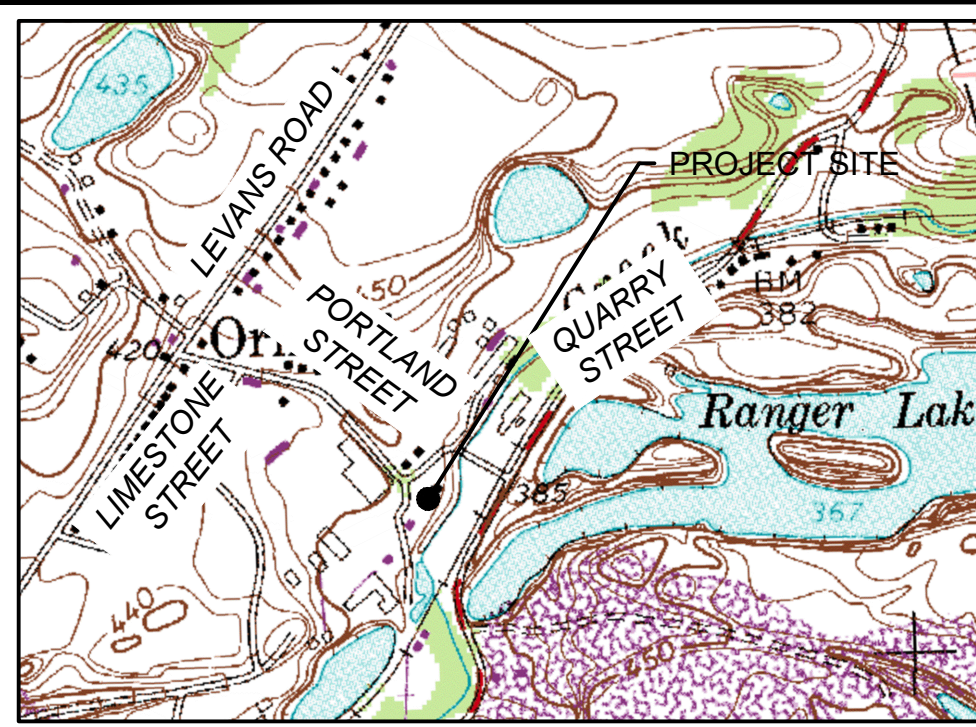




FLOOD AREAS DETERMINED USING
FEMA FIRM MAP 421813 PANEL 141
AND LEHIGH COUNTY GIS MAPPING

— FEMA 100 YEAR FLOODPLAIN
— FEMA FLOODWAY

LOCATION MAP
(USGS QUADRANGLE)
SCALE: 1"=1000'

OFFSITE DRAINAGE AREA 1.17AC
ROUTED THROUGH MRC DRY
EXTENDED UNDERGROUND BASIN
(1.11 AC IMPERVIOUS)
(SEE POST DEVELOPMENT PLAN)

AVOIDANCE MEASURE: THE PROPOSED PROJECT IS LOCATED IN THE VICINITY OF NORTHERN LONG-EARED BAT SPRING STAGING/FALL SWARMING HABITAT. TO ENSURE TAKE IS NOT REASONABLY CERTAIN TO OCCUR, DO NOT CONDUCT TREE REMOVAL FROM MAY 15 TO AUGUST 15. THE U.S. FISH AND WILDLIFE SERVICE DETERMINED TAKE IS NOT REASONABLY CERTAIN TO OCCUR FROM TREE REMOVAL IF ACTIVITIES ARE AVOIDED DURING THE PUP SEASON (I.E., THE RANGE OF TIME WHEN FEMALES ARE CLOSE TO GIVING BIRTH (I.E., TWO WEEKS PRIOR TO BIRTH) AND HAVE NON-VOLANT (I.E., UNABLE TO FLY) YOUNG). FOR MORE INFORMATION, SEE THE INTERIM VOLUNTARY GUIDANCE FOR THE NORTHERN LONG-EARED BAT: FOREST HABITAT MODIFICATION, AVAILABLE HERE:
<https://www.fws.gov/library/collections/interim-habitat-modification-guidance>.

PROPERTY IDENTIFICATION

3948 PORTLAND STREET
COPLAY, PA 18037
PARCEL NO. 547984619922
D.B.V. 2019031940

STORMWATER MANAGEMENT BMP'S
BMP 6.6.3 - MRC DRY EXTENDED UNDERGROUND DETENTION BASIN
BMP 6.6.4 - WATER QUALITY INSERT (SUMPED STRUCTURE)

OWNER/RESPONSIBLE PARTY
SAUCON POINTE, LLC
DANO GUERRIERI
1721 WILLIAMS STREET
HELLERTOWN, PA 18055
saucopointe@gmail.com
610-428-1313

PLAN PREPARER

ANDREW J. WOODS, P.E., P.L.S.
HANOVER ENGINEERING ASSOC., INC.
252 BROOKHEAD RD., SUITE 100
BETHLEHEM, PA 18017-8944
610-691-5644

WETLAND STATEMENT

THERE ARE NO AREAS OF THIS TRACT PROPOSED TO BE ALTERED, DISTURBED OR DEVELOPED THAT CONTAIN "WETLANDS" UNDER CURRENT STATE AND FEDERAL DEFINITIONS.

Signature: *Pamela J. Kemecsy*

DATE: 1-12-26

Signature: *Pamela J. Kemecsy*

PRINTED NAME: Pamela J. Kemecsy, Project Scientist

OWNER / RESPONSIBILITY PARTY NOTE:

IT IS THE RESPONSIBILITY OF THE OWNER TO ENSURE PROPER MAINTENANCE INSPECTION AND OPERATION OF THE POST CONSTRUCTION STORMWATER MANAGEMENT BEST MANAGEMENT PRACTICES (BMP'S) IDENTIFIED ON THIS PLAN. THIS PLAN AND THE PROPOSED PCSM BMP'S ARE TO BE TRANSFERRED WITH OWNERSHIP OF THE PROPERTY. THE OWNER SHALL ALSO BE RESPONSIBLE FOR THE COLLECTION AND CONVEYANCE SYSTEMS ON SITE.

IT SHALL BE UNLAWFUL TO ALTER OR REMOVE ANY PCSM BMP IDENTIFIED ON THIS PLAN OR TO ALLOW THE PROPERTY TO REMAIN IN A CONDITION WHICH DOES NOT CONFORM TO THIS PLAN UNLESS AN EXCEPTION IS GRANTED IN WRITING BY THE TOWNSHIP.

OWNER/OPERATOR/RESPONSIBLE PARTY

SAUCON POINTE, LLC
DANO GUERRIERI
1721 WILLIAMS STREET
HELLERTOWN, PA 18055
610-428-1313

COMMONWEALTH OF PENNSYLVANIA } SS

COUNTY OF _____

ON THIS _____ DAY OF _____, 2024 BEFORE ME, THE UNDERSIGNED OFFICER,

PERSONALLY APPEARED _____
WHO ACKNOWLEDGED HIMSELF/HERSELF TO BE THE _____ OF SAUCON POINTE, LLC, A LIMITED LIABILITY CORPORATION, AND THAT HE/SHE AS SUCH _____ BEING AUTHORIZED TO DO SO, EXECUTED THE FOREGOING INSTRUMENT FOR THE PURPOSES THEREIN CONTAINED BY SIGNING THE NAME OF THE CORPORATION BY HIMSELF/HERSELF AS _____

IN WITNESS WHEREOF, I HAVE HEREUNTO SET MY HAND AND NOTARY SEAL.

NOTARY PUBLIC

RECORDED IN THE OFFICE OF THE RECORDER OF DEEDS OF LEHIGH COUNTY, PENNSYLVANIA ON _____, 20____, IN MAP BOOK VOLUME _____

LEHIGH COUNTY RECORDER OF DEEDS

PCSM NOTES

- THE IMPERVIOUS AREA IS MINIMIZED BY PROVIDING 1.71 ACRES OF LAWN/OPEN SPACE.
- THE ENTIRE SITE IS LOCATED WITHIN THE COPLAY CREEK WATERSHED (CWF/MF).
- NO EXISTING RIPARIAN OR FOREST BUFFERS ARE LOCATED ON THE SUBJECT PARCEL NOR ADJACENT PROPERTIES. NO RIPARIAN OR FOREST BUFFERS ARE PROPOSED FOR THIS PROJECT.
- THE OPERATOR SHALL REMOVE FROM THE SITE, RECYCLE, OR DISPOSE OF ALL BUILDING MATERIALS AND WASTES IN ACCORDANCE WITH THE DEPARTMENT'S SOLID WASTE MANAGEMENT REGULATIONS AT 25 PA. CODE 260.1 ET SEQ., 271.1 ET SEQ., AND 287.1 ET SEQ. THE CONTRACTOR SHALL NOT ILLEGALLY BURY, DUMP, OR DISCHARGE ANY BUILDING MATERIAL OR WASTE AT THE SITE. WASTE MATERIAL SHALL INCLUDE BUT NOT BE LIMITED TO THE FOLLOWING: WOOD, PLYWOOD, METAL, PIPE MATERIALS, CONCRETE, SILT FENCE, SILT SLOTT FABRIC, SOX MATTING, AND OTHER MISCELLANEOUS CONSTRUCTION MATERIALS THAT MIGHT BE USED FOR THE CONSTRUCTION OF THE PROPOSED PROJECT.
- THE SITE CONTAINS GEOLOGIC AND SOIL CONDITIONS WITH THE POTENTIAL TO CAUSE POLLUTION DURING CONSTRUCTION. IF THESE CONDITIONS ARE IDENTIFIED DURING CONSTRUCTION, THE APPROPRIATE MEANS OF MITIGATION WILL BE UTILIZED AND ALL MATERIALS SHALL BE HANDLED AND DISPOSED OF IN THE PROPER MANNER PURSUANT TO LOCAL AND STATE REGULATIONS. A SINKHOLE DETAIL IS CONTAINED ON THE PLANS.
- HDR CONDUCTED A PHASE 1 AND PHASE 2 ENVIRONMENTAL SITE ASSESSMENT (ESA), THE ESA'S ARE PROVIDED SEPARATELY. THE PROPERTY MEETS ACT 2. (REFER TO SOIL MANAGEMENT PLAN)

LIMIT OF DISTURBANCE ——— 2.28 ACRES

NPDES PERMIT BOUNDARY ——— 3.77 ACRES

(BOUNDARIES OFFSET FOR CLARITY)

EROSION AND SEDIMENT PLANS CONSIDERED WITH PCSM PLANS

102-4(B)(3)(iv) NO RIPARIAN BUFFERS ARE LOCATED OUTSIDE THE LIMITS OF CONSTRUCTION. NO PROPOSED INFILTRATION BMP'S IS PROPOSED.

SITE STORM CHART											
	NAME	TYPE	TOP	INV. IN	INV. OUT	PIPE DIA.	LENGTH	MATERIAL	SLOPE	DOWNSIDE STRUCTURE	
SUMPED INLET/NO. INLET	IN-17	5' TYPE D	TC=385.96	381.38 (MH-12)	387.95	15"	16.98'	HDPE	0.74%	INL-182	
	INL-10	STD BOX, C TOP	TC=392.03		384.00	18"	30.62'	HDPE	0.96%	MH-12	
	INL-10A	STD BOX, C TOP	TC=390.65	384.23 (NL 10)	384.00	18"	30.62'	HDPE	0.96%	MH-12	
	INL-1A	STD BOX, M TOP	TC=391.92	386.64 (MH-30)	387.81 (RD-2)	386.64	30"	84.76'	HDPE	0.00%	MH-3C
	INL-1B1	STD BOX, C TOP	TC=392.40		386.25	15"	36.00'	HDPE	1.00%	MH-3C	
	INL-1B2	STD BOX, M TOP	TC=391.84	387.83 (NL-10)	387.58	18"	94.40'	HDPE	1.00%	MH-3C	
	INL-3	STD BOX, M TOP	TC=391.35	386.64 (T-16)	386.64	30"	58.90'	HDPE	0.00%	T-9	
	INL-10	STD BOX, M TOP	TC=389.80	386.05 (NL 11)	385.75	15"	74.66'	HDPE	2.03%	INL-10A	
	INL-11	STD BOX, C TOP	TC=390.63	386.99 (NL 11A)	387.10	15"	104.94'	HDPE	1.00%	INL-10	
	INL-11A	STD BOX, C TOP	TC=391.02		388.23	15"	63.09'	HDPE	2.00%	INL-11	
SUMPED INLET/NO. INLET	JB-116	48" DIA MH	RIM=391.60	382.21 (JB-117)	382.13	30"	28.29'	HDPE	0.50%	MH-12	
	JB-117	48" DIA MH	RIM=392.20	382.84 (JB-118)	382.86	30"	130.22'	HDPE	0.50%	JB-116	
	JB-118	48" DIA MH	RIM=392.33	383.67 (JB-119)	383.60	30"	131.73'	HDPE	0.50%	JB-117	
	JB-119	48" DIA MH	RIM=391.57	384.23 (JB-120)	384.15	30"	96.98'	HDPE	0.50%	JB-118	
	JB-120	TYPE 5 BOX, M TOP	TC=390.37		384.47	30"	48.91'	HDPE	0.50%	JB-119	
	MH-3A	48" DIA MH	RIM=392.23	386.64 (MH-3B)	386.64	30"	6.02'	HDPE	0.00%	T-9	
	MH-3B	48" DIA MH	RIM=392.90	386.64 (T-16)	386.64	30"	144.26'	HDPE	0.00%	MH-3A	
	MH-3C	60" DIA MH	RIM=392.43	386.64 (NL 182)	387.89 (NL 181)	386.64	30"	5.78'	HDPE	0.00%	T-13
	MH-3D	48" DIA MH	RIM=392.61	386.64 (T-12)	386.64	30"	60.28'	HDPE	0.00%	INL-1A	
	MH-3E	48" DIA MH	RIM=392.36	386.64 (MH-3F)	386.64	30"	5.67'	HDPE	0.00%	T-19	
SUMPED MH W/O STRUCTURE	MH-3F	48" DIA MH	RIM=392.27	386.64 (T-8)	386.64	30"	144.24'	HDPE	0.00%	MH-3E	
	MH-12	60" DIA MH	RIM=390.70	383.70 (NL-10A)	381.96	30"	60.94'	CMPEXST	0.95%	EX-EM A	
	COS 1 (TYPE 5)	TYPE 5 BOX, M TOP	TC=392.86	386.14 (MH-30)	386.14	24"	132.61'	HDPE	1.08%	MH-12	
	RD-1	48" DIA MH	RIM=393.47		388.75	8"	39.20'	HDPE	2.83%	MH-12	
	RD-2	48" DIA MH	RIM=393.41		386.26	8"	44.27'	HDPE	1.00%	INL-1A	

* 2 MANHOLE COVERS - SEE DETAIL SHEET 2/2

SHEET INDEX

PCSM PLAN SHT 1
PCSM DETAILS SHT 2
PCSM EXIST. FEAT SHT 3
PCSM POST CONSTRUCTION SHT 4
PCSM EASEMENT RECORD PLAN SHT 5

*ALL SHEETS TO BE RECORDED

SOILS LEGEND

(ONLY SOIL WITHIN PROJECT LIMITS)

Soil Types

MeB -MADE LAND, LIMESTONE MATERIAL, 3 TO 8 PERCENT SLOPES

"CALL BEFORE YOU DIG"

PENNSYLVANIA LAW REQUIRES 3 WORKING DAYS NOTICE FOR CONSTRUCTION PHASE AND 10 WORKING DAYS IN DESIGN STAGE - STOP CALL
PENNSYLVANIA ONE CALL SYSTEM, INC. NORTH WHITEHALL TWP.(NOR)
1-800-242-1776
NORTHAMPTON BORO MUNICIPAL AUTH.(NOR)
PPL ELEC UTILITIES CORP.(PI)
THIS PROJECT'S DESIGNER INQUIRY NO. UGI UTIL LEHIGH HAZLETON(UH)

20232350191

PROJECT / SERIAL NUMBERS/ EXCAVATION-DEMOLITION / TYPE OF ONE CALL / DATE / ADDRESS / NEAREST INT. / TOWNSHIP / COUNTY
5069 20232350191 EXCAVATION ROUTINE 8/26/2023 3948 PORTLAND ST. QUARRY STREET NORTH WHITEHALL LEHIGH

THE HORIZONTAL COORDINATE SYSTEM IS BASED ON GPS OBSERVATIONS REDUCED TO PA STATE PLANE SOUTH NAD83. THE VERTICAL DATUM IS NAVD83.

PRELIMINARY/FINAL PLAN

PCSM PLAN

3948 PORTLAND STREET

PLAN TITLE:

PROJECT TITLE:

PLAN TITLE:

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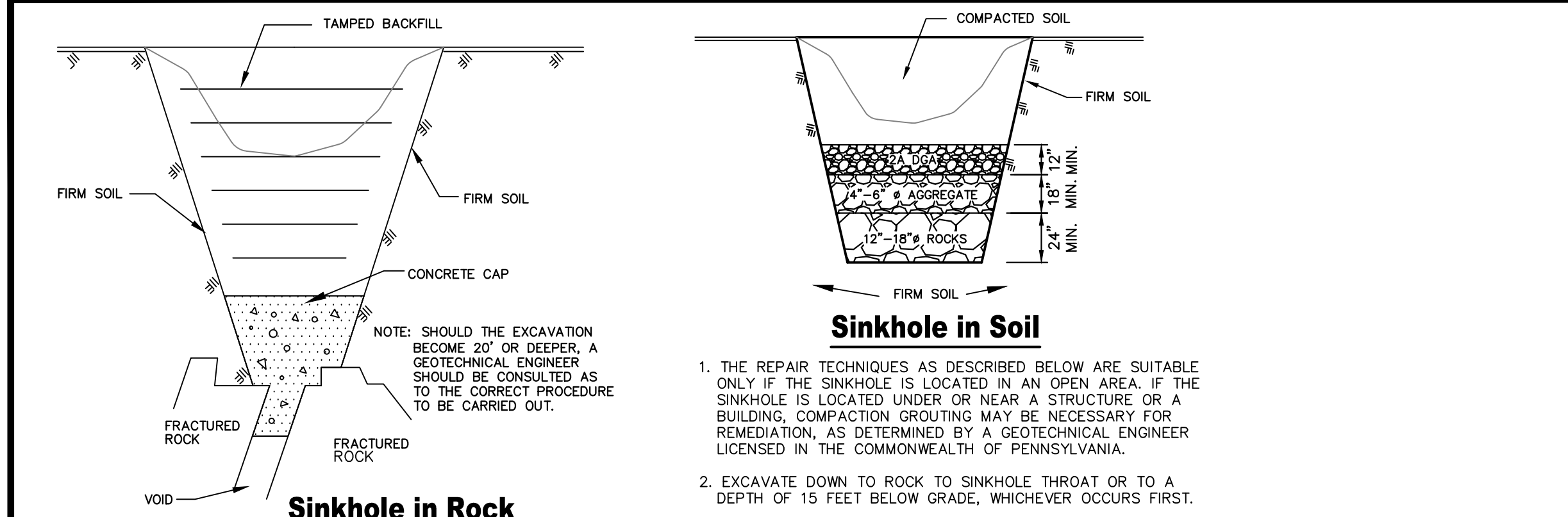
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PROJECT TITLE:

PLAN TITLE:

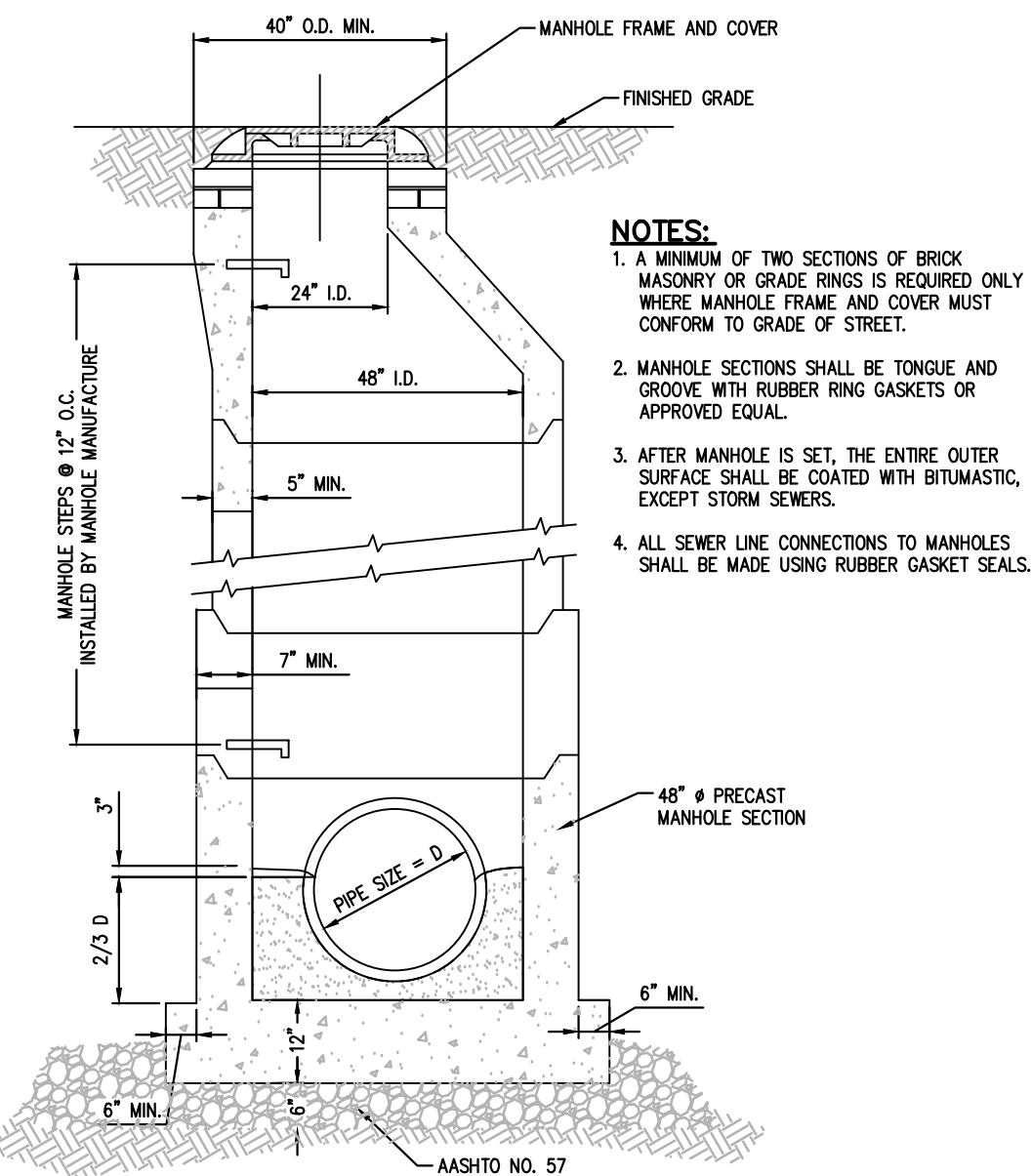
PROJECT TITLE:

PLAN TITLE:



- THE REPAIR TECHNIQUES AS DESCRIBED BELOW ARE SUITABLE ONLY IF THE SINKHOLE IS LOCATED IN AN OPEN AREA, IF THE SINKHOLE IS LOCATED UNDER OR NEAR A STRUCTURE OR A BUILDING, COMPACTION GROUTING MAY BE NECESSARY FOR REMEDIATION, AS DETERMINED BY A GEOTECHNICAL ENGINEER LICENSED IN THE COMMONWEALTH OF PENNSYLVANIA.
- EXCAVATE DOWN TO BEDROCK OR TO THE SINKHOLE THROAT.
- EXPOSE THE ROCK SURFACE BY WASHING THE AREA WITH A SMALL HOSE WATER SPRAY AND INSTALL HIGHSLUMP CEMENT INTO Voids AND CREVICES UNTIL VOIDS ARE FILLED AND A CAP COVERS THE AREA. THE LIMIT OF EXCAVATION AND CONCRETE SHALL BE DETERMINED BY THE ENGINEER.
- AFTER CONCRETE HAS SET OVERNIGHT, BACKFILL HOLE WITH RELATIVELY IMPERMEABLE CLAY SOIL. COMPACT SOIL IN 6" LIFTS WITH A POWER TAMPER OR RAMMER TO AT LEAST 95% OF THE STANDARD PROCTOR. THE TOP THREE(3) FEET SHALL BE BACKFILLED WITH 20C CRUSHED AGGREGATE.
- BACKFILL HOLE ABOVE EXISTING GRADE TO DIVERT SURFACE WATER.
- WHEN SINKHOLE IS UNDER A PROPOSED UTILITY, CONCRETE IS TO BE SET 6" BELOW THE UTILITY TO ALLOW FOR A STONE BEDDING.

- THE REPAIR TECHNIQUES AS DESCRIBED BELOW ARE SUITABLE ONLY IF THE SINKHOLE IS LOCATED IN AN OPEN AREA, IF THE SINKHOLE IS LOCATED UNDER OR NEAR A STRUCTURE OR A BUILDING, COMPACTION GROUTING MAY BE NECESSARY FOR REMEDIATION, AS DETERMINED BY A GEOTECHNICAL ENGINEER LICENSED IN THE COMMONWEALTH OF PENNSYLVANIA.
- EXCAVATE DOWN TO ROCK TO SINKHOLE THROAT OR TO A DEPTH OF 15 FEET BELOW GRADE, WHICHEVER OCCURS FIRST.
- IF ROCK IS ENCOUNTERED WITHIN 10 FEET, STOP EXCAVATION. THE LIMIT OF EXCAVATION SHALL BE DETERMINED BY THE GEOTECHNICAL ENGINEER. GENERALLY, A ZONE OF SOFT, W-FILL MATERIAL WILL BE FOUND WHICH COVERS MOST OF THE BOTTOM OF THE EXCAVATION. COVER THIS AREA WITH A GRADED ROCK FILTER AS SHOWN ABOVE.
- BACKFILL HOLE WITH RELATIVELY IMPERMEABLE CLAY SOIL. COMPACT SOIL IN 6" LIFTS WITH A POWER TAMPER OR RAMMER TO AT LEAST 95% OF THE STANDARD PROCTOR.
- BACKFILL HOLE ABOVE EXISTING GRADE TO DIVERT SURFACE WATER.



- NOTES:**
- A MINIMUM OF TWO SECTIONS OF BRICK MASONRY OR GRADE RINGS IS REQUIRED ONLY WHERE MANHOLE FRAME AND COVER MUST CONFORM TO GRADE OF STREET.
 - MANHOLE SECTIONS SHALL BE TONGUE AND GROOVE WITH RUBBER RING GASKETS OR APPROVED EQUAL.
 - AFTER MANHOLE IS SET, THE ENTIRE OUTER SURFACE SHALL BE COATED WITH BITUMASTIC, EXCEPT STORM SEWERS.
 - ALL SEWER LINE CONNECTIONS TO MANHOLES SHALL BE MADE USING RUBBER GASKET SEALS.

Ripping, Subsoiling, Tilling, and Scarification:

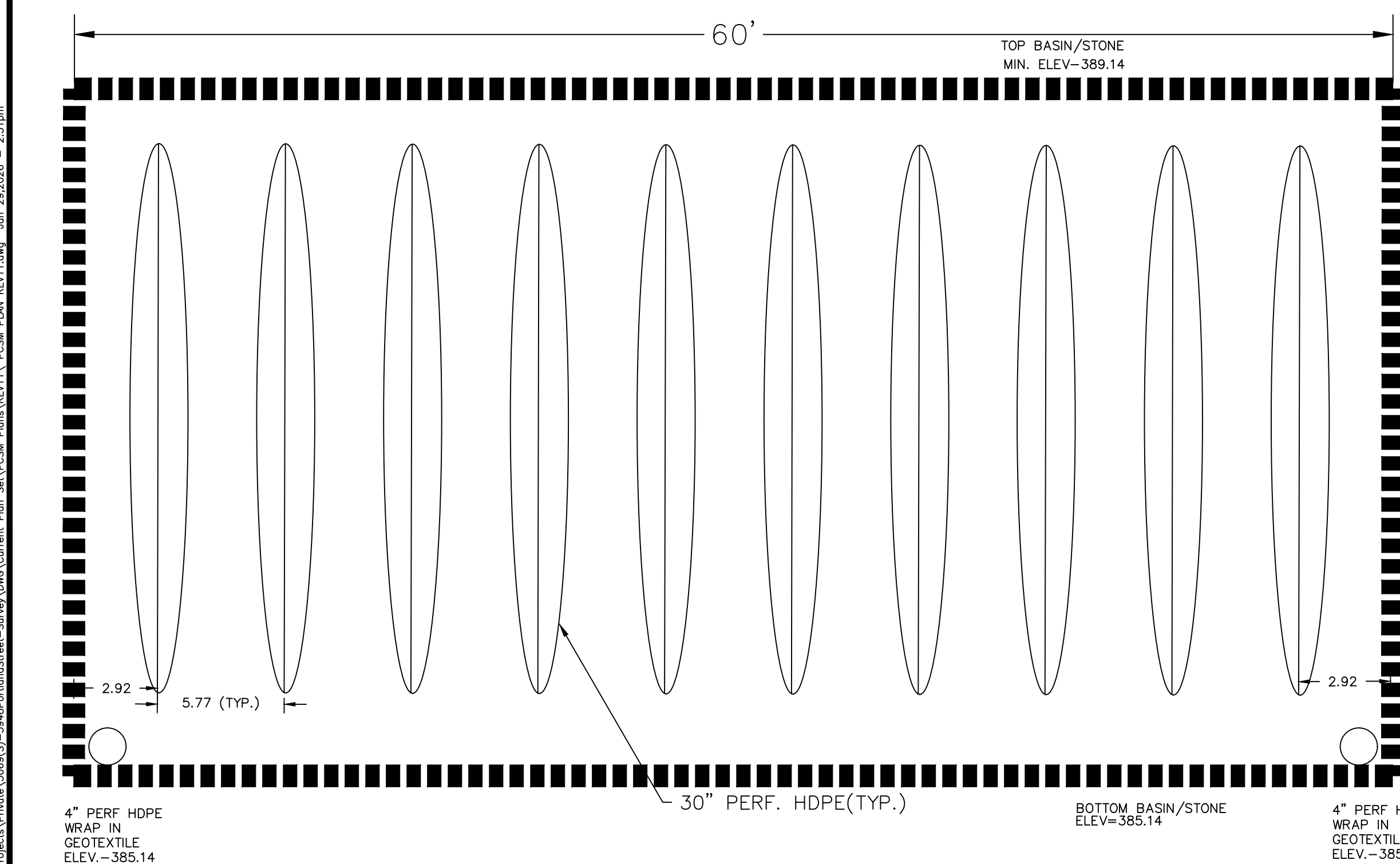
- RIPPING, SUBSOILING, TILLING, OR SCARIFICATION OF THE SUBSOIL SHOULD BE PERFORMED WHERE SUBSOIL HAS BEEN COMPACTED BY EQUIPMENT OPERATION, DRIED OUT AND CRUSTED, OR WHERE NECESSARY TO SUBSTRATE EROSION RILLS.
- SUBSOILING SHALL ONLY BE PERFORMED ON DRY SOILS.
- RIPPING SHOULD BE PERFORMED USING A SOLID-SHANK RIPPER AND TO A DEPTH OF 8" FOR MINOR COMPACTION AND 20" FOR MAJOR COMPACTION.
- SHOULD BE PERFORMED BEFORE COMPOST OR TOPSOIL IS PLACED AND AFTER EXCAVATION IS COMPLETED.
- SHALL NOT BE PERFORMED WITHIN THE DRIP LINE OF ANY EXISTING TREES, OVER UNDERGROUND UTILITY INSTALLATIONS WITHIN 30" OF THE SURFACE, WHERE TRENCHING/DRAINAGE LINES ARE INSTALLED, OR WHERE COMPACTION IS BY DESIGN, WHERE EXCEPTIONS OCCUR, A 20" MINIMUM SETBACK OR SETBACK AS DIRECTED BY OWNER'S REPRESENTATIVE SHALL BE USED.
- SHALL NOT BE PERFORMED WITH SHALLOW AND CAN COMPACT THE SOIL JUST BENEATH THE TILLAGE DEPTH.
- SOIL AREAS SHALL BE LOOSENEED TO LESS THAN 1400 KPA (200 PSI).

Anticipated Construction Vegetation:

CONSTRUCTION WASTES ARE EXPECTED TO BE VEGETATED MATERIAL, MISCELLANEOUS STONEY BITUMINOUS PAVEMENT AND MISCELLANEOUS CONCRETE MATERIAL.

General PCSM Notes:

- THE LINING SHALL BE 1/4" NON-WOVEN GEOTEXTILE PLACED ON UNCOMPACTED SUBGRADE;
 - GRAB TENSILE STRENGTH (ASTM-D4632) 120LBS.
 - MULLEN BURST STRENGTH (ASTM-D3786) 225 PSI
 - C. FLOW RATE (ASTM-D4491)
 - UV RESISTANCE AFTER 500HRS. (ASTM-D4355) 70%
 - HEAT-SET OR HEAT CALENDARED FABRICS ARE NOT PERMITTED. ACCEPTABLE TYPES INCLUDE MIRAFI 140N, AMOCO 4547 AND GEOTEX 451.
- THE LONG TERM OPERATION AND MAINTENANCE OF PCSM BMPs AND THE STORM WATER FACILITIES, INCLUDING THE MRC-DRY EXTENDED UNDERGROUND DETENTION BASIN, AND VEGETATED SWALES SHALL BE THE OWNER'S RESPONSIBILITY UNLESS A DIFFERENT PERSON IS IDENTIFIED IN THE NOTICE OF TERMINATION AND HAS AGREED TO LONG-TERM OPERATION AND MAINTENANCE OF PCSM BMPs. THE OWNER'S DEED AND THE DEEDS TO ANY SUBSEQUENT OWNER, SHALL NOTE THAT THE OWNER SHALL ACCEPT THE MAINTENANCE RESPONSIBILITIES OF ANY FACILITIES NOT DEDICATED THE CITY SHALL BE PERMITTED TO INSPECT THE STORM WATER FACILITIES ON AT LEAST AN ANNUAL SCHEDULE TO ENSURE THAT ANY NECESSARY CORRECTIVE WORK IS PERFORMED IN A TIMELY MANNER.
- THE PERMITTEE SHALL INCLUDE WITH THE NOTICE OF TERMINATION "RECORD DRAWINGS" WITH A FINAL CERTIFICATION STATEMENT FROM A LICENSED PROFESSIONAL, WHICH READS AS FOLLOWS: "I (NAME) DO HEREBY CERTIFY PURSUANT TO THE PENALTIES OF 18 P.A.C.S.A. § 4904 TO THE BEST OF MY KNOWLEDGE, INFORMATION AND BELIEF, THAT THE ACCOMPANYING RECORD DRAWINGS ACCURATELY REFLECT THE AS-BUILT CONDITIONS, ARE TRUE AND CORRECT, AND ARE IN CONFORMANCE WITH CHAPTER 102 OF THE RULES AND REGULATIONS OF THE DEPARTMENT OF ENVIRONMENTAL PROTECTION AND THAT THE PROJECT SITE WAS CONSTRUCTED IN ACCORDANCE WITH THE APPROVED PCSM PLAN, ALL APPROVED PLAN CHANGES AND ACCEPTED CONSTRUCTION PRACTICES."
- THE PERMITTEE SHALL RETAIN A COPY OF THE RECORD DRAWINGS AS A PART OF THE APPROVED PCSM PLAN.
- THE PERMITTEE SHALL PROVIDE A COPY OF THE RECORD DRAWINGS AS A PART OF THE APPROVED PCSM PLAN TO THE PERSON IDENTIFIED IN THIS SECTION AS BEING RESPONSIBLE FOR THE LONG-TERM OPERATION AND MAINTENANCE OF THE PCSM BMPs.
- THE PERMITTEE OR CO-PERMITTEE SHALL RECORD AN INSTRUMENT WITH THE RECORDER OF DEEDS WHICH WILL ASSURE DISCLOSURE OF THE PCSM BMPs AND THE RELATED OBLIGATIONS IN THE ORDINARY COURSE OF A TITLE SEARCH OF THE SUBJECT PROPERTY. THE RECORDED INSTRUMENT MUST IDENTIFY THE PCSM BMPs, PROVIDE FOR NECESSARY ACCESS RELATED TO LONG-TERM OPERATION AND MAINTENANCE FOR PCSM BMPs AND PROVIDE NOTICE THAT THE RESPONSIBILITY FOR LONG-TERM OPERATION AND MAINTENANCE OF THE PCSM BMPs IS A COVENANT THAT RUNS WITH THE LAND THAT IS BINDING UPON AND ENFORCEABLE BY SUBSEQUENT GRANTEE, AND PROVIDE PROOF OF FILING WITH THE NOTICE OF TERMINATION UNDER § 102.70(b)(5) (RELATING TO PERMIT TERMINATION). FOR COMMONWEALTH OWNED PROPERTY, A COVENANT THAT RUNS WITH THE LAND IS NOT REQUIRED UNTIL THE TRANSFER OF THE LAND OCCURS. UPON TRANSFER OF THE COMMONWEALTH-OWNED PROPERTY TO AN AGREEMENT WITH ANOTHER PERSON INCLUDING A CONSERVATION DISTRICT, NONPROFIT ORGANIZATION, MUNICIPALITY, AUTHORITY, PRIVATE CORPORATION OR OTHER PERSON, TO TRANSFER THE RESPONSIBILITY FOR PCSM BMPs OR TO PERFORM LONG-TERM OPERATION AND MAINTENANCE AND PROVIDE NOTICE THEREOF TO THE DEPARTMENT. A PERMITTEE OR CO-PERMITTEE THAT FAILS TO TRANSFER LONG-TERM OPERATION AND MAINTENANCE OF THE PCSM BMPs OR OTHERWISE FAILS TO COMPLY WITH THIS REQUIREMENT SHALL REMAIN JOINTLY, AND SEVERALLY RESPONSIBLE WITH THE LANDOWNER FOR LONG-TERM OPERATION AND MAINTENANCE OF THE PCSM BMPs LOCATED ON THE PROPERTY.
- ANY REVISIONS TO THE PCSM PLAN WILL REQUIRE LEHIGH COUNTY CONSERVATION DISTRICT APPROVAL.



BMP #1 6.6.3 DRY EXTENDED UNDERGROUND DETENTION BASIN MRC DESIGN:

NOTES:

GENERAL NOTES AND SPECIFICATIONS

- THE SUBSURFACE EXTENDED DRY DETENTION BASIN SHALL BE IMPERMEABLE AND ACT AS A NON-INFILTRATING WATER QUALITY BMP.
- UNDERDRAIN PIPES SHALL BE CONTINUOUSLY PERFORATED, SMOOTH INTERIOR, WITH A MINIMUM INSIDE DIAMETER SHOWN ON PLANS. HIGH-DENSITY POLYETHYLENE (HDPE) PIPE SHALL MEET AASHTO M252, TYPE S OR AASHTO M294 TYPE S.

SEQUENCE OF CONSTRUCTION

- INSTALL ALL TEMPORARY EROSION AND SEDIMENTATION CONTROLS PER THE APPROVED EROSION AND SEDIMENTATION POLLUTION CONTROL PLANS. THE AREA IMMEDIATELY ADJACENT TO THE BASIN MUST BE STABILIZED IN ACCORDANCE WITH THE PADEP EROSION AND SEDIMENT POLLUTION CONTROL PROGRAM MANUAL PRIOR TO BASIN CONSTRUCTION.
- PREPARE BASIN AREA FOR EXCAVATION CONSTRUCTION. CLEAR THE AREA TO BE EXCAVATED OF ALL VEGETATION. REMOVE ALL TREE ROOTS, ROCKS AND BOULDERS FROM BASIN AREA.
- EXCAVATE TO THE PROPOSED BASIN INVERT DEPTH. OVER EXCAVATE TO ALLOW FOR INSTALLATION OF SCREENINGS, LINER AND/OR STONE BACKFILL PER BASIN CROSS SECTION.
- INSTALL IMPERMEABLE LINER (10 MIL PVC).
- INSTALL INLET AND OUTLET CONTROL STRUCTURES AND PIPES. APPLY GEOTEXTILES AND OTHER EROSION CONTROL MEASURES.
- INSTALL STONE VOID MATERIAL - 1' DEPTH, DO NOT COMPACT STONE; LIGHT HAND TAMPING IS ACCEPTABLE IF NECESSARY. COMPACTION ONLY UNDER 30 INCH HOPE MAY BE PERMITTED FOR PIPE INSTALLATION.
- INSTALL 30 INCH HDPE PERFORATED PIPES, BACKFILL AS SHOWN AROUND PIPES AND STRUCTURES WITHIN THE UNDERGROUND BASIN FOOTPRINT. DO NOT COMPACT STONE VOID MATERIAL; LIGHT HAND TAMPING IS ACCEPTABLE IF NECESSARY.
- FINALIZE WRAPPING OF THE 10 MIL LINER AS PER DETAIL.
- E & S BMPs SHALL BE MAINTAINED UNTIL ALL TRIBUTARY AREAS ARE PERMANENTLY STABILIZED.

CRITICAL STAGES

A LICENSED PROFESSIONAL OR DESIGNER SHALL BE PRESENT FOR THE FOLLOWING CRITICAL STAGES OF CONSTRUCTION FOR THE DRY EXTENDED DETENTION BASIN:

- SUBGRADE PREPARATION
 - VERIFICATION OF EXCAVATION TO PROPOSED INVERT DEPTH
- INSTALLATION OF LINER
 - VERIFICATION OF LINER (10 MIL PVC)
- BACKFILLING OF STONE VOID MATERIAL
 - VERIFICATION OF BACKFILLING TO PROPOSED INVERT DEPTH
 - VERIFICATION OF NONCOMPACTION.
- INSTALLATION OF STORM STRUCTURES
 - PLACEMENT OF INFLOW AND OUTFLOW STRUCTURES
 - PLACEMENT OF HOPE PIPING.
- BACKFILLING OF UNDERGROUND BASIN WITH MATERIAL AS DETAILED
 - VERIFICATION OF BACKFILLING TO PROPOSED TOP OF BASIN DEPTH
- FINALIZE INSTALLATION OF 10 MIL LINER AS PER DETAIL.

RESPONSIBLE PARTY

- DURING CONSTRUCTION, THE CONTRACTOR IS RESPONSIBLE FOR THE OPERATION AND MAINTENANCE OF THE UNDERGROUND DRY EXTENDED DETENTION BASIN.
- ONCE ALL CONSTRUCTION HAS BEEN COMPLETED, THE PROPERTY OWNER WILL BECOME RESPONSIBLE FOR THE OPERATION AND MAINTENANCE OF THE DRY EXTENDED DETENTION BASIN.

MAINTENANCE AND OPERATION SCHEDULE

FREQUENCY	MAINTENANCE ACTIVITY	REMEDY
WEEKLY OR AS NEEDED OR STORM EVENT GREATER THEN THE 2 YEAR STORM	1. INSPECT SURCHARGE PIPE AND OVERFLOW PIPE	1. REMOVE AND ACCUMULATED SEDIMENT OR DEBRIS TO ENSURE PROPER DRAINAGE
YEARLY	1. INSPECT CLEAN OUT PORT	1. REMOVE DEBRIS FROM DRAINAGE PIPE AS NECESSARY

- ALL BASIN STRUCTURES EXPECTED TO RECEIVE AND/OR TRAP DEBRIS AND SEDIMENT SHOULD BE INSPECTED FOR CLOGGING AND EXCESSIVE DEBRIS AND SEDIMENT ACCUMULATION AT LEAST FOUR TIMES PER YEAR, AS WELL AS AFTER EVERY STORM GREATER THAN 1 INCH. STRUCTURES INCLUDE BASIN BOTTOMS, TRASH RACKS, OUTLET STRUCTURES, RIPRAP OR GABION STRUCTURES, AND INLETS.
- SEDIMENT REMOVAL SHOULD BE CONDUCTED WHEN THE BASIN IS COMPLETELY DRY. SEDIMENT SHOULD BE DISPOSED OF PROPERLY AND ONCE SEDIMENT IS REMOVED, UNDERGROUND BASINS SHOULD BE EXAMINED TO ASSURE THE INTEGRITY OF THE BMP HAS NOT BEEN COMPROMISED.
- CATCH BASINS AND INLETS (UPGRADIENT OF AN INFILTRATION BMPs) SHOULD BE INSPECTED AND CLEANED AT LEAST TWO TIMES PER YEAR AND AFTER RUNOFF EVENTS.
- INSPECT AFTER RUNOFF EVENTS AND MAKE SURE THAT RUNOFF DRAINS DOWN WITHIN 72 HOURS. MOSQUITO'S SHOULD NOT BE A PROBLEM IF THE WATER DRAINS IN 72 HOURS. MOSQUITOES REQUIRE A CONSIDERABLY LONG BREEDING PERIOD WITH RELATIVELY STATIC WATER LEVELS.
- INSPECT FOR ACCUMULATION OF SEDIMENT, DAMAGE TO OUTLET CONTROL STRUCTURES, EROSION CONTROL MEASURES, SIGNS OF WATER CONTAMINATION/SPILLS.
- REMOVE ACCUMULATED SEDIMENT AS REQUIRED. PROPERLY DISPOSE OF SEDIMENT.

BMP#2 - 6.6.4 WATER QUALITY INLET OPERATION AND MAINTENANCE :

Sumped Structure/Snouts.

FREQUENCY	MAINTENANCE ACTIVITY	REMEDY
AFTER EVERY STORM EVENT GREATER THAN THE 2 YEAR AND MONTHLY FOR FIRST YEAR	1. INSPECT INLETS FOR SEDIMENT, DEBRIS & OIL ACCUMULATION	1. CHECK AND RECORD SEDIMENT DEPTH AND SURFACE POLLUTANTS TO PLAN FUTURE MAINTENANCE. IT IS BEST TO SCHEDULE MAINTENANCE BASED ON SOLIDS COLLECTED IN SUMP.
WHEN SUMP IS HALF FULL OR IF A SPILL OR OTHER INCIDENT CAUSES A LARGER THAN NORMAL ACCUMULATION OF POLLUTANTS	1. CLEAN THE INLET	1. MAINTENANCE IS BEST PERFORMED WITH A VACUUM TRUCK. ALL COLLECTED WASTED MUST BE HANDLED AND DISPOSED OF ACCORDING TO LOCAL, STATE, AND FEDERAL REGULATIONS.
ANNUALLY	1. INSPECT THE INLET FOR SEDIMENT, DEBRIS & OIL ACCUMULATION	1. CLEAN AS NEEDED. FLUSH STRUCTURE BOTTOM AFTER REMOVAL OF DEBRIS.

POST CONSTRUCTION STORMWATER MANAGEMENT (PCSM) STANDARD NOTES:

PERMIT TERMINATION
UPON PERMANENT STABILIZATION OF THE EARTH DISTURBANCE ACTIVITY UNDER § 102.22(A)(2) (RELATING TO PERMANENT STABILIZATION), AND INSTALLATION OF BMPs IN ACCORDANCE WITH AN APPROVED PLAN PREPARED AND IMPLEMENTED IN ACCORDANCE WITH §§ 102.4 AND 102.8 (RELATING TO EROSION AND SEDIMENT CONTROL REQUIREMENTS, AND PCSM REQUIREMENTS), THE PERMITTEE OR CO-PERMITTEE SHALL SUBMIT A NOTICE OF TERMINATION TO THE DEPARTMENT OR CONSERVATION DISTRICT.

THE NOTICE OF TERMINATION MUST INCLUDE:
(1) THE FACILITY NAME, ADDRESS AND LOCATION.
(2) THE OPERATOR NAME AND ADDRESS.
(3) THE PERMIT NUMBER.
(4) THE REASON FOR PERMIT TERMINATION.
(5) IDENTIFICATION OF THE PERSONS WHO HAVE AGREED TO AND WILL BE RESPONSIBLE FOR LONG-TERM OPERATION AND MAINTENANCE OF THE PCSM BMPs IN ACCORDANCE WITH § 102.8(M) AND PROOF OF COMPLIANCE WITH § 102.8(M)(2).

PCSM REQUIREMENTS
PCSM REPORTING AND RECORDKEEPING. THE PCSM PLAN, INSPECTION REPORTS AND MONITORING RECORDS SHALL BE AVAILABLE FOR REVIEW AND INSPECTION BY THE DEPARTMENT OR THE CONSERVATION DISTRICT.

LICENSED PROFESSIONAL OVERSIGHT OF CRITICAL STAGES. A LICENSED PROFESSIONAL OR A DESIGNER SHALL BE PRESENT ON SITE AND BE RESPONSIBLE DURING CRITICAL STAGES OF IMPLEMENTATION OF THE APPROVED PCSM PLAN. THE CRITICAL STAGES MAY INCLUDE THE INSTALLATION OF UNDERGROUND TREATMENT OR STORAGE BMPs, STRUCTURALLY ENGINEERED BMPs, OR OTHER BMPs AS DEEMED APPROPRIATE BY THE DEPARTMENT OR THE CONSERVATION DISTRICT.

FINAL CERTIFICATION. THE PERMITTEE SHALL INCLUDE WITH THE NOTICE OF TERMINATION "RECORD DRAWINGS" WITH A FINAL CERTIFICATION STATEMENT FROM A LICENSED PROFESSIONAL, WHICH READS AS FOLLOWS:
"I (NAME) DO HEREBY CERTIFY PURSUANT TO THE PENALTIES OF 18 P.A.C.S.A. § 4904 TO THE BEST OF MY KNOWLEDGE, INFORMATION AND BELIEF, THAT THE ACCOMPANYING RECORD DRAWINGS ACCURATELY REFLECT THE AS-BUILT CONDITIONS, ARE TRUE AND CORRECT, AND ARE IN CONFORMANCE WITH CHAPTER 102 OF THE RULES AND REGULATIONS OF THE DEPARTMENT OF ENVIRONMENTAL PROTECTION AND THAT THE PROJECT SITE WAS CONSTRUCTED IN ACCORDANCE WITH THE APPROVED PCSM PLAN, ALL APPROVED PLAN CHANGES AND ACCEPTED CONSTRUCTION PRACTICES."

(1) THE PERMITTEE SHALL RETAIN A COPY OF THE RECORD DRAWINGS AS A PART OF THE APPROVED PCSM PLAN.
(2) THE PERMITTEE SHALL PROVIDE A COPY OF THE RECORD DRAWINGS AS A PART OF THE APPROVED PCSM PLAN TO THE PERSON IDENTIFIED IN THIS SECTION AS BEING RESPONSIBLE FOR THE LONG-TERM OPERATION AND MAINTENANCE OF THE PCSM BMPs.

PCSM LONG TERM OPERATIONS AND MAINTENANCE REQUIREMENTS
UNTIL THE PERMITTEE OR CO-PERMITTEE HAS RECEIVED WRITTEN APPROVAL OF A NOTICE OF TERMINATION, THE PERMITTEE OR CO-PERMITTEE WILL REMAIN RESPONSIBLE FOR COMPLIANCE WITH THE PERMIT TERMS AND CONDITIONS INCLUDING LONG-TERM OPERATION AND MAINTENANCE OF ALL PCSM BMPs ON THE PROJECT SITE AND IS RESPONSIBLE FOR VIOLATIONS OCCURRING ON THE PROJECT SITE. THE DEPARTMENT OR CONSERVATION DISTRICT WILL CONDUCT A FINAL INSPECTION AND APPROVE OR DENY THE NOTICE OF TERMINATION WITHIN 30 DAYS.

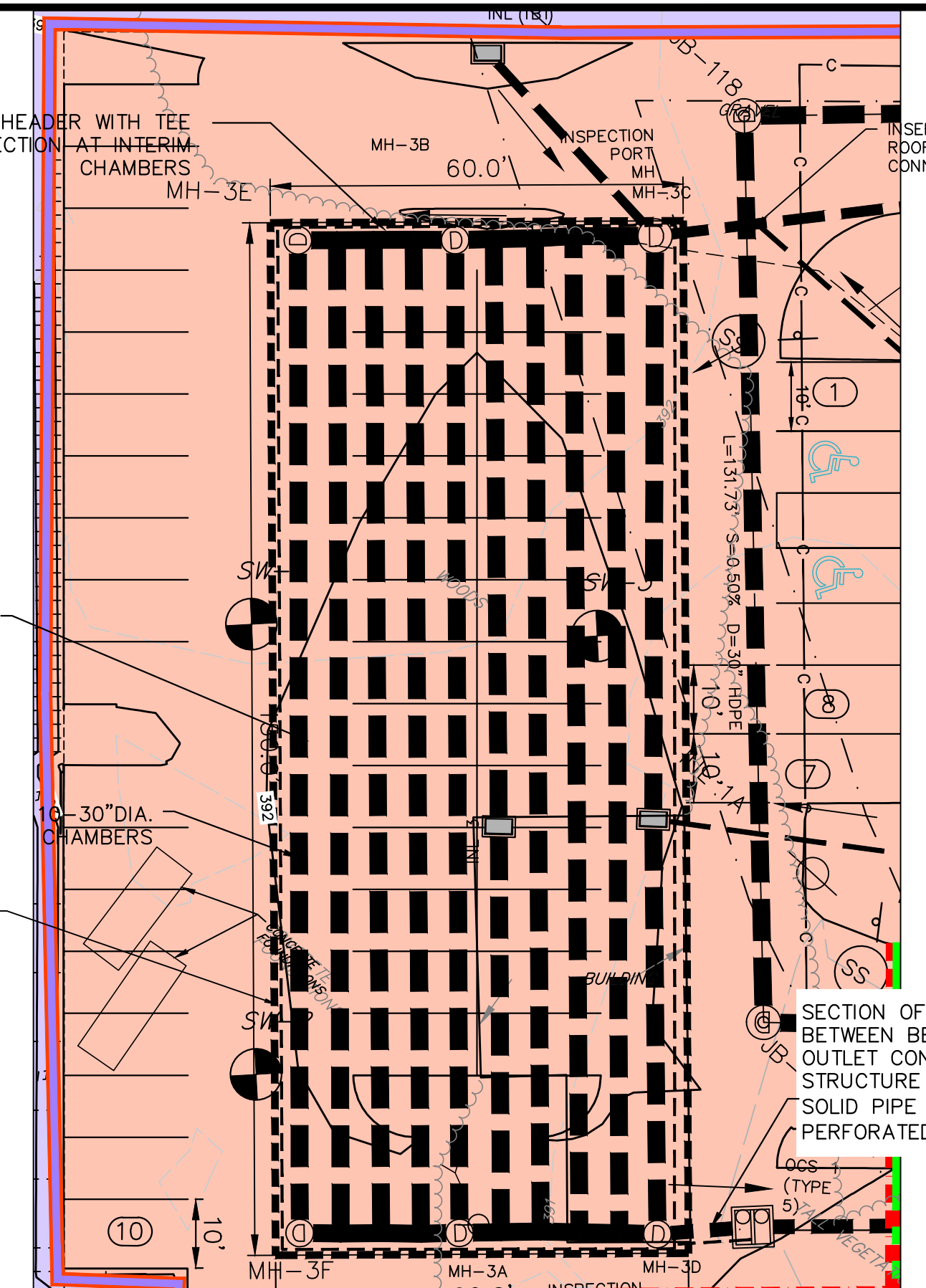
THE PERMITTEE OR CO-PERMITTEE SHALL BE RESPONSIBLE FOR LONG-TERM OPERATION AND MAINTENANCE OF PCSM BMPs UNLESS A DIFFERENT PERSON IS IDENTIFIED IN THE NOTICE OF TERMINATION AND HAS AGREED TO LONG-TERM OPERATION AND MAINTENANCE OF PCSM BMPs.

FOR ANY PROPERTY CONTAINING A PCSM BMP, THE PERMITTEE OR CO-PERMITTEE SHALL RECORD AN INSTRUMENT WITH THE RECORDER OF DEEDS WHICH WILL ASSURE DISCLOSURE OF THE PCSM BMP AND THE RELATED OBLIGATIONS IN THE ORDINARY COURSE OF A TITLE SEARCH OF THE SUBJECT PROPERTY. THE RECORDED INSTRUMENT MUST IDENTIFY THE PCSM BMP, PROVIDE FOR NECESSARY ACCESS RELATED TO LONG-TERM OPERATION AND MAINTENANCE FOR PCSM BMPs AND PROVIDE NOTICE THAT THE RESPONSIBILITY FOR LONG-TERM OPERATION AND MAINTENANCE OF THE PCSM BMP IS A COVENANT THAT RUNS WITH THE LAND THAT IS BINDING UPON AND ENFORCEABLE BY SUBSEQUENT GRANTEE, AND PROVIDE PROOF OF FILING WITH THE NOTICE OF TERMINATION UNDER § 102.70(b)(5) (RELATING TO PERMIT TERMINATION).

THE PERSON RESPONSIBLE FOR PERFORMING LONG-TERM OPERATION AND MAINTENANCE MAY ENTER INTO AN AGREEMENT WITH ANOTHER PERSON INCLUDING A CONSERVATION DISTRICT, NONPROFIT ORGANIZATION, MUNICIPALITY, AUTHORITY, PRIVATE CORPORATION OR OTHER PERSON, TO TRANSFER THE RESPONSIBILITY FOR PCSM BMPs OR TO PERFORM LONG-TERM OPERATION AND MAINTENANCE AND PROVIDE NOTICE THEREOF TO THE DEPARTMENT.

A PERMITTEE OR CO-PERMITTEE THAT FAILS TO TRANSFER LONG-TERM OPERATION AND MAINTENANCE OF THE PCSM BMP OR OTHERWISE FAILS TO COMPLY WITH THIS REQUIREMENT SHALL REMAIN JOINTLY AND SEVERALLY RESPONSIBLE WITH THE LANDOWNER FOR LONG-TERM OPERATION AND MAINTENANCE OF THE PCSM BMPs LOCATED ON THE PROPERTY.

ALL PIPE WITHIN BED LIMITS SHALL BE PERFORMED



STANDARD 48" DIA. CLEANOUT MANHOLES

MH3A - RIM=392.27
MH3B - RIM=392.90
MH3C - RIM=392.43

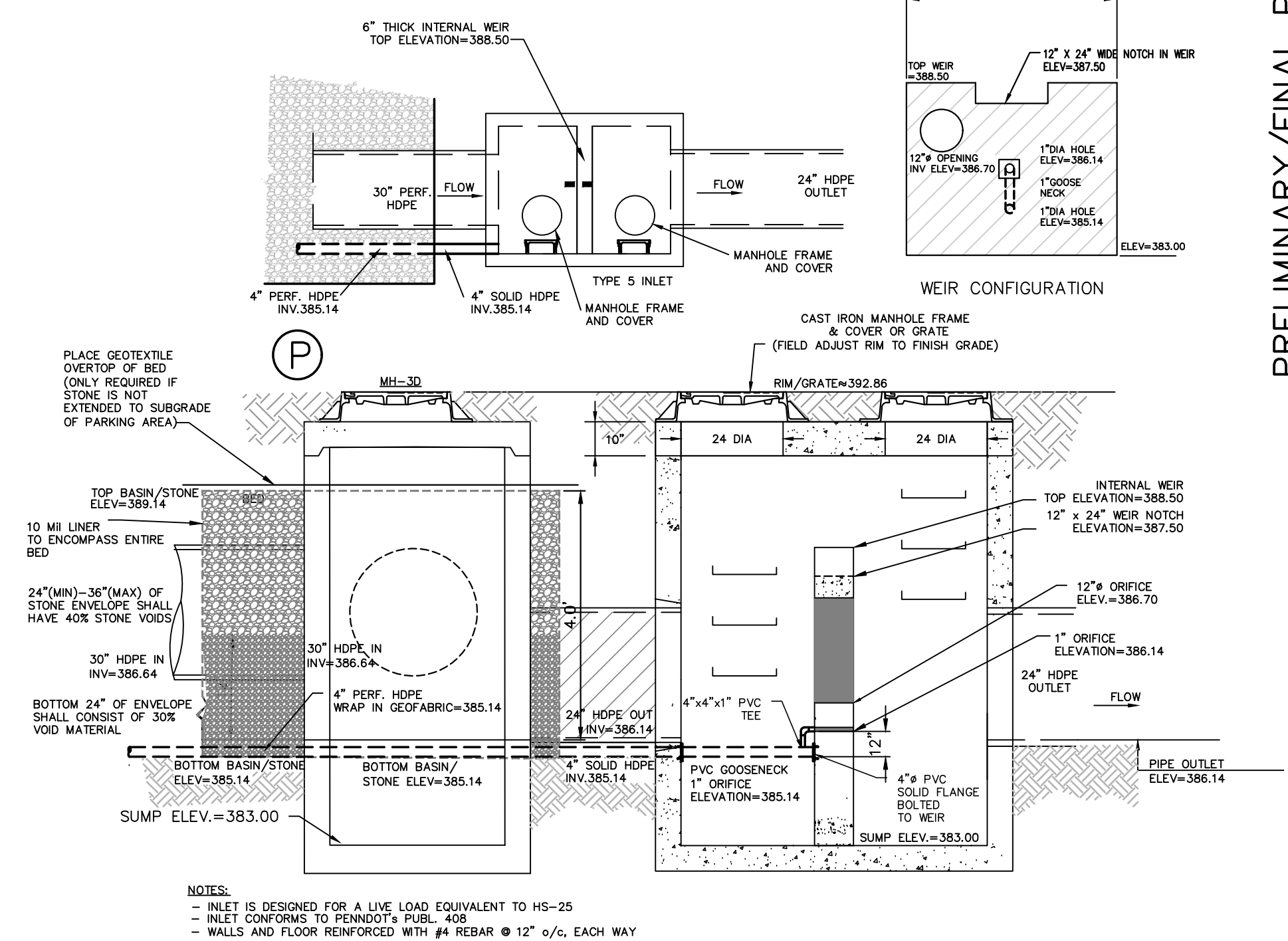
BASIN SURFACE CAPTURE
INL 3 - TG=391.39
INV=386.64

BASIN #	FINISHED BOTTOM ELEVATION	MRC STONE DEPTH	MRC NATIVE BOTTOM ELEVATION	IWS SOIL DEPTH	TOP OF IWS ELEV.	DRILLED ORIFICE DIA.	DRILLED ORIFICE ELEV.	OUTLET PIPE INVERT ELEV. OUT OF OUTLET STRUCTURE
BASIN 1	385.14	4 FT.-MIN	385.14	1 FT.	386.14	1"	386.14	386.14

TOP OF BASIN 385.14 (MIN)

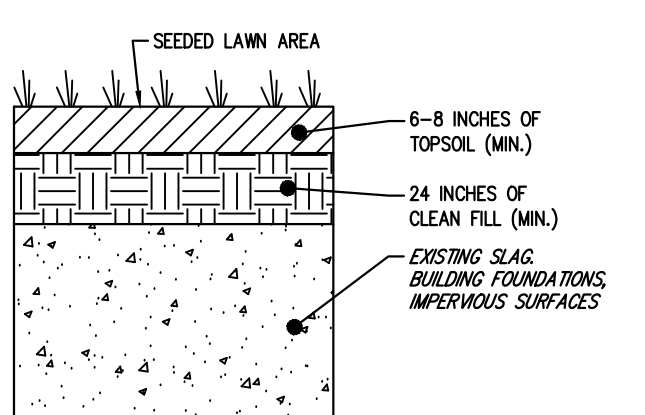
LONG-TERM PCSM O&M RESPONSIBLE PARTY

SAUCON POINTE, LLC
DANO GUERRIERI
1721 WILLIAMS STREET
HELLERTOWN, PA 18055
saucopointe@gmail.com
610-428-1313



NOTES:
- INLET IS DESIGNED FOR A LIVE LOAD EQUIVALENT TO HS-20
- INLET CONFORMS TO PENNSYLVANIA DEPARTMENT OF TRANSPORTATION STANDARD SPECIFICATIONS FOR BRIDGES AND INFRASTRUCTURE
- WALLS AND FLOOR REINFORCED WITH #4 REBAR @ 12" o/c EACH WAY

OCS-1 PROPOSED OUTLET CONTROL STRUCTURE FOR SLOW RELEASE UNDERGROUND DETENTION BASIN #1 N.T.S.



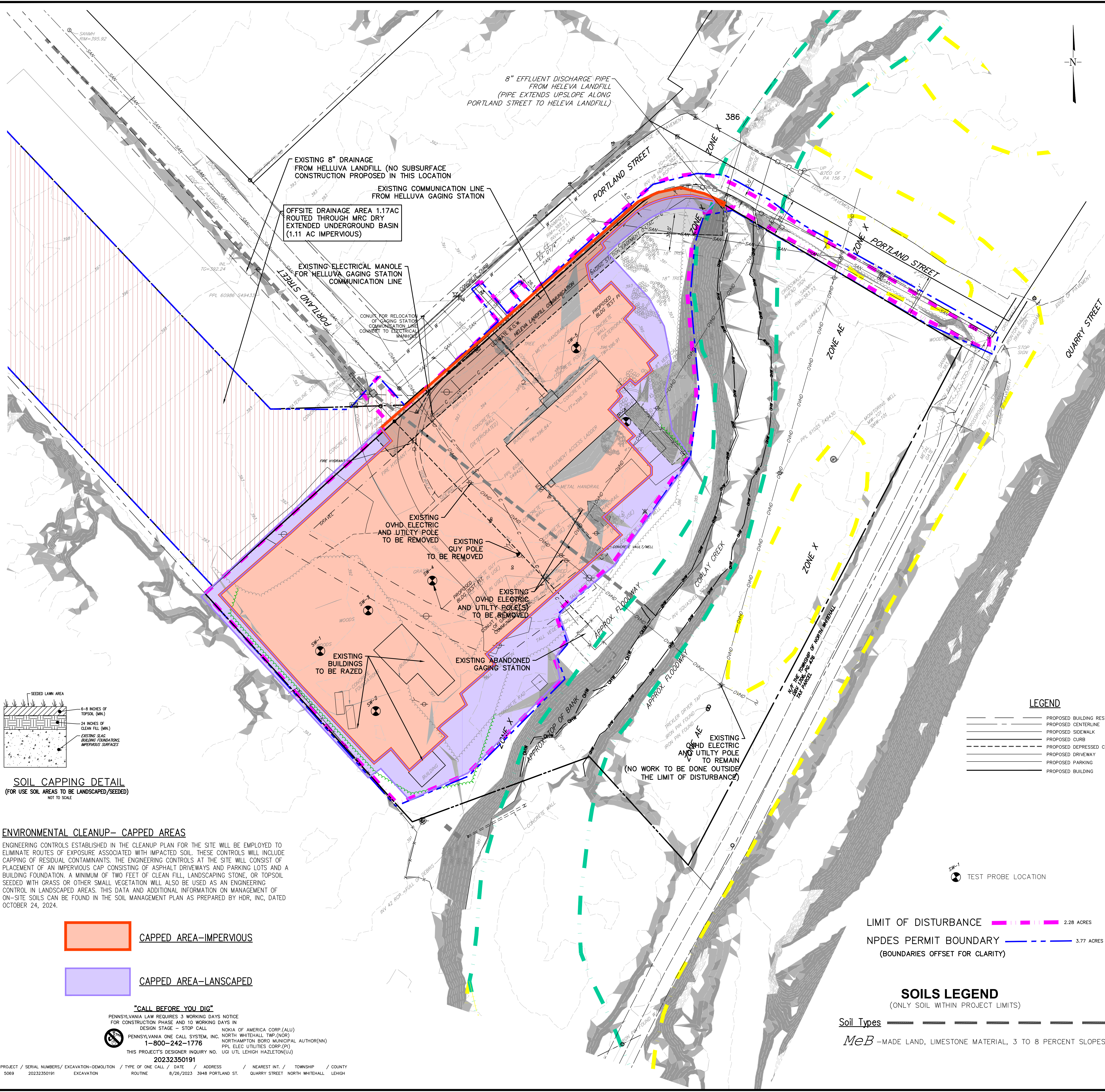
SOIL CAPPING DETAIL (FOR USE SOIL AREAS TO BE LANDSCAPED/SEED)

NOT TO SCALE

PROJECT / SERIAL NUMBERS / EXCAVATION-DEMOLITION	TYPE OF ONE CALL / DATE	ADDRESS	NEAREST INT. / TOWNSHIP	COUNTY
5069 20232350191 EXCAVATION	ROUTINE	8/26/2023 3948 PORTLAND ST.	QUARRY STREET	NORTH WHITEHALL LEHIGH

"CALL BEFORE YOU DIG"
PENNSYLVANIA LAW REQUIRES 3 WORKING DAYS NOTICE FOR CONSTRUCTION PHASE AND 10 WORKING DAYS IN DESIGN STAGE - STOP CALL
NOKIA OF AMERICA CORP.(ALL)
NORTH WHITEHALL TWP.(NOR)
NORTHAMPTON BORO MUNICIPAL AUTHOR(NN)
PPL ELEC UTILITIES CORP.(PI)
UGI UTIL LEHIGH HAZZLE(UTL)

20232350191



TEST PROBE LOG

SW-1 C. Taylor. 11-10-2023. Point #5015. Existing ground = 392.7
0' - 104" FILL: Black, non-native sandy loam with chunks of concrete and pieces of coal, layers of native soil and shaly limestone.
104" - 108" Possible buried topsoil horizon: Dark yellowish brown (10YR 4/4) silt loam, subangular blocky structure, moist, friable, common roots, coarse fragment content <5%.
108" - 134" Natural soil horizon: Strong brown (7.5YR 4/6) sandy loam, subangular blocky to granular structure, dry, soft, no roots, coarse fragment content 30% (subrounded gravel and cobbles of native stone).
134" Bottom of test pit.
Bedrock: NONE
Evidence of Seasonally High Water Table: NONE

SW-2 C. Taylor. 11-10-2023. Point # 5001. Existing ground = 391.75.
0' - 108" FILL: Slag, coal ash, debris (brick, leather band), layer of native soil at 28" - 43". Concrete structure at 108" - 114" Possible buried topsoil horizon: Dark yellowish brown (10YR 4/4) silt loam, subangular blocky structure, moist, friable, no roots, coarse fragment content 5%.
114" - 128" Natural soil horizon: Strong brown (7.5YR 5/6) loam to silt loam, subangular blocky structure, moist, very friable, no roots, coarse fragment content 30% (subrounded gravel and cobbles).
128" Bottom of test pit.
Bedrock: NONE
Evidence of Seasonally High Water Table: NONE

SW-3 C. Taylor. 11-10-2023. Point #5017. Existing ground = 391.25.
0' - 100" FILL: Slag, slate, brick, layer of native soil 24" - 50".
100" - 108" Natural soil horizon: Yellowish brown (10YR 5/4) silt loam, angular blocky structure, moist, firm, few roots, coarse fragment content <5%.
108" - 120" Natural soil horizon: Yellowish brown (10YR 5/4) silt loam, angular blocky structure, moist, firm, no roots, coarse fragment content <5%.
120" Bottom of test pit.
Bedrock: NONE
Evidence of Seasonally High Water Table: NONE

SW-4 C. Taylor. 11-10-2023. Southwest building corner. Existing ground = 392.2.
0' - 96" FILL: Slag, bricks. Encountered brick lined conduit covered with corrugated metal, approximately 15" wide x 24" tall running east-west through test pit; structure comes to surface.
96" - 102" Natural soil horizon: Yellowish brown (10YR 5/4) silt loam, angular blocky structure, moist, firm, no roots, coarse fragment content <5%.
102" - 108" Natural soil horizon: Brown (7.5YR 5/4) loam to silt loam, subangular blocky structure, moist, friable, no roots, coarse fragment content 10%.
108" - 120" Natural soil horizon: Yellowish brown (10YR 5/6) silt loam, subangular blocky structure, moist, very friable, no roots, coarse fragment content 10% (rounded gravel and flags of limestone).
120" Bottom of test pit.
Bedrock: NONE
Evidence of Seasonally High Water Table: NONE

SW-5 C. Taylor. 11-10-2023. Northeast building corner. Existing ground unknown.
0' - 130" FILL: Native soil and shaly limestone, slag, brick, chunks of concrete.
No natural soil to bottom of test pit.
130" Bottom of test pit.
Bedrock: NONE
Evidence of Seasonally High Water Table: NONE

TD-A C. Taylor. 11-10-2023. Southeast corner of courtyard. Existing ground unknown.
0' - 84" FILL: Slag
84" - 116" Natural soil horizon: Yellowish brown (10YR 5/6) silty clay loam, subangular blocky structure, very moist, firm, no roots, coarse fragment content 5%.
116" - 118" seepage.
118" Bottom of test pit.
Bedrock: NONE
Evidence of Seasonally High Water Table: 96" - mottling
110" - seepage

EXISTING LEGEND

PROPERTY LINE
EXISTING ADJONER LINE
EXISTING EASEMENT
EXISTING LEGAL RIGHT-OF-WAY
EXISTING PENNDOT RIGHT-OF-WAY
EXISTING COMMUNICATION LINE
EXISTING OVERHEAD ELECTRIC LINE
EXISTING HIGH VOLTAGE OVERHEAD ELECTRIC LINE
UNDERGROUND ELECTRIC LINE
EXISTING SANITARY LINE
EXISTING SANITARY FORCE MAIN
EXISTING SANITARY LATERAL
EXISTING STORM SEWER
EXISTING WATER LINE
EXISTING WATER LATERAL
EXISTING CENTER LINE
EXISTING CURB
EXISTING DRIVEWAY
EXISTING EDGE OF PAVE
EXISTING SIDEWALK
EXISTING GUIDERAIL
EXISTING FENCE
EXISTING GRAVEL
EXISTING PATH
EXISTING RAILROAD
EXISTING SOILS
EXISTING EDGE OF WATER
EXISTING STREAM
EXISTING EDGE OF WETLAND
EXISTING TREE LINE
EXISTING PLANT BED
EXISTING WALL
EXISTING MAJOR CONTOUR
EXISTING MAJOR CONTOUR
EXISTING BELL MANHOLE
EXISTING COMMUNICATION BOX
EXISTING TELEPHONE BOX
EXISTING TV BOX
EXISTING ELECTRIC METER
EXISTING ELECTRIC MANHOLE
EXISTING GUY WIRE
EXISTING LIGHT/LAMP
EXISTING GUY WIRE POLE
EXISTING ELECTRIC POLE
EXISTING UTILITY BOX
EXISTING STORM MANHOLE
EXISTING STORM STRUCTURE
EXISTING ROOF DRAIN
EXISTING GAS VALVE
EXISTING GAS SHUT OFF
EXISTING GAS METER
EXISTING WATER VALVE
EXISTING WATER METER
EXISTING WELL
EXISTING WATER SHUT OFF
EXISTING FIRE HYDRANT
EXISTING CLEANOUT
EXISTING SEWER MANHOLE
EXISTING VENT
EXISTING MONUMENT
EXISTING IRON PIN/PIPE
BENCHMARK
EXISTING BOLLARD
EXISTING FLAG POLE
EXISTING MAIL BOX
EXISTING POLE
EXISTING PAPER BOX
EXISTING SIGN
EXISTING TREES
EXISTING SHRUB
EXISTING STUMP
50' BUFFER
ORDINARY HIGH WATER MARK
EXISTING APPX. FLOODWAY
EXISTING APPX. FLOODPLAIN 100Y

LEGEND

PROPOSED BUILDING RESTRICTION LINE
PROPOSED CENTERLINE
PROPOSED SIDEWALK
PROPOSED CURB
PROPOSED DEPRESSED CURB
PROPOSED DRIVEWAY
PROPOSED PARKING
PROPOSED BUILDING

SOILS LEGEND
(ONLY SOIL WITHIN PROJECT LIMITS)

Soil Types ————
MeB -MADE LAND, LIMESTONE MATERIAL, 3 TO 8 PERCENT SLOPES

SOIL CAPPING DETAIL
(FOR USE SOIL AREAS TO BE LANDSCAPED/SEEDED)
NOT TO SCALE

SEEDING LAMN AREA
6-8 INCHES OF TOPSOIL (MIN.)
24 INCHES OF CLEAN FILL (MIN.)
EXISTING SAC BUILDING FOUNDATIONS IMPERVIOUS SURFACES

ENVIRONMENTAL CLEANUP- CAPPED AREAS

ENGINEERING CONTROLS ESTABLISHED IN THE CLEANUP PLAN FOR THE SITE WILL BE EMPLOYED TO ELIMINATE ROUTES OF EXPOSURE ASSOCIATED WITH IMPACTED SOIL. THESE CONTROLS WILL INCLUDE CAPPING OF RESIDUAL CONTAMINANTS. THE ENGINEERING CONTROLS AT THE SITE WILL CONSIST OF PLACEMENT OF AN IMPERVIOUS CAP CONSISTING OF ASPHALT DRIVEWAYS AND PARKING LOTS AND A BUILDING FOUNDATION. A MINIMUM OF TWO FEET OF CLEAN FILL, LANDSCAPING STONE, OR TOPSOIL SEEDED WITH GRASS OR OTHER SMALL VEGETATION WILL ALSO BE USED AS AN ENGINEERING CONTROL IN LANDSCAPED AREAS. THIS DATA AND ADDITIONAL INFORMATION ON MANAGEMENT OF ON-SITE SOILS CAN BE FOUND IN THE SOIL MANAGEMENT PLAN AS PREPARED BY HDR, INC., DATED OCTOBER 24, 2024.

CAPPED AREA-IMPERVIOUS
CAPPED AREA-LANDSCAPED

"CALL BEFORE YOU DIG"
PENNSYLVANIA LAW REQUIRES 3 WORKING DAYS NOTICE FOR CONSTRUCTION PHASE AND 10 WORKING DAYS IN DESIGN STAGE - STOP CALL
NOKIA OF AMERICA CORP.(ALU)
PENNSYLVANIA ONE CALL SYSTEM, INC. NORTH WHITEHALL TWP.(NOR)
NORTHAMPTON BORO MUNICIPAL AUTHOR(NW)
PPL ELEC UTILITIES CORP.(PI)
UGI UTIL LEHIGH HAZLETEN(UJ)
20232350191

PROJECT / SERIAL NUMBERS/ EXCAVATION-DEMOLITION / TYPE OF ONE CALL / DATE / ADDRESS / NEAREST INT. / TOWNSHIP / COUNTY
5069 20232350191 EXCAVATION ROUTINE 8/28/2023 3948 PORTLAND ST. QUARRY STREET NORTH WHITEHALL LEHIGH

EXISTING FEATURES PLAN

PCSM PLAN 3948 PORTLAND STREET

PLAN TITLE: PROJECT FILE: NORTH WHITEHALL TOWNSHIP LEHIGH COUNTY PENNSYLVANIA

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HanoverEngineering
Bethlehem Office
252 Broadhead Road, Suite 100
Bethlehem, PA 18017-6544
P: 610.691.5644
F: 610.691.6965
hanovereng.com

NO. 1 2 3 4 5 6 7 8

DATE 6/20/24 7/12/24 11/15/24 02/24/25 05/23/25 07/23/25 11/28/25

REVISIONS GENERAL REVISIONS ECP SUBMISSION TOWNSHIP REVIEW LCD/TOWNSHIP SUBMISSION LCD ADMIN REVIEW LVPC REVIEW TOWNSHIP REVIEW

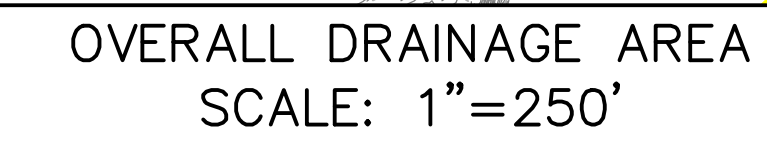
PER LCD TECH REVIEW PER LCD TECH REVIEW PER LCD TECH REVIEW

DATE 11/15/23 07/12/24 07/20/26

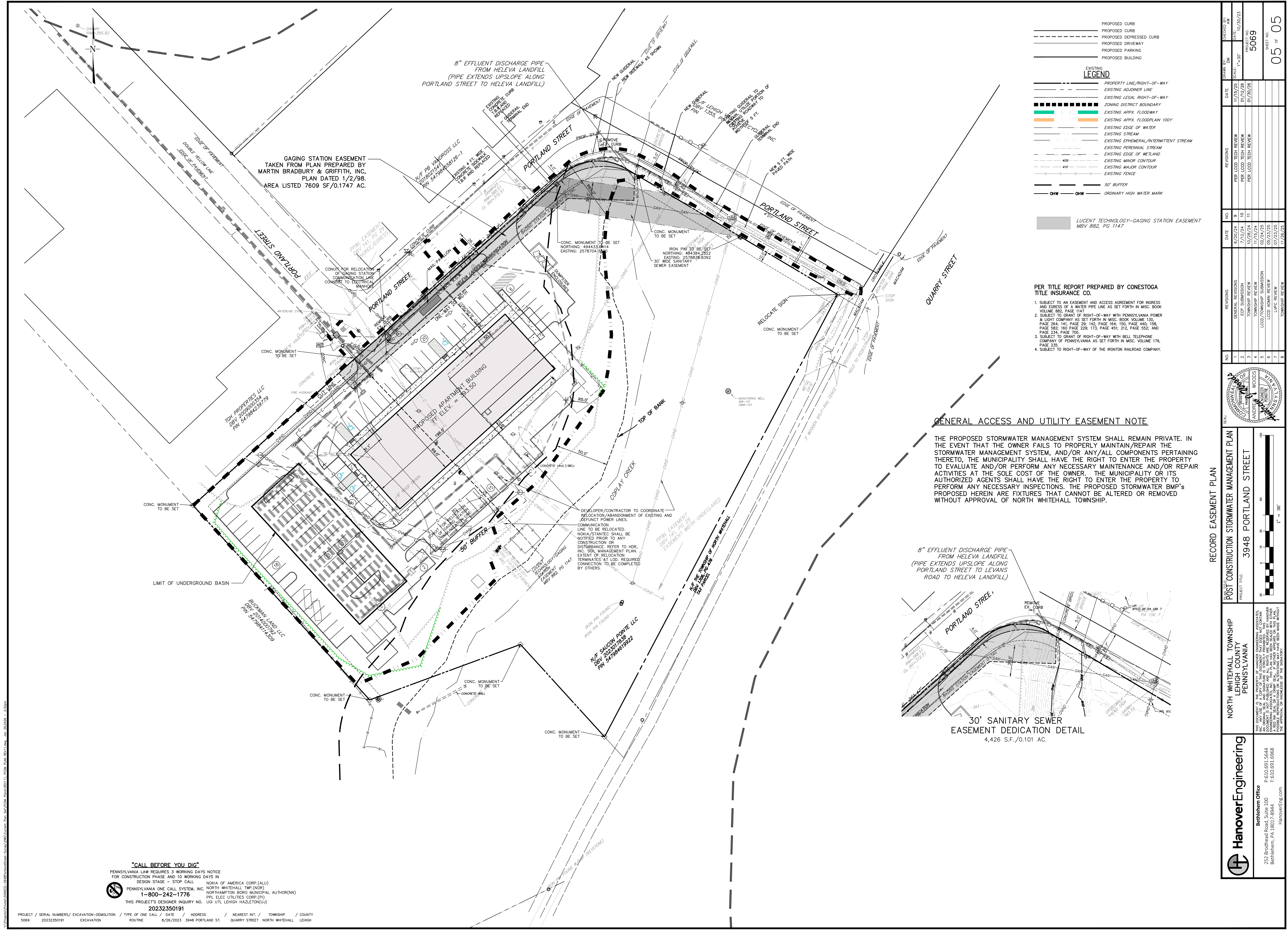
SCALE 1"=30'

PROJECT NO. 5069

SHEET NO. 03 OF 05



- ON SITE AREA
NOT TREATED
BY MRC.
- 0.53 ACRES
TREATED BY
W.Q. INLET



PROPOSED CURB
PROPOSED CURB
PROPOSED DEPRESSION CURB
PROPOSED DRIVEWAY
PROPOSED PARKING
PROPOSED BUILDING

EXISTING LEGEND
PROPERTY LINE/RIGHT-OF-WAY
EXISTING ADJOINER LINE
EXISTING LEGAL RIGHT-OF-WAY
ZONING DISTRICT BOUNDARY
EXISTING APPX. FLOODWAY
EXISTING APPX. FLOODPLAIN 100Y
EXISTING EDGE OF WATER
EXISTING STREAM
EXISTING EPHEMERAL/INTERMITTENT STREAM
EXISTING PERENNIAL STREAM
EXISTING MAJOR CONTOUR
EXISTING MAJOR CONTOUR
EXISTING FENCE
OHW OHW ORDINARY HIGH WATER MARK

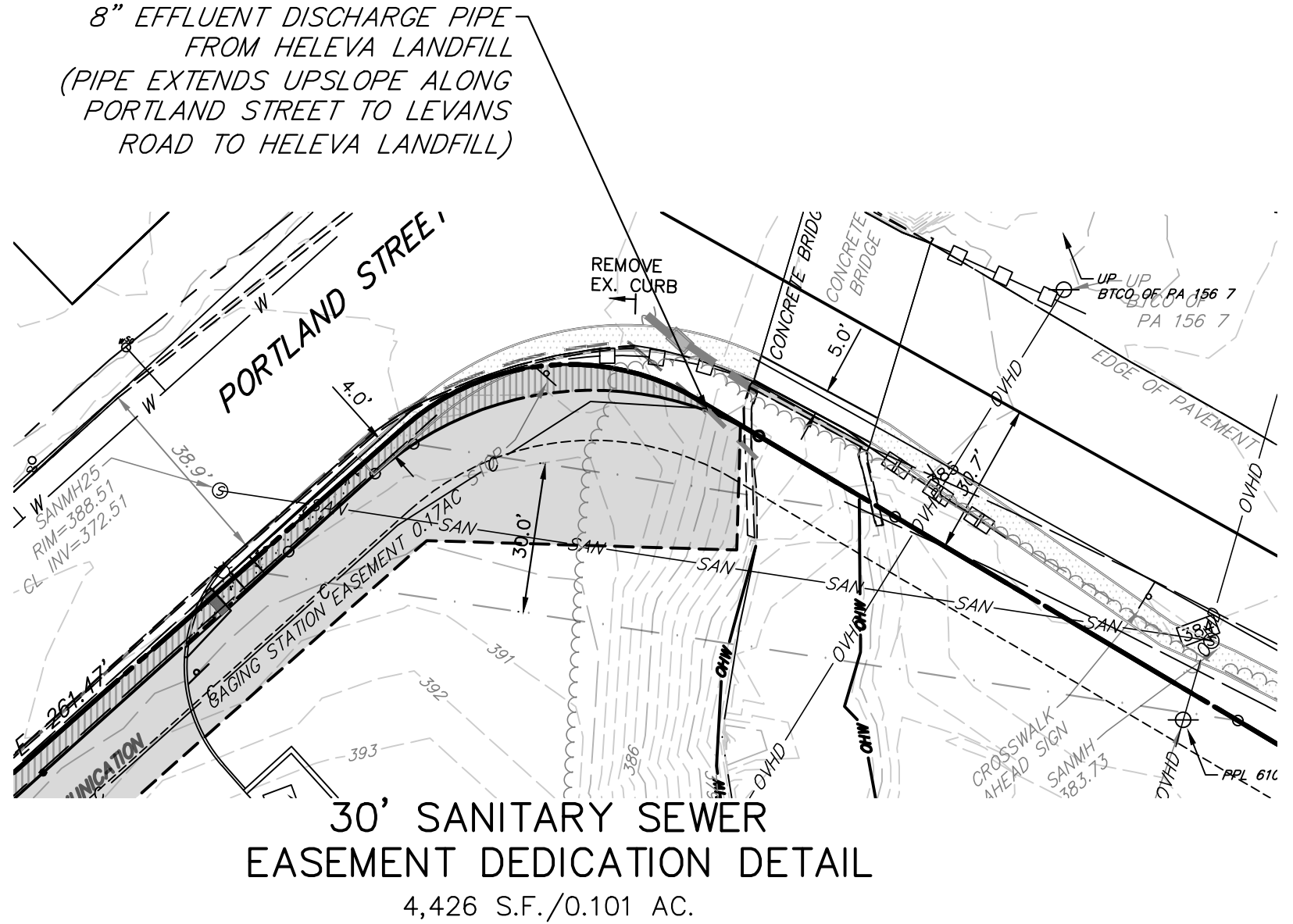
LUCCENT TECHNOLOGY-GAGING STATION EASEMENT
MBV 882, PG 1147

PER TITLE REPORT PREPARED BY CONESTOGA TITLE INSURANCE CO.

- SUBJECT TO AN EASEMENT AND ACCESS AGREEMENT FOR INGRESS AND EGRESS OF A WATER PIPE LINE AS SET FORTH IN MISC. BOOK VOLUME 182, PAGE 1147.
- SUBJECT TO GRANT OF RIGHT-OF-WAY WITH PENNSYLVANIA POWER & LIGHT COMPANY AS SET FORTH IN MISC. BOOK VOLUME 130, PAGE 264; 141, PAGE 29; 142, PAGE 164; 150, PAGE 440; 158, PAGE 582; 160, PAGE 229; 173, PAGE 451; 212, PAGE 552; AND PAGE 234, PAGE 700.
- SUBJECT TO GRANT OF RIGHT-OF-WAY WITH BELL TELEPHONE COMPANY OF PENNSYLVANIA AS SET FORTH IN MISC. VOLUME 179, PAGE 235.
- SUBJECT TO RIGHT-OF-WAY OF THE IRONTON RAILROAD COMPANY.

GENERAL ACCESS AND UTILITY EASEMENT NOTE

THE PROPOSED STORMWATER MANAGEMENT SYSTEM SHALL REMAIN PRIVATE. IN THE EVENT THAT THE OWNER FAILS TO PROPERLY MAINTAIN/REPAIR THE STORMWATER MANAGEMENT SYSTEM, AND/OR ANY/ALL COMPONENTS PERTAINING THERETO, THE MUNICIPALITY SHALL HAVE THE RIGHT TO ENTER THE PROPERTY TO EVALUATE AND/OR PERFORM ANY NECESSARY MAINTENANCE AND/OR REPAIR ACTIVITIES AT THE SOLE COST OF THE OWNER. THE MUNICIPALITY OR ITS AUTHORIZED AGENTS SHALL HAVE THE RIGHT TO ENTER THE PROPERTY TO PERFORM ANY NECESSARY INSPECTIONS. THE PROPOSED STORMWATER BMP'S PROPOSED HEREIN ARE FIXTURES THAT CANNOT BE ALTERED OR REMOVED WITHOUT APPROVAL OF NORTH WHITEHALL TOWNSHIP.



"CALL BEFORE YOU DIG"
PENNSYLVANIA LAW REQUIRES 3 WORKING DAYS NOTICE FOR CONSTRUCTION PHASE AND 10 WORKING DAYS IN DESIGN STAGE - STOP CALL
NOKIA OF AMERICA CORP.(ALL)
PENNSYLVANIA ONE CALL SYSTEM, INC. NORTH WHITEHALL TWP.(NOR)
1-800-242-1776 NORTHAMPTON BORO MUNICIPAL AUTHOR(NN)
PPL ELEC UTILITIES CORP.(PI)
THIS PROJECT'S DESIGNER INQUIRY NO. UGI UTIL LEHIGH HAZLETON(UJ)
20232350191

RECORD EASEMENT PLAN

POST CONSTRUCTION STORMWATER MANAGEMENT PLAN

PROJECT TITLE: 3948 PORTLAND STREET

NORTH WHITEHALL TOWNSHIP
LEHIGH COUNTY
PENNSYLVANIA

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Bethlehem, PA 18017-6544
P: 610.691.5644
F: 610.691.6965
hanovereng.com

NO.	REVISIONS	DATE	NO.	REVISIONS	DATE
1	GENERAL REVISIONS	6/20/24	9	PER LCD TECH REVIEW	11/15/25
2	ECP SUBMISSION	7/12/24	10	PER LCD TECH REVIEW	07/12/26
3	TOWNSHIP REVIEW	10/28/24	11	PER LCD TECH REVIEW	07/20/26
4	TOWNSHIP REVIEW	11/15/24			
5	LCD/TOWNSHIP SUBMISSION	02/24/25			
6	LCD ADMIN REVIEW	05/23/25			
7	LVC REVIEW	07/23/25			
8	TOWNSHIP REVIEW	11/26/25			

CHECKED BY: DATE: 10/20/23
DRAWN BY: SCALE: 1"=30'

PROJECT NO. 5069
SHEET NO. 05 OF 05