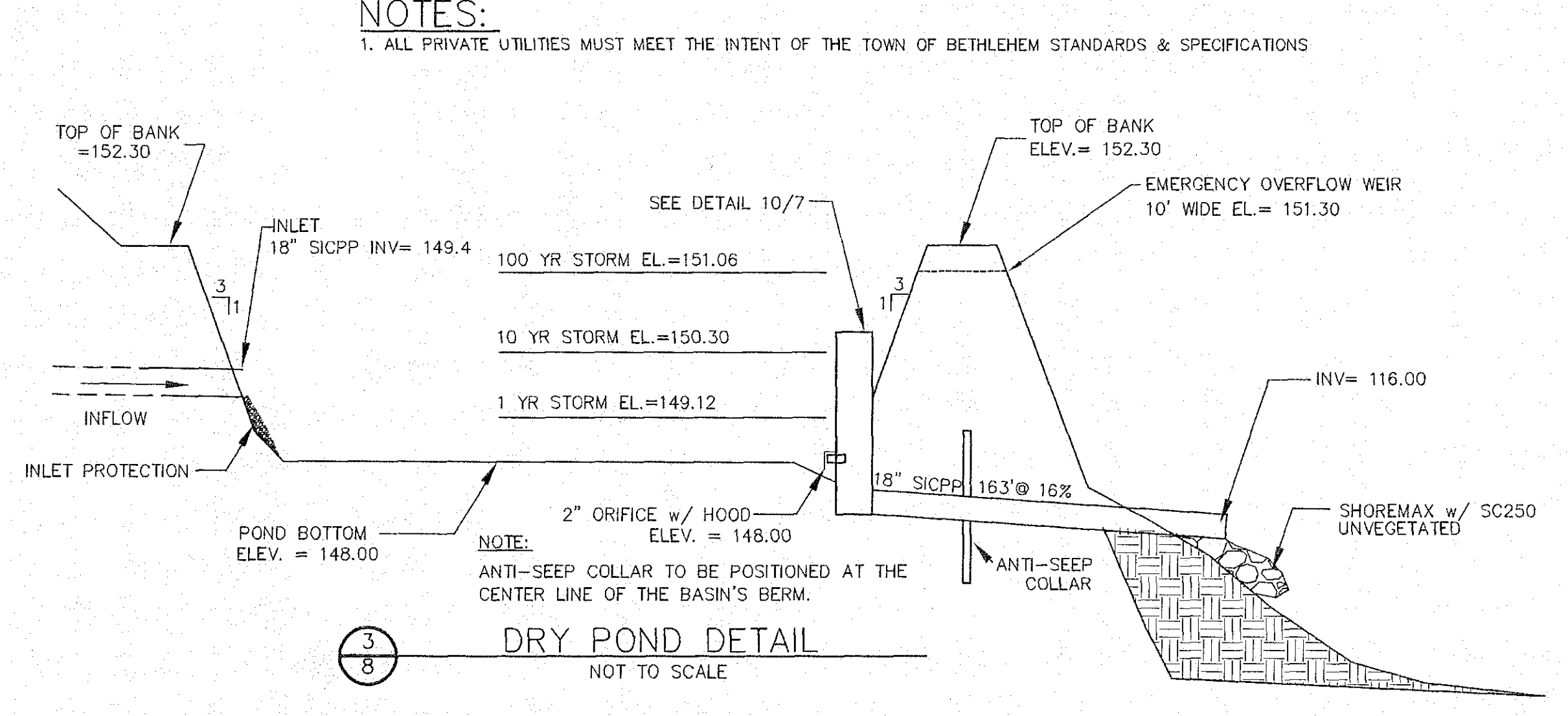
Q (cfs)	E.W.(ft)	D (ft)	LENGTH (ft)
0-10	10	0.5	10
10-20	16	0.6	20
20-30	24	0.7	30

- CONSTRUCTION SPECIFICATIONS**
1. THE MATTING SHOULD BE A MINIMUM OF 4FT. WIDE EXTENDING 6 INCHES OVER THE LIP AND BURIED 6 INCHES DEEP IN A VERTICAL TRENCH ON THE LOWER EDGE. THE UPPER EDGE SHOULD BUTT AGAINST SMOOTHLY CUT SOD AND BE SECURELY HELD IN PLACE WITH CLOSELY SPACED HEAVY DUTY WIRE STAPLES AT LEAST 12 INCHES IN LENGTH.
 2. ENSURE THAT THE LIP IS LEVEL TO UNIFORMLY SPREAD DISCHARGE.
 3. THE LIP SHALL BE CONSTRUCTED ON UNDISTURBED SOIL NOT FILL.
 4. A 20 FOOT TRANSITION SECTION WILL BE CONSTRUCTED FROM THE DIVERSION CHANNEL TO THE SPREADER TO SMOOTHLY BLEND THE DIFFERENT DIMENSION AND GRADES.
 5. THE RUNOFF DISCHARGE WILL BE OUTLETTED ONTO A STABILIZED VEGETATED SLOPE NOT EXCEEDING 10%.
 6. SEED AND MULCH THE DISTURBED AREA IMMEDIATELY AFTER CONSTRUCTION.

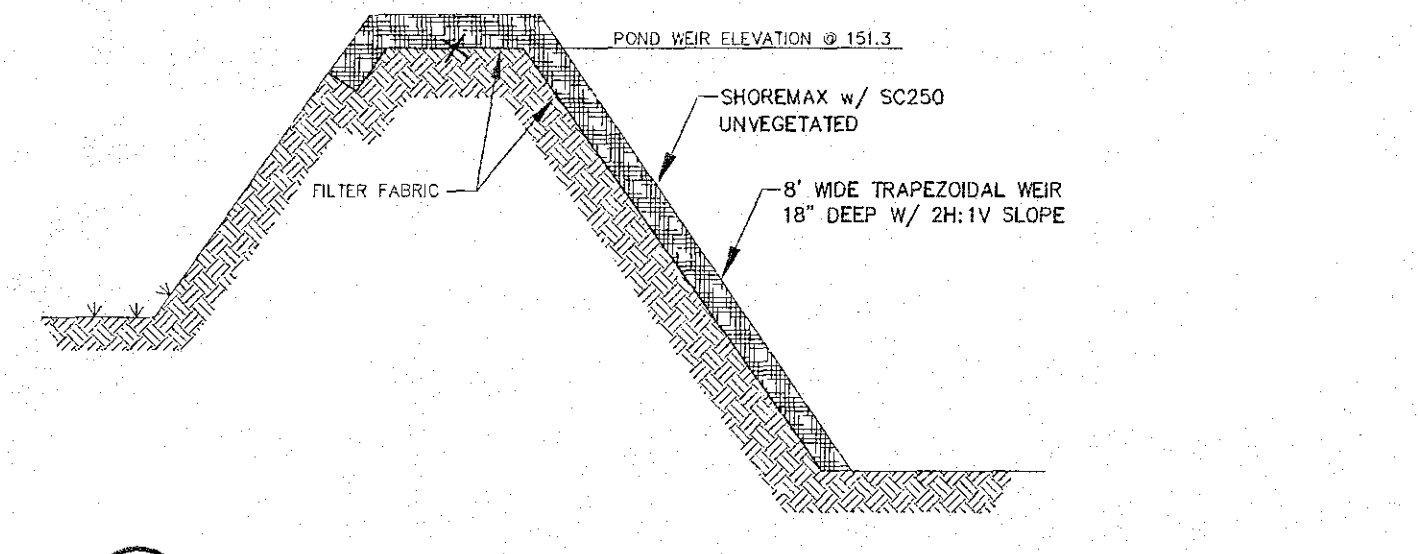
6
8
TYPICAL LEVEL SPREADER
NOT TO SCALE



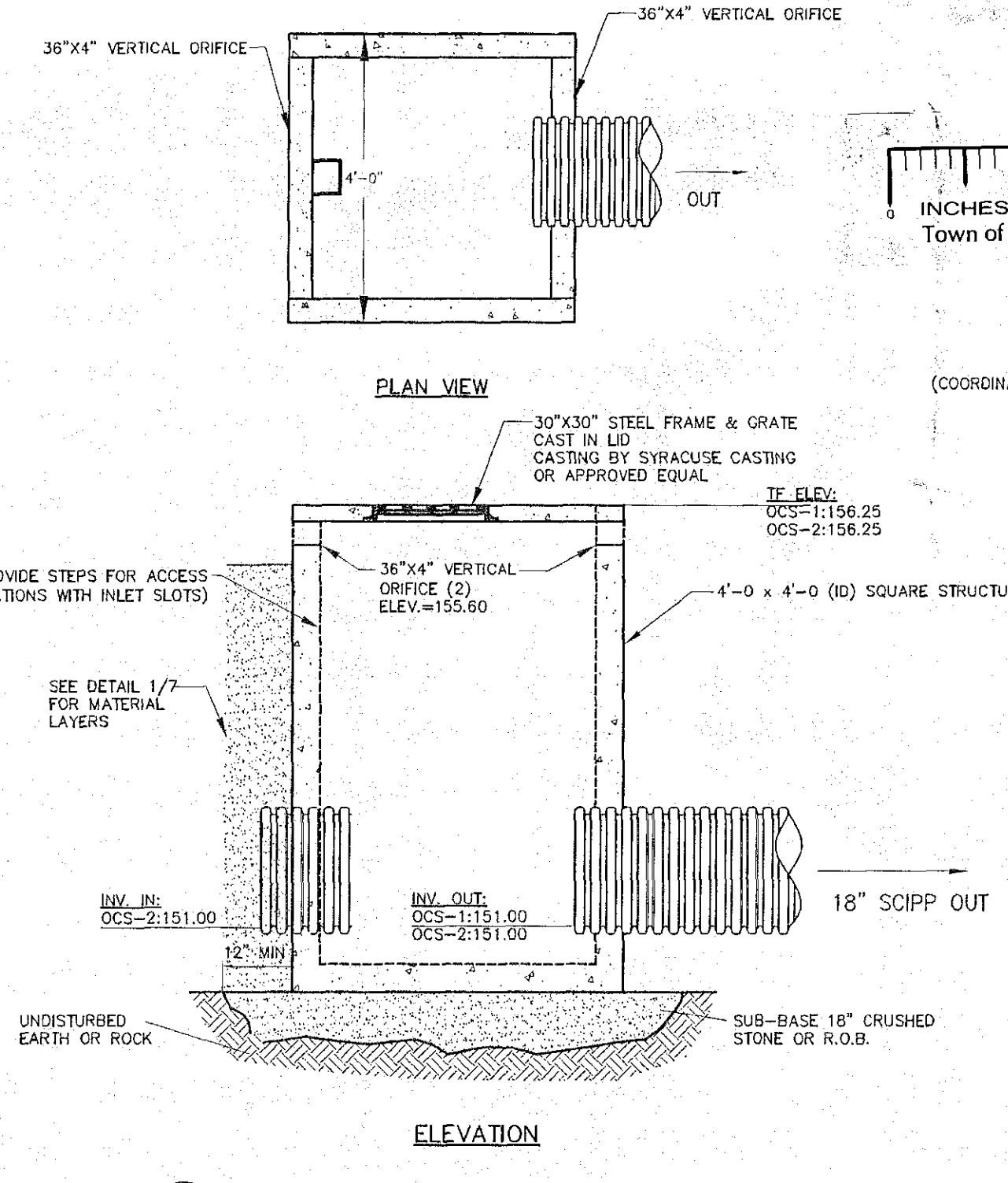
8
8
4' I.D. CONCRETE MANHOLE (DMH-1)
(NOT TO SCALE)



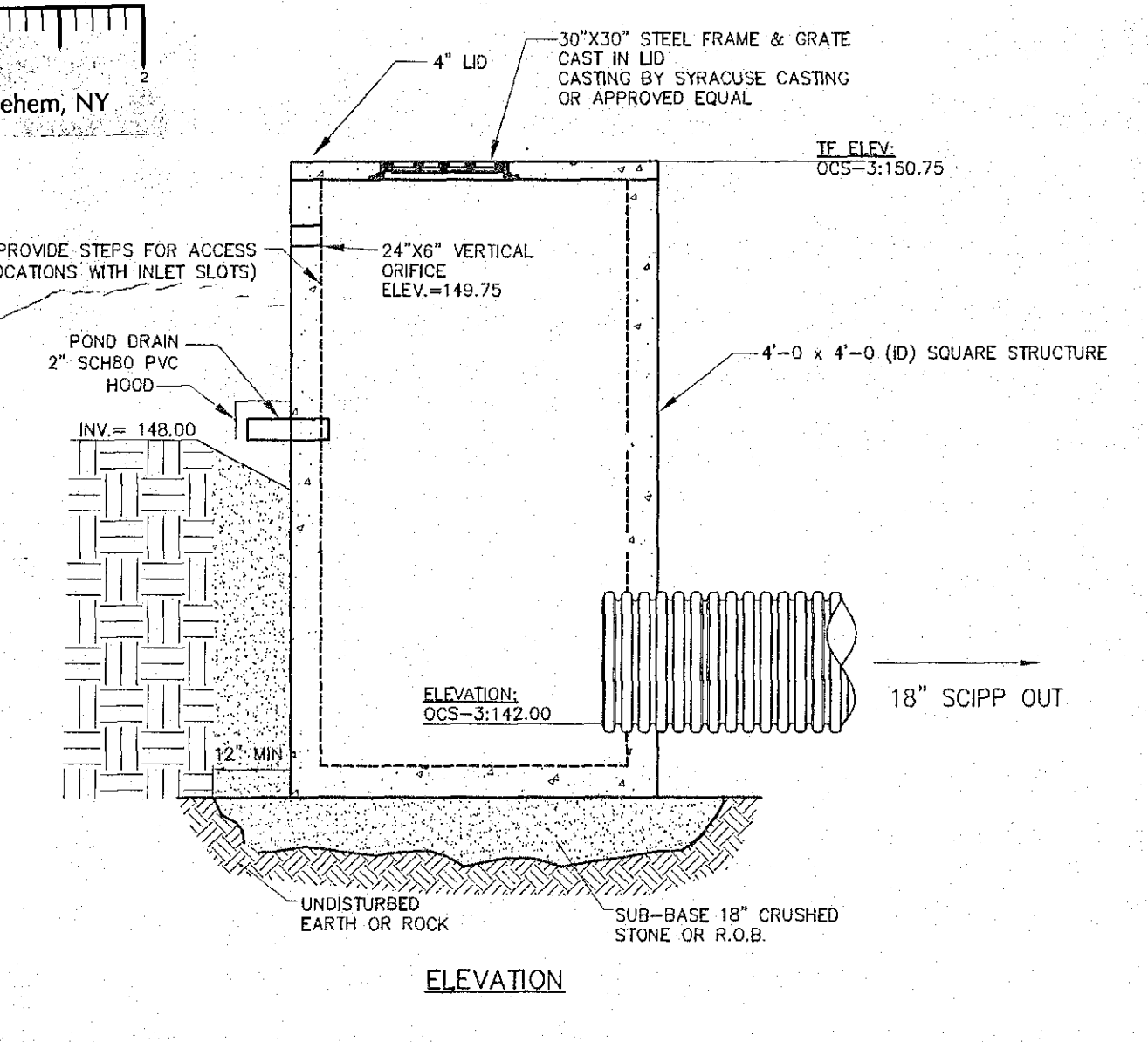
3
8
DRY POND DETAIL
NOT TO SCALE



5
8
OVERFLOW WEIR & SWALE DETAIL
(NOT TO SCALE)



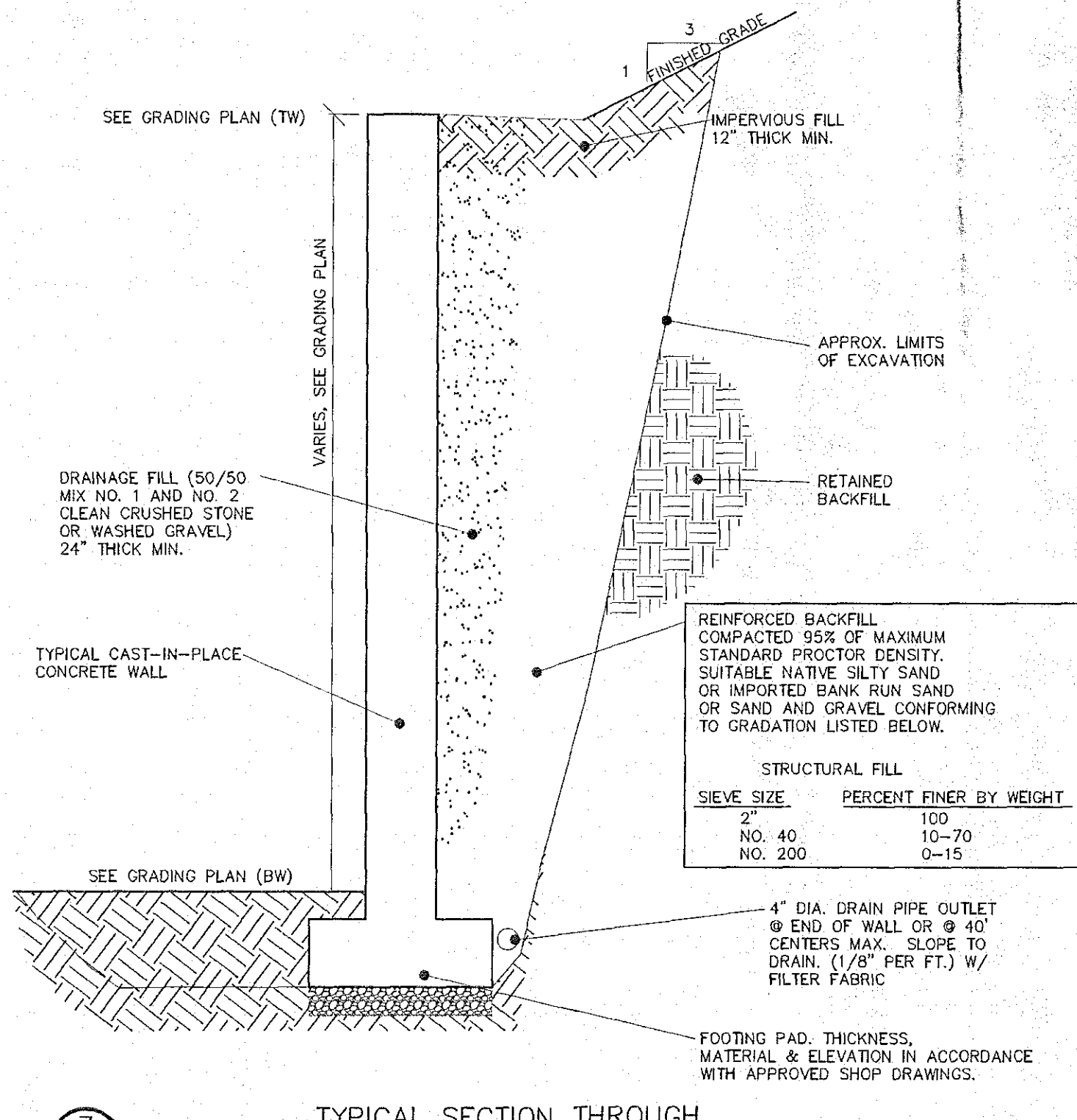
9
8
OUTLET STRUCTURE DETAILS (OCS-1&2)
(NOT TO SCALE)



10
8
OUTLET STRUCTURE DETAILS (OCS-3)
(NOT TO SCALE)

- NOTES:**
1. PRECAST REINFORCED CONCRETE MANHOLE AS MANUFACTURED BY THE PORT MILLER CO. INC., PORT MILLER, NEW YORK OR EQUAL (ASTM C 478) STEEL REINFORCEMENT: 6" X 6" - W 1.4 WWF IN BOTTOM AND SIDES (ASTM A 193)
 2. 2" ORIFICE SHALL BE EQUIPPED WITH A NENAH R-3705 HOOD OR APPROVED EQUAL.

FOR INFORMATION ONLY
NOT FOR CONSTRUCTION



7
8
TYPICAL SECTION THROUGH CAST-IN-PLACE CONCRETE RETAINING WALL
NOT TO SCALE

NOTE: DESIGN CERTIFICATION IS REQUIRED BY A PROFESSIONAL ENGINEER

**ALBANY COUNTY DEPARTMENT OF HEALTH
DIVISION OF ENVIRONMENTAL HEALTH SERVICES**
By direction of the Commissioner of Health, these plans are hereby approved. See first sheet for date and signature.

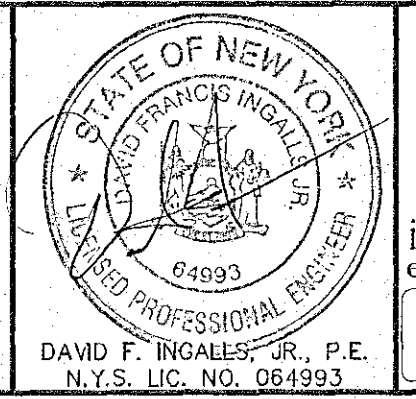
Town of Bethlehem Planning Board
By direction of the Chairman these plans are hereby Approved. See first sheet for date & signature.

PLANNING BOARD APPROVAL

NOTE: 48 HOURS PRIOR TO ANY CONSTRUCTION ACTIVITIES, THE CONTRACTOR SHALL CONTACT DIG SAFELY NEW YORK TO LOCATE ALL UNDERGROUND UTILITIES. 1-800-962-7962

NO.	DATE	REVISIONS	BY
1	11/28/11	REVISIONS PER TOWN & TDE COMMENTS	CDL
2	12/22/11	REVISIONS PER TDE COMMENTS	CDL
3	4/11/12	REVISIONS PER TOWN PLANNING & ENG COMMENTS	CDL
4	6/6/12	REVISIONS PER FINAL TOWN COMMENTS	CDL

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DETAILS
1035 ROUTE 9W
LOCUST VIEW APARTMENTS
TOWN OF BETHLEHEM
COUNTY OF ALBANY STATE OF NEW YORK
DATE: JANUARY 11, 2011
CHECKED BY: D.F.I.
JOB NO. 10-084
SCALE: N.T.S.
DRAWN BY: C.D.L.
CADD FILE: DETAILS.DWG
SHEET 8 OF 10