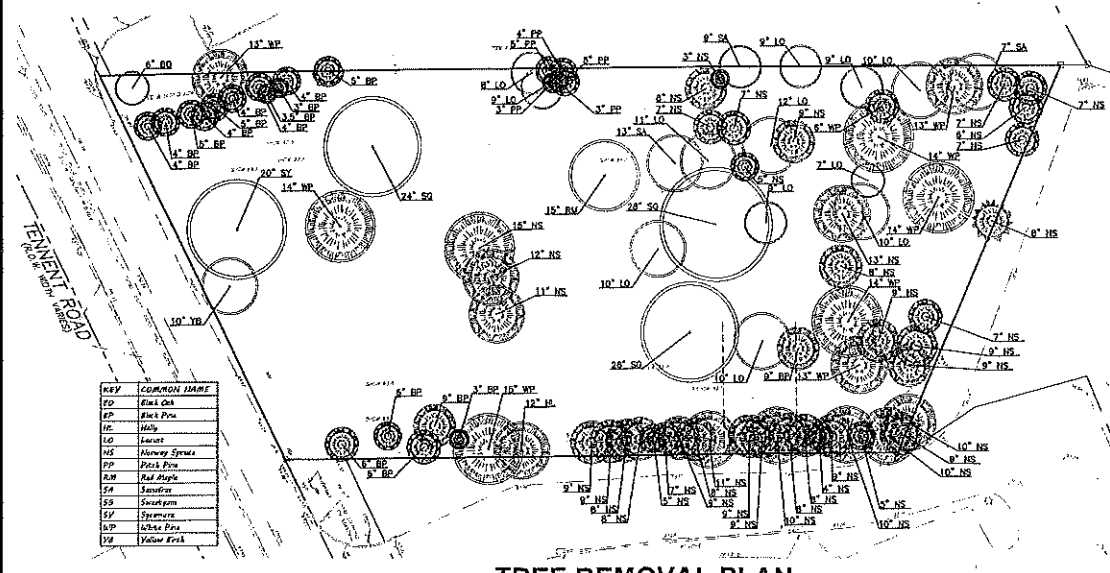


DECIDUOUS AND CONIFEROUS TREE PLANTING DETAIL

PLANTING SCHEDULE

KEY	QTY	BOTANICAL NAME	COMMON NAME	AVL. HE. AT Maturity	INSTALL HEIGHT	CALIPER	ROOT	COMMENTS
DR	1	RED BURNING	RED MAPLE	12'-14'	3'	BAR	UNLTD UP TO 7'	
DC	9	EXPOS CANADENSIS	BASSWOOD	25'	2'-3 1/2"	BAR	WASH-STEM	
PP	1	POCEA FLYCATCHER	COLEOPAGO BLUE GRUPE	35'	0'-8"	BAR		
CL	1	COMPAUS	LELAND CYPRESS	12'	0'-8"	BAR		
SP	13	SHALIA PUGATA	NORTHERN ARBORVITAE	6'	0'-8"	BAR		
SH	14	SHALIA PUGATA	WESTERN ARBORVITAE	6'	0'-8"	BAR		
AI	9	AMORPHOCELE	ARCADIA JASMINE	12'	10'-24"	CAN		
BJ	100	BURNING BUSH	WINTER GEM BURNING	3'	10'-24"	CAN		
M	4	MORNING GLORY	ORANGE CROWN	6'	5'-4"	BAR	PLANT 1 LATE WINTER 'ORANGE CROWN' AS FOLIATION	
FF	6	FORSYTHIA	FRASER'S FORSYTHIA	6'	3'-4"	BAR		
RR	10	ROSA	KNOCK-OUT	6'	18'-24"	CAN		
J	25	JANUS	JANUS	6'	2'-3"	CAN		
PL	25	PLANT	PLANT	6'	2'-3"	BAR		
GA	12	GERANIUM	GERANIUM	6'	10'-14"	CAN		
VI	22	VIBURNUM	VIBURNUM	6'	2'-2"	BAR		

LANDSCAPING PLAN



EXISTING TREE TO BE REMOVED		REPLACEMENT TREE REQUIRED	
CALIPER SIZE	QUANTITY	QUANTITY	CALIPER SIZE
UP TO 4"	14	0	0
GREATER THAN 4" AND UP TO 12"	62	101	2"-2 1/2"
GREATER THAN 12" AND UP TO 18"	12	24	2"-2 1/2"
GREATER THAN 18" AND UP TO 24"	2	4	3"
GREATER THAN 24"	2	4	3"
TOTAL	92	132	

TREE REPLACEMENT COST		REPLACEMENT TREES PLANTED		COMPARISON	
CALIPER SIZE	QUANTITY	PLANTED	PLANTED	PLANTED	PLANTED
2"-2 1/2"	24	10	12	10	12
3"	8	6	8	6	8
TOTAL	32	16	20	16	20

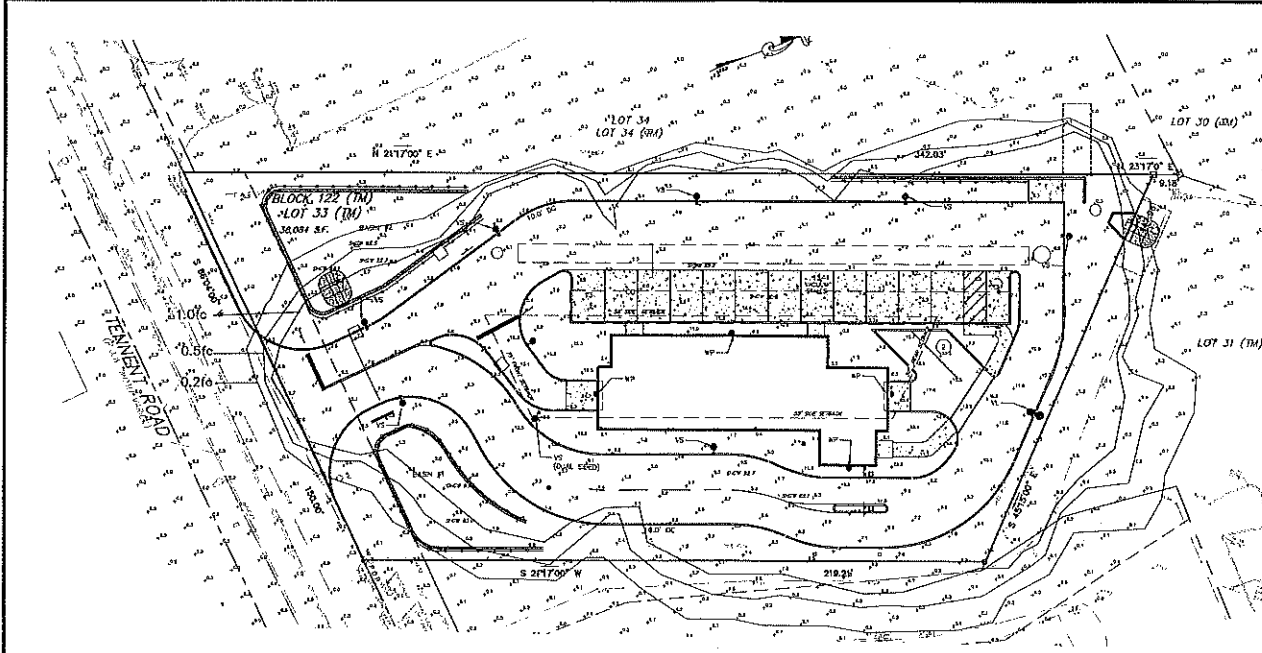
GENERAL LANDSCAPE NOTES

- THE LOCATION OF ALL PLANTS SHOWN ON THE LANDSCAPE PLAN IS APPROXIMATE. THE FINAL LOCATION OF ALL PLANTS AND BED LINES SHALL BE DETERMINED IN THE FIELD UNDER THE DIRECTION OF A REGISTERED PROFESSIONAL LANDSCAPE ARCHITECT.
- EXISTING BARK BARK SHALL BE APPLIED TO ALL PLANTS KEPT AND CONSIDERED FOR PLANTING. BARK BARK SHALL BE KEPT & BARKED FROM TREE TRUNKS AND BRANCHES.
- PLANTS SHALL BE WATERED ON THE SAME DAY OF INSTALLATION. THEREAFTER, REGULAR WATERING SHALL BE PROVIDED TO ENSURE THE ESTABLISHMENT AND GROWTH OF ALL PLANTS. WATERING AND PLANT ESTABLISHMENT SHALL BE THE RESPONSIBILITY OF LANDSCAPE CONTRACTOR.
- WIRE BASKETS ARE TO BE REMOVED FROM ALL PLANT MATERIAL PRIOR TO BACKFILLING THE PLANTING PIT.
- QUANTITIES OF ALL TREES, SHRUBS, ORNAMENTALS AND LAWN SHALL BE GUARANTEED FOR A PERIOD OF TWO (2) YEARS FROM THE RELEASE OF THE PERFORMANCE BOND. ALL PLANTS, LAWN AND ORNAMENTAL AREAS NOT IN A HEALTHY GROWING CONDITION SHALL BE REPLANTED AND REPLACED WITH PLANTS OF LIKE KIND AND SIZE BEFORE THE CLOSE OF THE NEXT PLANTING SEASON BY THE LANDSCAPE CONTRACTOR AT NO CHARGE TO THE OWNER.
- ALL EXISTING AREAS UNLESS INDICATED OTHERWISE ON THE LANDSCAPE PLAN, SHALL BE PLANTED AS LAWN.
- CONTRACTOR SHALL PARTIALLY FILL WITH WATER A REPRESENTATIVE NUMBER OF PITS IN EACH AREA OF THE PROJECT PRIOR TO PLANTING TO DETERMINE IF THERE IS ADEQUATE PERCOLATION. IF NOT ADEQUATE PERCOLATION, MEASURES MUST BE TAKEN TO ASSURE PROPER PLANTING BEDDING PLANTING.
- ALL PLANT MATERIAL SHALL CONFORM TO THE AMERICAN ASSOCIATION OF HURSTENBERG STANDARDS FOR NURSERY STOCK, AMERICAN ASSOCIATION OF HURSTENBERG, 1150 1ST STREET, NW, SUITE 500, WASHINGTON, D.C. 20002.
- ALL MATERIAL IN THE PLANT LIST ABOVE WHICH IS AVAILABLE AT THE TIME OF THE PREPARATION OF THE LANDSCAPE PLAN SHOULD BE PLANTED. IF UNAVAILABLE AT THE TIME OF INSTALLATION, ALL SUBSTITUTES ARE SUBJECT TO THE APPROVAL OF THE TOWNSHIP ENGINEER.
- IN THE EVENT THAT PLANT QUANTITY DEFICIENCIES OR MATERIAL DEFICIENCIES OCCUR IN THE PLANTING SCHEDULE, THE PLAN SHALL SUPERSEDE.
- ANY EXISTING VEGETATION TO BE REMOVED FROM THE SITE SHALL BE DISPOSED OF IN A MANNER THAT IS APPROPRIATE FOR LOCAL COUNTY AND STATE REGULATIONS. ALL WEEDS AND OTHER VEGETATION TO BE REMOVED SHALL BE CLEARED FREE OF ALL WEEDS AND OTHER VEGETATION AND MULCHED WITH 4" OF SHREDDED BARK. MULCH 3" DEEP FROM TREE TRUNKS.
- BEENUS SHALL HAVE A CLEAN, SHARP EDGE CUT WITH A SHARP.
- NO TREE SHALL BE LOCATED CLOSER THAN 15'-0" FROM ANY LIGHT FIXTURE, NO TREE SHALL BE LOCATED CLOSER THAN 3'-0" FROM ANY STREET CURBLINE, SIDEWALK OR DRIVEWAY.
- ROOT BARRIERS ARE TO BE INSTALLED AT ALL AREAS WITH IN TREE FROM PROPOSED STREET CURBLINE, SIDEWALK OR DRIVEWAY.
- ALL PLANTING STOCK TO BE OBTAINED FROM SOURCES IN NEW JERSEY FROM PROPOSED SMALL NURSERY SOLE CONVENTIONS.
- TREES SHALL ONLY BE SHAVED WHERE WARRANTED BY SITE CONDITIONS, WITH TWO STAVES TO BE GIVEN TO A MAXIMUM OF TWO FEET INTO THE GROUND BEHIND PROPOSED DRIVE. STAVES WHEN GIVEN MUST BE ONE HALF TO TWO-THIRDS THE HEIGHT OF THE TREE TRUNKS FROM GROUND LEVEL. STAVES SHALL BE AT LEAST 2" DIA. IN DIAMETER. STAVES SHALL BE PLACED IN LINE WITH FORWARD WOOD. STAVES SHALL BE ATTACHED TO THE TRUNKS WITH 1/2" GAUGE GALVANIZED WIRE COATED WITH PLASTIC HOSE INSULATION. WIRE IS LIKELY TO COME IN CONTACT WITH TREE TRUNKS. AN ALTERNATE MAY BE ANY COMMERCIALLY AVAILABLE MATERIALS DESIGNED FOR STAVES WITH THE APPROVAL OF THE DESIGN ENGINEER. THE LOOP ON CONTACT WITH THE TREE SHALL BE TIGHT ENOUGH TO PLANT GROWING AND PREVENT GROWING FOR 2 YEARS, BUT SHALL BE TIGHT ENOUGH TO STAY TO PREVENT SLIPPING. AFTER (2) ONE YEAR, ALL TREES THAT DO NOT REQUIRE CONTACT PROTECTION SHALL HAVE TREE TRUNKS AND TREE TRUNKS REMOVED.
- WITHIN THE STATE TRUNKS, NO GRASS, PLANTING, OR STRUCTURE SHALL BE EXISTED OR MAINTAINED WITHIN 18" INCHES OR LESS FROM TREE TRUNKS. THE GRASS SHALL BE EXISTED 18" INCHES FROM STREET SIDES AND TRUNKS. REGULAR SOAK.
- FOR ALL INSTALLED DECIDUOUS TREES, THE USE OF ROOT, PLASTIC, GROUND WOOD TRUNK PROTECTION IS TO BE PROVIDED LOGICALLY AROUND THE TRUNKS TO ALLOW THE GROUNDS TO REPAIR FOR APPROXIMATELY FIVE (5) YEARS WHILE THE BARK HEALS OFF.
- ALL TREES TO BE REMOVED UNLESS NOTED TO REMAIN.
- FOR ALL SITE DISTURBANCE, A TREE REMOVAL PERMIT MUST BE OBTAINED IN ACCORDANCE WITH ORDINANCE SECTION 337-11.

KEY	COMMON NAME
BP	Black Oak
BP	Black Pine
HC	Holly
LD	Lance
NS	Norway Spruce
PP	Pin Oak
SA	Red Maple
SV	Sycamore
SV	Sycamore
UP	White Pine
YV	Yellow Birch

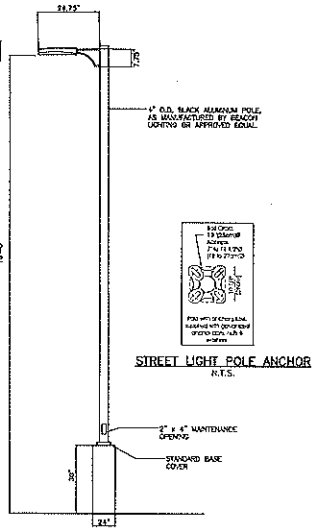
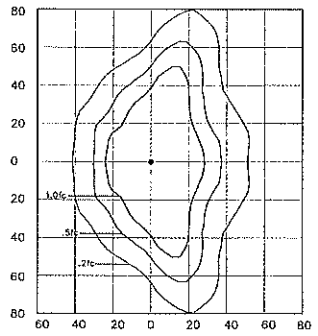
TREE REMOVAL PLAN

PROJECT NO. 2018-015-125 DRAWING NO. H4/OK DATE: 11-20-2018 SHEET NO. 17 OF 17	 Cranmer Engineering, P.A. 400 BRUNNEN RD. SUITE 200 MONMOUTH COUNTY, NJ 08852 TEL: 732-311-3300 FAX: 732-311-3301 WWW.CRANMER.COM	TREE REMOVAL AND LANDSCAPING PLAN TENNENT ROAD WASH & LUBE, LLC LOT 33, BLOCK 122 TAX MAP SHEET NO. 9 MONMOUTH COUNTY NEW JERSEY DATE: FEBRUARY 16, 2021 SHEET NO. 7 OF 13
DESIGNED BY: DAVID A. CRANMER, PE CHECKED BY: DAVID A. CRANMER, PE DATE: 02/16/2021	 DAVID A. CRANMER, PE LICENSED PROFESSIONAL ENGINEER STATE OF NEW JERSEY LICENSE NO. 41925	



HOURS OF OPERATION: DUSK - 1 HOUR AFTER CLOSING

ILLUMINANCE (FC)
 AVERAGE = 1.9
 MAXIMUM = 23.3
 MINIMUM = 0.2
 AVG/MIN RATIO = 9.5
 MAX/MIN RATIO = 117.0



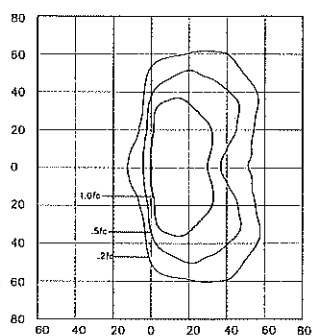
STREET LIGHT POLE ANCHOR
N.T.S.

- NOTES:
 1. VPER SMALL LAMP TO BE 150 WATT LED
 2. VPER LARGE LAMP TO BE 365 WATT LED
 3. LUMINAIRE INTERIORLY FINISHED PIANO ANTI-REFLECT COATING
 4. OPTICAL SYSTEM IS LENS TYPE OR REFRACTED REFLECTORS
 5. FINISHING AND PAINTING TO HAVE BLACK FINISHED FINISH
 6. LIGHT FIXTURE OPERATING @ 90 DEGREE ANGLE

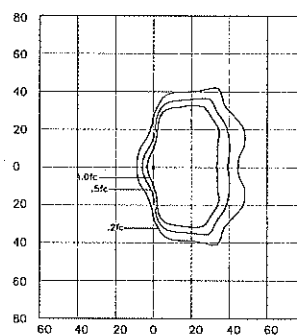
LIGHT FIXTURE & POLE
N.T.S.

LIGHT POLE FIXTURE

LD POLE NO. (OR LD)	QTY	MOUNTING HEIGHT	SWIFT	BASE SIZE
SDPP	6	16 FT.	6"	18" DIA. CYCLE



LAMP: 150 WATT LED
 OPTICAL SYSTEM: 4 DISTRIBUTION
 AS MANUFACTURED BY BEACON LIGHTING
 OR APPROVED EQUAL
 16' MOUNTING HEIGHT



LAMP: 136 WATT LED
 OPTICAL SYSTEM: 4 DISTRIBUTION
 AS MANUFACTURED BY BEACON LIGHTING
 OR APPROVED EQUAL
 12' MOUNTING HEIGHT

PHOTOMETRIC PATTERNS
N.T.S.

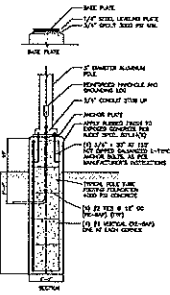
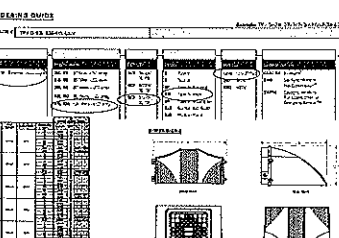
NOTE: THIS PLAN TO BE USED FOR LIGHTING PURPOSES ONLY.

SYSTEMS & BIDD

NO.	DESCRIPTION	QTY	UNIT	PRICE	TOTAL
1
2

SYSTEMS & BIDD

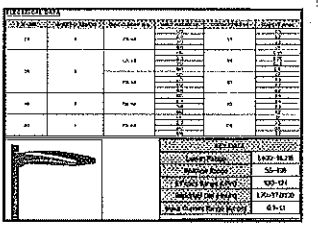
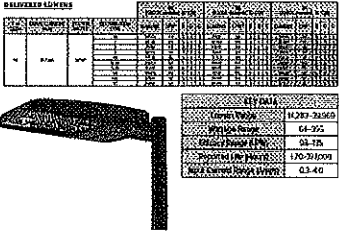
NO.	DESCRIPTION	QTY	UNIT	PRICE	TOTAL
3
4



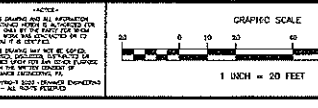
LIGHT FOOTING DETAIL FOR VPER-SMALL AND LARGE LIGHT FIXTURES
N.T.S.

LUMINAIRE SCHEDULE

SYMBOL	QTY	LABEL	DESCRIPTION	ARRANGEMENT	TOTAL LAMP LUMENS	LF	LUMENS
10	VS	VPER SMALL TYPE IV 110 WATTS	SINGLE/DOUBLE	N.A.	8100	VPER-VPS-110-107-6-1W-5C	
1	VS	VPER LARGE TYPE IV 365 WATTS	SINGLE	N.A.		VPER-VPL-365-205-6-1W-1WV	
4	WP	WALLPACK TYPE III	SINGLE	N.A.	1200	BEACON LIGHTING TPL-40-125-125-4W-1WV	



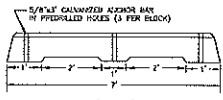
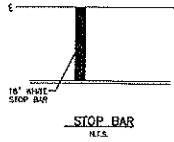
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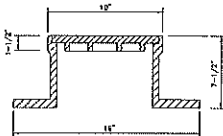
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 LICENSED PROFESSIONAL ENGINEER
 STATE OF NEW JERSEY LICENSE NO. 41928

Cranmer Engineering, P.A.
 679 Broad Street, Suite 100A
 Springfield, NJ 07081
 Tel: (973) 251-8200
 Fax: (973) 251-8205

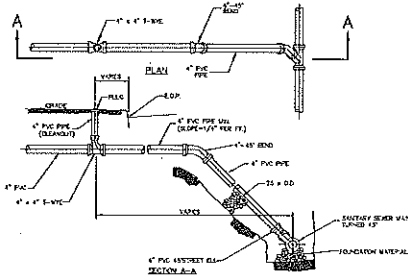
LIGHTING PLAN
 TENNENT ROAD WASH & LUBE, LLC
 LOT 33, BLOCK 122
 TAX MAP SHEET NO. 9
 TOWNSHIP OF MARLBORO MORRISTOWN COUNTY NEW JERSEY



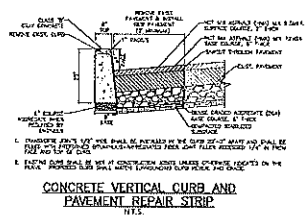
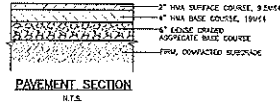
PRECAST CONCRETE WHEEL STOP
N.T.S.



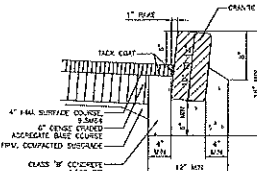
CLEANOUT BOX & COVER FOR 4" DIA. AND 6" DIA.
CLEANOUTS LOCATED IN SIDEWALK AREAS.
N.T.S.



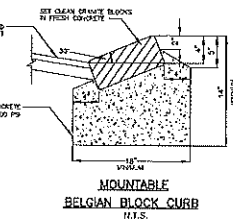
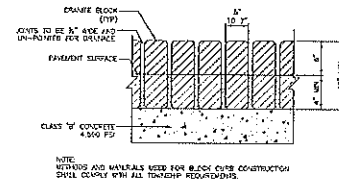
NOTE: 1. ALL CLEANOUT VALVES, BOX ENDS & CAPS TO BE STAMPED FOR TYPE OF PIPE USED.
2. DETOUR & INSPECTION REE TUBES FROM L.S.P.
3. HANG SOME SERVICE TUBES FROM ELEMENT 1 FROM OUTSIDE OF FRONT ROW.
4. CLEANOUT AS SHOWN ARE REQUIRED.
5. HANG CONNECTIONS ARE TO BE 4\"/>



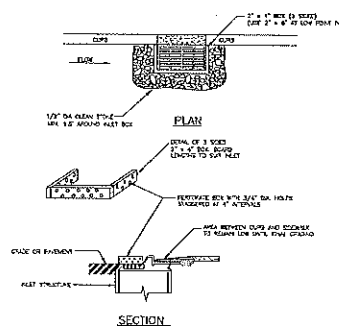
CONCRETE VERTICAL CURB AND PAVEMENT REPAIR STRIP
N.T.S.



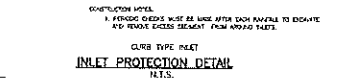
GAP GRANITE BLOCK CURB
N.T.S.



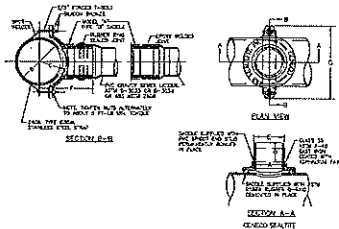
MOUNTABLE BELGIAN BLOCK CURB
N.T.S.



METHOD OF DEPRESSING CURB
N.T.S.



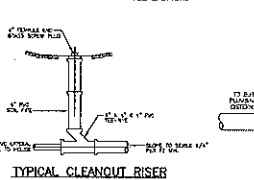
INLET PROTECTION DETAIL
N.T.S.



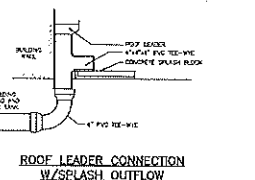
SANITARY HOUSE LATERAL CLEAN-OUT
N.T.S.

SIZE OF PIPE TO BE CLEANED	TYPE OF CLEANER	TYPE OF CLEANER
1/2\"/>		

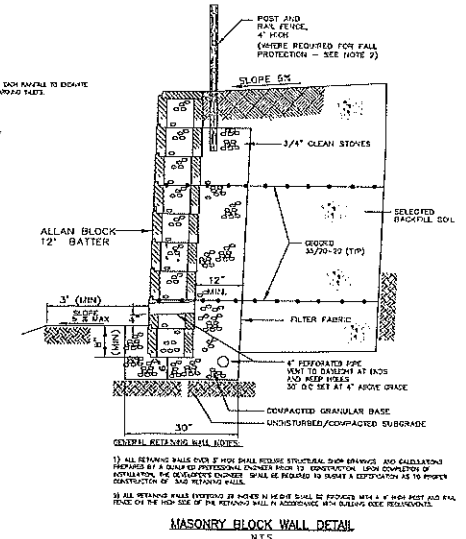
SANITARY SEWER CONNECTION DETAIL
(IF REQUIRED)



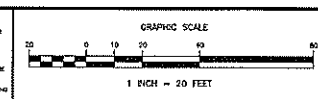
TYPICAL CLEANOUT RISER
N.T.S.



ROOF LEADER CONNECTION
W/SLASH OUTFLOW
N.T.S.



MASONRY BLOCK WALL DETAIL
N.T.S.

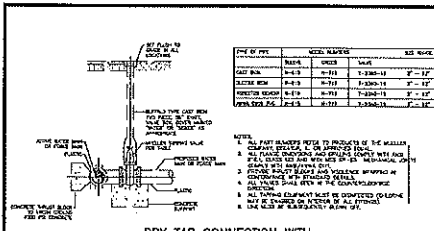


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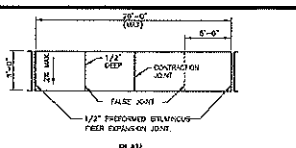
CONSTRUCTION DETAILS
TENNETT ROAD WASH & LUBE, LLC
LOT 33, BLOCK 122
TAX MAP SHEET NO. 9
TOWNSHIP OF MARLBORO MONMOUTH COUNTY NEW JERSEY

PROJECT NO. 2018-015-125
DATE: FEBRUARY 16, 2021
SHEET NO. 9 OF 13

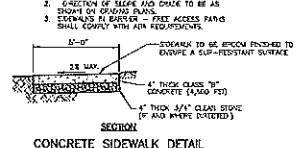


DRY TAP CONNECTION WITH TAPPING SLEEVES, CROSSES & VALVES
N.T.S.

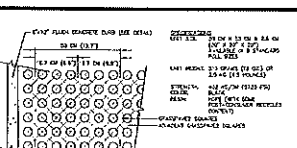
- NOTE:**
1. ALL PARTS SHOWN ARE TO BE PROVIDED BY THE MANUFACTURER OF THE TAPPING SLEEVES AND VALVES.
 2. ALL TAPPING SLEEVES AND VALVES SHALL BE INSTALLED IN ACCORDANCE WITH THE MANUFACTURER'S INSTRUCTIONS.
 3. TAPPING SLEEVES SHALL BE INSTALLED IN ACCORDANCE WITH THE MANUFACTURER'S INSTRUCTIONS.
 4. TAPPING SLEEVES SHALL BE INSTALLED IN ACCORDANCE WITH THE MANUFACTURER'S INSTRUCTIONS.
 5. TAPPING SLEEVES SHALL BE INSTALLED IN ACCORDANCE WITH THE MANUFACTURER'S INSTRUCTIONS.
 6. TAPPING SLEEVES SHALL BE INSTALLED IN ACCORDANCE WITH THE MANUFACTURER'S INSTRUCTIONS.



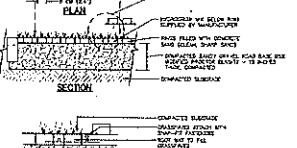
CONCRETE SIDEWALK DETAIL
N.T.S.



CONCRETE SIDEWALK DETAIL
N.T.S.



GRASS PAVER
N.T.S.



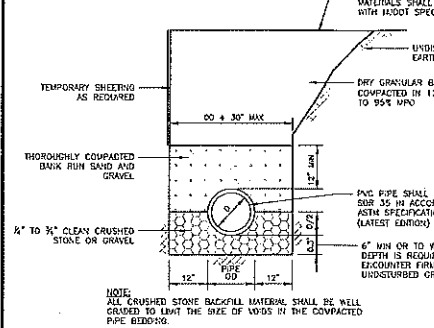
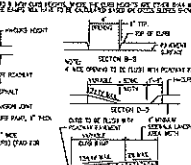
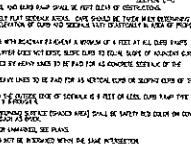
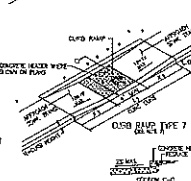
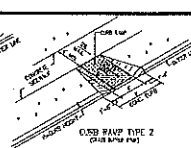
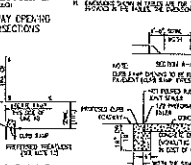
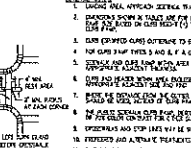
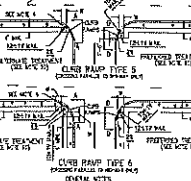
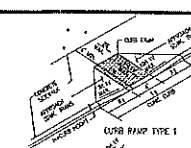
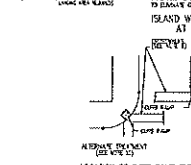
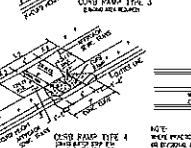
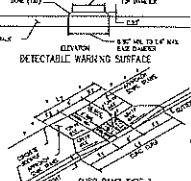
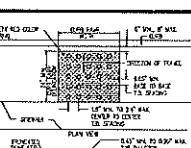
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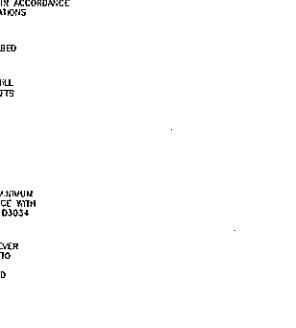
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4	12	12	1:12
5	12	12	1:12
6	12	12	1:12
7	12	12	1:12

OVER RAMP TYPE	MIN. W. (IN)	MIN. H. (IN)	MIN. SLOPE
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2	12	12	1:12
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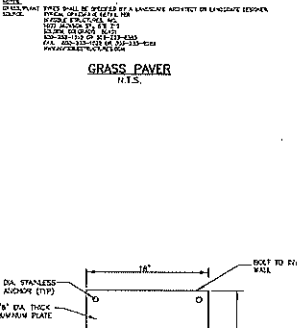
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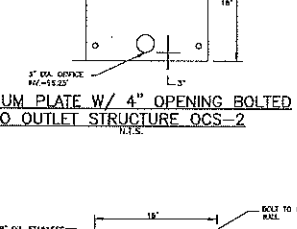
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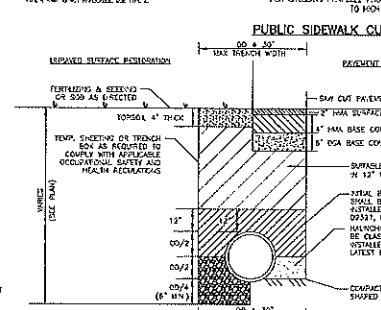
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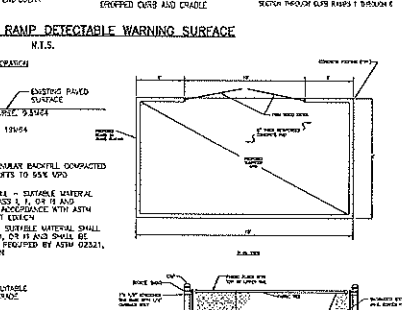
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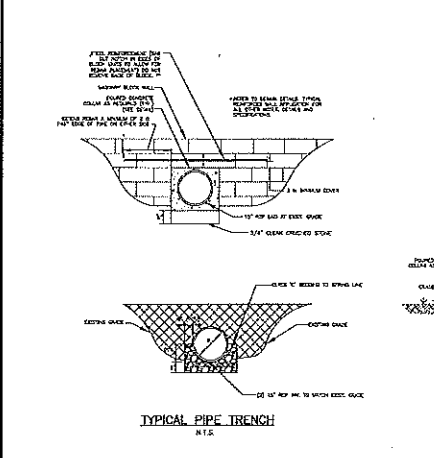
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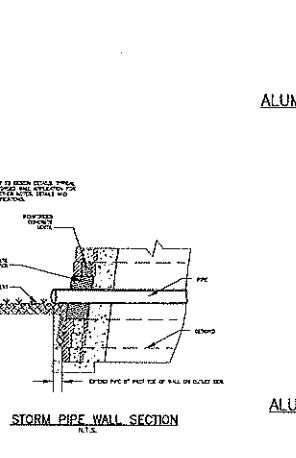
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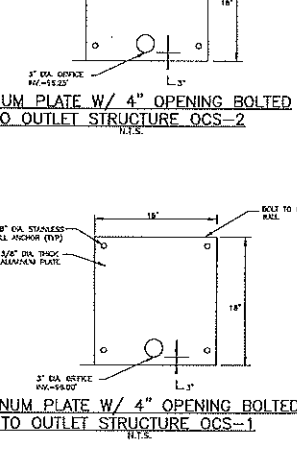
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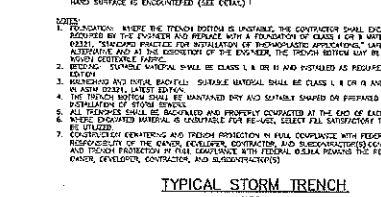
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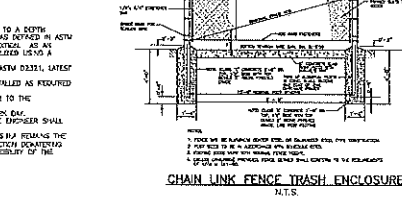
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N.T.S.



ALUMINUM PLATE W/ 4\"/>

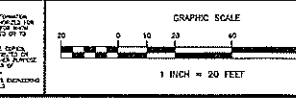


TYPICAL STORM TRENCH
N.T.S.



CHAIN LINK FENCE TRASH ENCLOSURE
N.T.S.

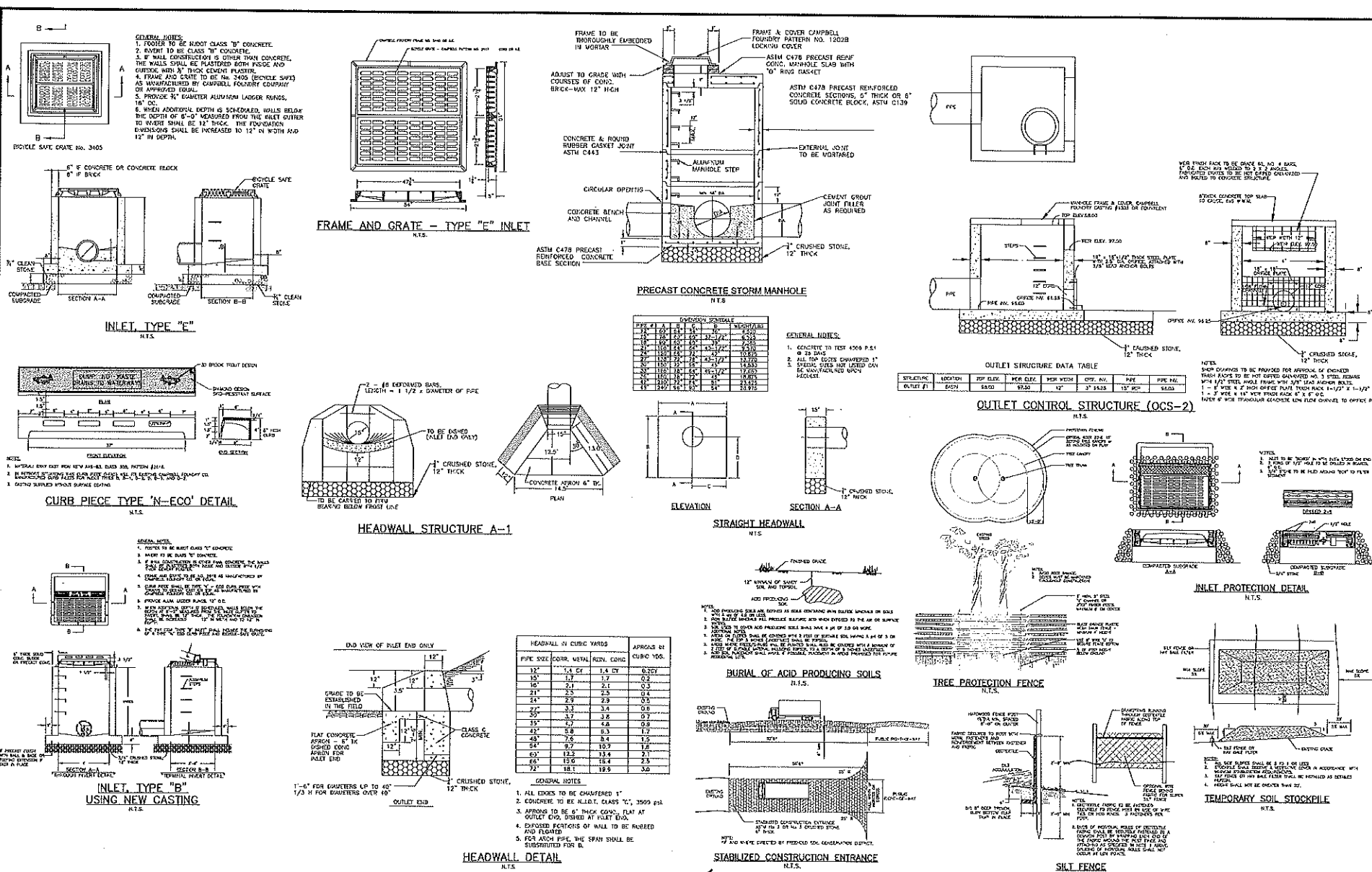
NO.	DATE	REVISION



DAVID A. CRANMER, PE
LICENSED PROFESSIONAL ENGINEER
STATE OF NEW JERSEY LICENSE No. 41926

Cranmer Engineering, P.A.
CONSTRUCTION DETAIL
TENNENT ROAD WASH & LUBE, LLC
LOT 33, BLOCK 122
TAX MAP SHEET NO. 9

CONSTRUCTION DETAILS
TENNENT ROAD WASH & LUBE, LLC
LOT 33, BLOCK 122
TAX MAP SHEET NO. 9
FEBRUARY 16, 2021



	DAVID A. CRANMER, PE LICENSED PROFESSIONAL ENGINEER STATE OF NEW JERSEY LICENSE NO. 41928	Cranmer Engineering, P.A. 629 Broad Street, Suite 1075 Monmouth Junction, NJ 08852 Tel: (732) 311-5500 Fax: (732) 311-5510	CONSTRUCTION DETAILS / SOIL EROSION & SEDIMENT CONTROL DETAILS TENNENT ROAD WASH & LUBE, LLC LOT 39, BLOCK 122 TOWNSHIP OF WARLBORO MONMOUTH COUNTY NEW JERSEY	SHEET NO. 2018-015-125 DATE: N.T.S. BY: N.T.S. CHECKED BY: DAC DATE: FEBRUARY 14, 2021
				PROJECT NO. _____ DATE _____ REGION _____

STANDARD FOR TEMPORARY VEGETATIVE COVER FOR SOIL STABILIZATION

PURPOSE: ESTABLISHMENT OF TEMPORARY VEGETATIVE COVER ON SOILS EXPOSED FOR PERIODS OF TWO TO 18 MONTHS WHICH ARE NOT BEING CROPPED, AND UNDER ACTIVE CONSTRUCTION NOT SCHEDULED FOR PERMANENT VEGETATIVE COVER.

DESIGN: TO TEMPORARILY STABILIZE THE SOIL AND PREVENT EROSION FROM WIND AND WATER EXPOSURE UNTIL PERMANENT STABILIZATION IS ACCOMPLISHED.

PERMANENT STABILIZATION: PROVIDES TEMPORARY PROTECTION AGAINST THE IMPACTS OF WIND AND SOIL LOSS, ALLOWS THE OVER-LAND MOVEMENT OF STABILIZED SEDIMENT, PROMOTES PLOTTER AND WINDROW SOIL AND NUTRIENT SAVINGS, SOIL PROTECTING STRIPES AND OVER STABILIZATION TECHNIQUES.

DESIGN REQUIREMENTS: ON EXPOSED SOILS THAT HAVE THE POTENTIAL FOR CAUSING OFF-SITE ENVIRONMENTAL DAMAGE.

- 1. SITE PREPARATION**
 - a. GRADE AS NEARLY AS POSSIBLE TO PREVENT THE USE OF CONVENTIONAL EQUIPMENT FOR SEEDING PERMANENT PLANTS, WHICH APPLICABLE REGULATIONS REQUIRE. ALL DAMAGED SOILS SHOULD BE REPAIR IN ACCORDANCE WITH REGULATIONS REGARDING SOILS.
 - b. REMOVE EXCESS ROCKS, STUMPS AND ROOTS FROM THE SOIL SURFACE TO PREVENT PLANT DAMAGE.
 - c. DESTABILIZATION MATERIALS, SEDIMENT BOUNDS, AND WINDROWS.
 - d. CONSIDER WHETHER TO REMOVE THE SOURCE SHOULD BE SEPARATE FROM THE WIND ROWS. CONSIDER WHETHER TO REMOVE THE SOURCE IS POSSIBLE ONLY WHEN THERE IS NO POTENTIAL FOR INTERFERING LATER BY OTHER MEANS (EARTHQUAKE, FIRE, ETC.)
- 2. COVER PREPARATION**
 - a. AFTER EXCESS MATERIALS ARE REMOVED ACCORDING TO ALL APPLICABLE REGULATIONS, COVER SHOULD BE APPLIED BY METHODS DESCRIBED IN THIS STANDARD. COVER SHOULD BE APPLIED TO ALL EXPOSED SOILS TO PREVENT SOIL LOSS AND NUTRIENT SAVINGS. COVER SHOULD BE APPLIED TO ALL EXPOSED SOILS TO PREVENT SOIL LOSS AND NUTRIENT SAVINGS. COVER SHOULD BE APPLIED TO ALL EXPOSED SOILS TO PREVENT SOIL LOSS AND NUTRIENT SAVINGS.
 - b. WIND ROWS AND STRIPES WITHIN THE SOIL AS NEARLY AS PRACTICAL TO A DEPTH OF 12 INCHES WITH A 50% SOIL:STRONGHOLD RATIO. AT OTHER EXPOSED SOILS, THE EQUIV. WEIGHTED SOIL COEFFICIENT SHOULD BE USED ON THE GENERAL COVERING. THESE LINES WILL BE NEARLY AS PRACTICAL TO A DEPTH OF 12 INCHES WITH A 50% SOIL:STRONGHOLD RATIO.
 - c. COVER SHOULD NOT BE APPLIED TO SOILS THAT ARE NOT BEING USED OR TO SOILS THAT ARE NOT BEING USED.
 - d. COVER SHOULD BE APPLIED TO SOILS THAT ARE NOT BEING USED OR TO SOILS THAT ARE NOT BEING USED.
- 3. SEEDING**
 - a. SELECT SEED FROM HYDROLOGICALLY AS SCHEDULED TO PROTECT SOILS EXPOSED AND SEEDING CONTROL WITHIN JERSEY.
 - b. CONSIDER WHETHER SEEDS APPLIED IN HAND OR BY MACHINE (CENTRIFUGAL FEEDER, SEEDER, SPREADER) SHALL BE APPLIED TO SOILS TO PREVENT SOIL LOSS AND NUTRIENT SAVINGS. SEEDS SHOULD BE APPLIED TO SOILS TO PREVENT SOIL LOSS AND NUTRIENT SAVINGS.
 - c. CONSIDER WHETHER TO REMOVE THE SOURCE SHOULD BE SEPARATE FROM THE WIND ROWS. CONSIDER WHETHER TO REMOVE THE SOURCE IS POSSIBLE ONLY WHEN THERE IS NO POTENTIAL FOR INTERFERING LATER BY OTHER MEANS (EARTHQUAKE, FIRE, ETC.)

STANDARD FOR STABILIZATION FOR MULCH ONLY

PURPOSE: ESTABLISHMENT OF TEMPORARY VEGETATIVE COVER ON SOILS EXPOSED FOR PERIODS OF TWO TO 18 MONTHS WHICH ARE NOT BEING CROPPED, AND UNDER ACTIVE CONSTRUCTION NOT SCHEDULED FOR PERMANENT VEGETATIVE COVER.

DESIGN: TO TEMPORARILY STABILIZE THE SOIL AND PREVENT EROSION FROM WIND AND WATER EXPOSURE UNTIL PERMANENT STABILIZATION IS ACCOMPLISHED.

PERMANENT STABILIZATION: PROVIDES TEMPORARY PROTECTION AGAINST THE IMPACTS OF WIND AND SOIL LOSS, ALLOWS THE OVER-LAND MOVEMENT OF STABILIZED SEDIMENT, PROMOTES PLOTTER AND WINDROW SOIL AND NUTRIENT SAVINGS, SOIL PROTECTING STRIPES AND OVER STABILIZATION TECHNIQUES.

DESIGN REQUIREMENTS: ON EXPOSED SOILS THAT HAVE THE POTENTIAL FOR CAUSING OFF-SITE ENVIRONMENTAL DAMAGE.

- 1. SITE PREPARATION**
 - a. GRADE AS NEARLY AS POSSIBLE TO PREVENT THE USE OF CONVENTIONAL EQUIPMENT FOR SEEDING PERMANENT PLANTS, WHICH APPLICABLE REGULATIONS REQUIRE. ALL DAMAGED SOILS SHOULD BE REPAIR IN ACCORDANCE WITH REGULATIONS REGARDING SOILS.
 - b. REMOVE EXCESS ROCKS, STUMPS AND ROOTS FROM THE SOIL SURFACE TO PREVENT PLANT DAMAGE.
 - c. DESTABILIZATION MATERIALS, SEDIMENT BOUNDS, AND WINDROWS.
 - d. CONSIDER WHETHER TO REMOVE THE SOURCE SHOULD BE SEPARATE FROM THE WIND ROWS. CONSIDER WHETHER TO REMOVE THE SOURCE IS POSSIBLE ONLY WHEN THERE IS NO POTENTIAL FOR INTERFERING LATER BY OTHER MEANS (EARTHQUAKE, FIRE, ETC.)
- 2. COVER PREPARATION**
 - a. AFTER EXCESS MATERIALS ARE REMOVED ACCORDING TO ALL APPLICABLE REGULATIONS, COVER SHOULD BE APPLIED BY METHODS DESCRIBED IN THIS STANDARD. COVER SHOULD BE APPLIED TO ALL EXPOSED SOILS TO PREVENT SOIL LOSS AND NUTRIENT SAVINGS. COVER SHOULD BE APPLIED TO ALL EXPOSED SOILS TO PREVENT SOIL LOSS AND NUTRIENT SAVINGS.
 - b. WIND ROWS AND STRIPES WITHIN THE SOIL AS NEARLY AS PRACTICAL TO A DEPTH OF 12 INCHES WITH A 50% SOIL:STRONGHOLD RATIO. AT OTHER EXPOSED SOILS, THE EQUIV. WEIGHTED SOIL COEFFICIENT SHOULD BE USED ON THE GENERAL COVERING. THESE LINES WILL BE NEARLY AS PRACTICAL TO A DEPTH OF 12 INCHES WITH A 50% SOIL:STRONGHOLD RATIO.
 - c. COVER SHOULD NOT BE APPLIED TO SOILS THAT ARE NOT BEING USED OR TO SOILS THAT ARE NOT BEING USED.
 - d. COVER SHOULD BE APPLIED TO SOILS THAT ARE NOT BEING USED OR TO SOILS THAT ARE NOT BEING USED.
- 3. SEEDING**
 - a. SELECT SEED FROM HYDROLOGICALLY AS SCHEDULED TO PROTECT SOILS EXPOSED AND SEEDING CONTROL WITHIN JERSEY.
 - b. CONSIDER WHETHER SEEDS APPLIED IN HAND OR BY MACHINE (CENTRIFUGAL FEEDER, SEEDER, SPREADER) SHALL BE APPLIED TO SOILS TO PREVENT SOIL LOSS AND NUTRIENT SAVINGS. SEEDS SHOULD BE APPLIED TO SOILS TO PREVENT SOIL LOSS AND NUTRIENT SAVINGS.
 - c. CONSIDER WHETHER TO REMOVE THE SOURCE SHOULD BE SEPARATE FROM THE WIND ROWS. CONSIDER WHETHER TO REMOVE THE SOURCE IS POSSIBLE ONLY WHEN THERE IS NO POTENTIAL FOR INTERFERING LATER BY OTHER MEANS (EARTHQUAKE, FIRE, ETC.)

STANDARD FOR PERMANENT VEGETATIVE COVER FOR SOIL STABILIZATION

PURPOSE: ESTABLISHMENT OF PERMANENT VEGETATIVE COVER ON EXPOSED SOILS WHERE PERMANENT VEGETATION IS NECESSARY FOR LONG-TERM PROTECTION.

DESIGN: TO PERMANENTLY STABILIZE THE SOIL, PREVENT EROSION FROM WIND AND WATER, AND TO PREVENT THE EXHAUSTION OF SOIL NUTRIENTS.

PERMANENT STABILIZATION: PROVIDES PERMANENT PROTECTION AGAINST THE IMPACTS OF WIND AND SOIL LOSS, ALLOWS THE OVER-LAND MOVEMENT OF STABILIZED SEDIMENT, PROMOTES PLOTTER AND WINDROW SOIL AND NUTRIENT SAVINGS, SOIL PROTECTING STRIPES AND OVER STABILIZATION TECHNIQUES.

DESIGN REQUIREMENTS: ON EXPOSED SOILS THAT HAVE THE POTENTIAL FOR CAUSING OFF-SITE ENVIRONMENTAL DAMAGE.

- 1. SITE PREPARATION**
 - a. GRADE AS NEARLY AS POSSIBLE TO PREVENT THE USE OF CONVENTIONAL EQUIPMENT FOR SEEDING PERMANENT PLANTS, WHICH APPLICABLE REGULATIONS REQUIRE. ALL DAMAGED SOILS SHOULD BE REPAIR IN ACCORDANCE WITH REGULATIONS REGARDING SOILS.
 - b. REMOVE EXCESS ROCKS, STUMPS AND ROOTS FROM THE SOIL SURFACE TO PREVENT PLANT DAMAGE.
 - c. DESTABILIZATION MATERIALS, SEDIMENT BOUNDS, AND WINDROWS.
 - d. CONSIDER WHETHER TO REMOVE THE SOURCE SHOULD BE SEPARATE FROM THE WIND ROWS. CONSIDER WHETHER TO REMOVE THE SOURCE IS POSSIBLE ONLY WHEN THERE IS NO POTENTIAL FOR INTERFERING LATER BY OTHER MEANS (EARTHQUAKE, FIRE, ETC.)
- 2. COVER PREPARATION**
 - a. AFTER EXCESS MATERIALS ARE REMOVED ACCORDING TO ALL APPLICABLE REGULATIONS, COVER SHOULD BE APPLIED BY METHODS DESCRIBED IN THIS STANDARD. COVER SHOULD BE APPLIED TO ALL EXPOSED SOILS TO PREVENT SOIL LOSS AND NUTRIENT SAVINGS. COVER SHOULD BE APPLIED TO ALL EXPOSED SOILS TO PREVENT SOIL LOSS AND NUTRIENT SAVINGS.
 - b. WIND ROWS AND STRIPES WITHIN THE SOIL AS NEARLY AS PRACTICAL TO A DEPTH OF 12 INCHES WITH A 50% SOIL:STRONGHOLD RATIO. AT OTHER EXPOSED SOILS, THE EQUIV. WEIGHTED SOIL COEFFICIENT SHOULD BE USED ON THE GENERAL COVERING. THESE LINES WILL BE NEARLY AS PRACTICAL TO A DEPTH OF 12 INCHES WITH A 50% SOIL:STRONGHOLD RATIO.
 - c. COVER SHOULD NOT BE APPLIED TO SOILS THAT ARE NOT BEING USED OR TO SOILS THAT ARE NOT BEING USED.
 - d. COVER SHOULD BE APPLIED TO SOILS THAT ARE NOT BEING USED OR TO SOILS THAT ARE NOT BEING USED.
- 3. SEEDING**
 - a. SELECT SEED FROM HYDROLOGICALLY AS SCHEDULED TO PROTECT SOILS EXPOSED AND SEEDING CONTROL WITHIN JERSEY.
 - b. CONSIDER WHETHER SEEDS APPLIED IN HAND OR BY MACHINE (CENTRIFUGAL FEEDER, SEEDER, SPREADER) SHALL BE APPLIED TO SOILS TO PREVENT SOIL LOSS AND NUTRIENT SAVINGS. SEEDS SHOULD BE APPLIED TO SOILS TO PREVENT SOIL LOSS AND NUTRIENT SAVINGS.
 - c. CONSIDER WHETHER TO REMOVE THE SOURCE SHOULD BE SEPARATE FROM THE WIND ROWS. CONSIDER WHETHER TO REMOVE THE SOURCE IS POSSIBLE ONLY WHEN THERE IS NO POTENTIAL FOR INTERFERING LATER BY OTHER MEANS (EARTHQUAKE, FIRE, ETC.)

STANDARD FOR MANAGEMENT OF HIGH ACID-PRODUCING SOILS

PURPOSE: ESTABLISHMENT OF PERMANENT VEGETATIVE COVER ON EXPOSED SOILS WHERE PERMANENT VEGETATION IS NECESSARY FOR LONG-TERM PROTECTION.

DESIGN: TO PERMANENTLY STABILIZE THE SOIL, PREVENT EROSION FROM WIND AND WATER, AND TO PREVENT THE EXHAUSTION OF SOIL NUTRIENTS.

PERMANENT STABILIZATION: PROVIDES PERMANENT PROTECTION AGAINST THE IMPACTS OF WIND AND SOIL LOSS, ALLOWS THE OVER-LAND MOVEMENT OF STABILIZED SEDIMENT, PROMOTES PLOTTER AND WINDROW SOIL AND NUTRIENT SAVINGS, SOIL PROTECTING STRIPES AND OVER STABILIZATION TECHNIQUES.

DESIGN REQUIREMENTS: ON EXPOSED SOILS THAT HAVE THE POTENTIAL FOR CAUSING OFF-SITE ENVIRONMENTAL DAMAGE.

- 1. SITE PREPARATION**
 - a. GRADE AS NEARLY AS POSSIBLE TO PREVENT THE USE OF CONVENTIONAL EQUIPMENT FOR SEEDING PERMANENT PLANTS, WHICH APPLICABLE REGULATIONS REQUIRE. ALL DAMAGED SOILS SHOULD BE REPAIR IN ACCORDANCE WITH REGULATIONS REGARDING SOILS.
 - b. REMOVE EXCESS ROCKS, STUMPS AND ROOTS FROM THE SOIL SURFACE TO PREVENT PLANT DAMAGE.
 - c. DESTABILIZATION MATERIALS, SEDIMENT BOUNDS, AND WINDROWS.
 - d. CONSIDER WHETHER TO REMOVE THE SOURCE SHOULD BE SEPARATE FROM THE WIND ROWS. CONSIDER WHETHER TO REMOVE THE SOURCE IS POSSIBLE ONLY WHEN THERE IS NO POTENTIAL FOR INTERFERING LATER BY OTHER MEANS (EARTHQUAKE, FIRE, ETC.)
- 2. COVER PREPARATION**
 - a. AFTER EXCESS MATERIALS ARE REMOVED ACCORDING TO ALL APPLICABLE REGULATIONS, COVER SHOULD BE APPLIED BY METHODS DESCRIBED IN THIS STANDARD. COVER SHOULD BE APPLIED TO ALL EXPOSED SOILS TO PREVENT SOIL LOSS AND NUTRIENT SAVINGS. COVER SHOULD BE APPLIED TO ALL EXPOSED SOILS TO PREVENT SOIL LOSS AND NUTRIENT SAVINGS.
 - b. WIND ROWS AND STRIPES WITHIN THE SOIL AS NEARLY AS PRACTICAL TO A DEPTH OF 12 INCHES WITH A 50% SOIL:STRONGHOLD RATIO. AT OTHER EXPOSED SOILS, THE EQUIV. WEIGHTED SOIL COEFFICIENT SHOULD BE USED ON THE GENERAL COVERING. THESE LINES WILL BE NEARLY AS PRACTICAL TO A DEPTH OF 12 INCHES WITH A 50% SOIL:STRONGHOLD RATIO.
 - c. COVER SHOULD NOT BE APPLIED TO SOILS THAT ARE NOT BEING USED OR TO SOILS THAT ARE NOT BEING USED.
 - d. COVER SHOULD BE APPLIED TO SOILS THAT ARE NOT BEING USED OR TO SOILS THAT ARE NOT BEING USED.
- 3. SEEDING**
 - a. SELECT SEED FROM HYDROLOGICALLY AS SCHEDULED TO PROTECT SOILS EXPOSED AND SEEDING CONTROL WITHIN JERSEY.
 - b. CONSIDER WHETHER SEEDS APPLIED IN HAND OR BY MACHINE (CENTRIFUGAL FEEDER, SEEDER, SPREADER) SHALL BE APPLIED TO SOILS TO PREVENT SOIL LOSS AND NUTRIENT SAVINGS. SEEDS SHOULD BE APPLIED TO SOILS TO PREVENT SOIL LOSS AND NUTRIENT SAVINGS.
 - c. CONSIDER WHETHER TO REMOVE THE SOURCE SHOULD BE SEPARATE FROM THE WIND ROWS. CONSIDER WHETHER TO REMOVE THE SOURCE IS POSSIBLE ONLY WHEN THERE IS NO POTENTIAL FOR INTERFERING LATER BY OTHER MEANS (EARTHQUAKE, FIRE, ETC.)

STANDARD FOR TOPSOILING

PURPOSE: ESTABLISHMENT OF PERMANENT VEGETATIVE COVER ON EXPOSED SOILS WHERE PERMANENT VEGETATION IS NECESSARY FOR LONG-TERM PROTECTION.

DESIGN: TO PERMANENTLY STABILIZE THE SOIL, PREVENT EROSION FROM WIND AND WATER, AND TO PREVENT THE EXHAUSTION OF SOIL NUTRIENTS.

PERMANENT STABILIZATION: PROVIDES PERMANENT PROTECTION AGAINST THE IMPACTS OF WIND AND SOIL LOSS, ALLOWS THE OVER-LAND MOVEMENT OF STABILIZED SEDIMENT, PROMOTES PLOTTER AND WINDROW SOIL AND NUTRIENT SAVINGS, SOIL PROTECTING STRIPES AND OVER STABILIZATION TECHNIQUES.

DESIGN REQUIREMENTS: ON EXPOSED SOILS THAT HAVE THE POTENTIAL FOR CAUSING OFF-SITE ENVIRONMENTAL DAMAGE.

- 1. SITE PREPARATION**
 - a. GRADE AS NEARLY AS POSSIBLE TO PREVENT THE USE OF CONVENTIONAL EQUIPMENT FOR SEEDING PERMANENT PLANTS, WHICH APPLICABLE REGULATIONS REQUIRE. ALL DAMAGED SOILS SHOULD BE REPAIR IN ACCORDANCE WITH REGULATIONS REGARDING SOILS.
 - b. REMOVE EXCESS ROCKS, STUMPS AND ROOTS FROM THE SOIL SURFACE TO PREVENT PLANT DAMAGE.
 - c. DESTABILIZATION MATERIALS, SEDIMENT BOUNDS, AND WINDROWS.
 - d. CONSIDER WHETHER TO REMOVE THE SOURCE SHOULD BE SEPARATE FROM THE WIND ROWS. CONSIDER WHETHER TO REMOVE THE SOURCE IS POSSIBLE ONLY WHEN THERE IS NO POTENTIAL FOR INTERFERING LATER BY OTHER MEANS (EARTHQUAKE, FIRE, ETC.)
- 2. COVER PREPARATION**
 - a. AFTER EXCESS MATERIALS ARE REMOVED ACCORDING TO ALL APPLICABLE REGULATIONS, COVER SHOULD BE APPLIED BY METHODS DESCRIBED IN THIS STANDARD. COVER SHOULD BE APPLIED TO ALL EXPOSED SOILS TO PREVENT SOIL LOSS AND NUTRIENT SAVINGS. COVER SHOULD BE APPLIED TO ALL EXPOSED SOILS TO PREVENT SOIL LOSS AND NUTRIENT SAVINGS.
 - b. WIND ROWS AND STRIPES WITHIN THE SOIL AS NEARLY AS PRACTICAL TO A DEPTH OF 12 INCHES WITH A 50% SOIL:STRONGHOLD RATIO. AT OTHER EXPOSED SOILS, THE EQUIV. WEIGHTED SOIL COEFFICIENT SHOULD BE USED ON THE GENERAL COVERING. THESE LINES WILL BE NEARLY AS PRACTICAL TO A DEPTH OF 12 INCHES WITH A 50% SOIL:STRONGHOLD RATIO.
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- 3. SEEDING**
 - a. SELECT SEED FROM HYDROLOGICALLY AS SCHEDULED TO PROTECT SOILS EXPOSED AND SEEDING CONTROL WITHIN JERSEY.
 - b. CONSIDER WHETHER SEEDS APPLIED IN HAND OR BY MACHINE (CENTRIFUGAL FEEDER, SEEDER, SPREADER) SHALL BE APPLIED TO SOILS TO PREVENT SOIL LOSS AND NUTRIENT SAVINGS. SEEDS SHOULD BE APPLIED TO SOILS TO PREVENT SOIL LOSS AND NUTRIENT SAVINGS.
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TEMPORARY VEGETATIVE STABILIZATION GRASSES, SEEDING RATES, DATES, AND DEPTH

SEED SELECTION	SEEDING RATE (lb/a)	OPTIMUM SEEDING RATES				ESTIMATED COST (lb/a)
		Soil Type	Soil Type	Soil Type	Soil Type	
Cool Season Grasses						
1. Perennial ryegrass	100	1.0	3/15-6/15	3/15-6/15	6/15-9/15	0.8
2. Spring barley	25	2.0	3/15-6/15	3/15-6/15	6/15-9/15	1.0
3. Annual ryegrass	50	3.0	3/15-6/15	3/15-6/15	6/15-9/15	0.5
4. Winter cereal rye	112	2.8	3/15-6/15	3/15-6/15	6/15-9/15	0.8
Warm Season Grasses						
1. Pearl millet	20	0.5	6/15-8/15	6/15-8/15	5/15-8/15	1.0
2. Wxt (Cynodon dactylon)	30	0.7	6/15-8/15	6/15-8/15	5/15-8/15	1.0

1 Seeding rate for warm season grasses, establishment 3 - 7 lbs/acre is required to offset the effects of June 15th seedings as determined by quantity of rain that is required to be applied for seed establishment.

2 May be planted throughout lifetime 1:1 ratio provides best establishment in areas with low rainfall.

3 Plant hardiness zone (see Table 1-1, 2-1, 3-1)

SEQUENCE OF CONSTRUCTION

ACTIVITY	DURATION
1. PREPARATION OF SOIL SURFACE AND SEEDING CONTROL	3 DAYS
2. ESTABLISHMENT OF TEMPORARY COVER	1 WEEK
3. CONSTRUCTION OF TOPSOILING STRIPES	1 WEEK
4. CONSTRUCTION OF DAMS	1 WEEK
5. CONSTRUCTION OF TEMPORARY PROTECTION	1 WEEK
6. PROTECTION OF WINDROWS	1 WEEK
7. CONSTRUCTION OF TEMPORARY STABILIZATION	1 WEEK
8. CONSTRUCTION OF DAMS	1 WEEK
9. CONSTRUCTION OF TEMPORARY PROTECTION	1 WEEK
10. CONSTRUCTION OF DAMS	1 WEEK

SEEDING SPECIFICATION

PURPOSE: ESTABLISHMENT OF PERMANENT VEGETATIVE COVER ON EXPOSED SOILS WHERE PERMANENT VEGETATION IS NECESSARY FOR LONG-TERM PROTECTION.

DESIGN: TO PERMANENTLY STABILIZE THE SOIL, PREVENT EROSION FROM WIND AND WATER, AND TO PREVENT THE EXHAUSTION OF SOIL NUTRIENTS.

PERMANENT STABILIZATION: PROVIDES PERMANENT PROTECTION AGAINST THE IMPACTS OF WIND AND SOIL LOSS, ALLOWS THE OVER-LAND MOVEMENT OF STABILIZED SEDIMENT, PROMOTES PLOTTER AND WINDROW SOIL AND NUTRIENT SAVINGS, SOIL PROTECTING STRIPES AND OVER STABILIZATION TECHNIQUES.

DESIGN REQUIREMENTS: ON EXPOSED SOILS THAT HAVE THE POTENTIAL FOR CAUSING OFF-SITE ENVIRONMENTAL DAMAGE.

STATE OF NEW JERSEY

DEPARTMENT OF ENVIRONMENTAL PROTECTION

OFFICE OF SOIL CONSERVATION

SOIL CONSERVATION DISTRICT OF WARREN COUNTY

WARREN COUNTY

WARREN COUNTY


WARREN COUNTY

WARREN COUNTY



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Licensed Professional Engineer
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www.cranmereng.com

LAWN AREA SEEDING SPECIFICATION

SEED SPECIFICATION

PLANTING DATE

PLANTING RATE

PLANTING DEPTH

PLANTING METHOD

PLANTING EQUIPMENT

PLANTING OPERATOR

PLANTING SUPERVISOR

PLANTING INSPECTOR

PLANTING DATE

PLANTING RATE

PLANTING DEPTH

PLANTING METHOD

PLANTING EQUIPMENT

PLANTING OPERATOR

PLANTING SUPERVISOR

PLANTING INSPECTOR

SOIL EROSION & SEDIMENT CONTROL NOTES

TENNENT ROAD WASH & LUBE, LLC

LOT 33, BLOCK 122

TAX MAP SHEET NO. 9

TOWNSHIP OF WARREBO COUNTY NEW JERSEY

REVISED 2016-01-15
DATE OF SUBMITTAL
DATE OF ISSUANCE
DATE OF REVISION
DATE OF REVISION
DATE OF REVISION

BY: **[Signature]**
CHECKED BY: **[Signature]**
DATE: **12-13-2015**

STANDARD FOR STABILIZED CONSTRUCTION ACCESS

A STABILIZED PAD OF CLEAN WASHED STONE LOCATED AT POINTS WHERE TRAFFIC WILL BE ACCESSING A CONSTRUCTION SITE.

THE PURPOSE OF A STABILIZED CONSTRUCTION ACCESS IS TO REDUCE THE IMPACTS OF FLOODING OF SEDIMENT OILED PAVED ROADS/PAVEMENT ON OTHER ADJACENT AREAS.

CONTAINS UNDER PRACTICE APPROVAL

A STABILIZED CONSTRUCTION PAD APPLIES TO POINTS OF CONSTRUCTION ACCESS AND EXPRESS WHERE SEDIMENT MAY BE TRAPPED, OR FLOW OFF, THE CONSTRUCTION SITE.

WATER QUALITY CONSIDERATIONS

IN ADDITION TO MINIMUM SEDIMENTATION WHICH CAN BE TRAPPED SPECIFICALLY DURING CONSTRUCTION, THIS STABILIZED CONSTRUCTION PAD SHOULD BE DESIGNED TO PREVENT SEDIMENT FROM BEING WASHED INTO THE ADJACENT WATER BODY. THE STABILIZED CONSTRUCTION PAD SHOULD BE DESIGNED TO PREVENT SEDIMENT FROM BEING WASHED INTO THE ADJACENT WATER BODY. THE STABILIZED CONSTRUCTION PAD SHOULD BE DESIGNED TO PREVENT SEDIMENT FROM BEING WASHED INTO THE ADJACENT WATER BODY.

DESIGN CRITERIA

STONE SIZE: USE ASTM C-33, SIZE NO. 2 (2 TO 1/4 IN) TO 1/4 IN. USE CLEAN WASHED ANGULAR STONE. STONES SHOULD BE CLEAN AND NOT CONTAMINATED. STONE SHOULD BE WASHED TO REMOVE OIL AND GREASE. STONE SHOULD BE WASHED TO REMOVE OIL AND GREASE.

WIDTH: NOT LESS THAN FIVE FEET FROM POINTS OF ACCESS OR DRIVE.

LENGTH: 50 FEET MINIMUM WHERE THE STONE IS PLACED ON GRADE (DRAINAGE OR CHANNEL) OR 100 FEET MINIMUM WHERE STONE IS PLACED ON SLOPE. STONE SHOULD BE PLACED ON GRADE (DRAINAGE OR CHANNEL) OR 100 FEET MINIMUM WHERE STONE IS PLACED ON SLOPE. STONE SHOULD BE PLACED ON GRADE (DRAINAGE OR CHANNEL) OR 100 FEET MINIMUM WHERE STONE IS PLACED ON SLOPE.

TABLE 27-1. LENGTHS OF CONSTRUCTION EXITS ON SURFACE ROADS

PERCENT GRADE OF ROADWAY	LENGTH OF STONE PAD	
	MINIMUM	MAXIMUM
0 TO 2%	50 FT	100 FT
2 TO 4%	75 FT	150 FT
4 TO 6%	100 FT	200 FT

1. AS PERMITTED BY LOCAL ORDINANCE OR OTHER GOVERNING AUTHORITY.

WHERE A STABILIZED CONSTRUCTION EXIT TRAVELS BETWEEN TWO DRAINAGES, IT SHALL BE STAKED THE OUTLINE LENGTH OF THE STABILIZED CONSTRUCTION EXIT SHALL BE PLACED AT THE POINTS OF ACCESS TO THE ADJACENT WATER BODY. THE STABILIZED CONSTRUCTION EXIT SHALL BE PLACED AT THE POINTS OF ACCESS TO THE ADJACENT WATER BODY.

STABILIZED CONSTRUCTION ACCESS: AFTER APPROVED ROADWAYS ARE PAVED, ADJACENT TO ACCESS/DRIVE POINTS MAY BE TRAPPED A STABILIZED CONSTRUCTION ENTRANCE (MINIMUM OF 10' x 3' TO 1' x 2') TO PREVENT ON ROADWAY TRAPPING OF SEDIMENTS. WIDTH OF THE STABILIZED CONSTRUCTION SHALL BE EQUAL TO THE WIDTH OF THE ROADWAY.

WATER WASHING: IF SPACE IS LIMITED, WASHING TRAYS MAY BE WASHED WITH CLEAN WATER DURING A FLOODING AREA. A WASH TRAY SHOULD BE LOCATED SUCH THAT WASH WATER WILL NOT FLOW ONTO PAVED ROADS OR INTO UNPROTECTED STREAM CHANNELS.

WATER WASHING: IF SPACE IS LIMITED, WASHING TRAYS MAY BE WASHED WITH CLEAN WATER DURING A FLOODING AREA. A WASH TRAY SHOULD BE LOCATED SUCH THAT WASH WATER WILL NOT FLOW ONTO PAVED ROADS OR INTO UNPROTECTED STREAM CHANNELS.

THE DRAINAGE SHALL BE MAINTAINED BY A DRAINAGE WHICH WILL PREVENT FLOODING OR FLOWING OF SEDIMENT ONTO ADJACENT AREAS. THIS MAY REQUIRE FLOODING TRAP WITH ADDITIONAL LENGTH AS DRAINAGE IS LOCATED ON ADJACENT AREAS OR CLEANUP OF ANY WEATHERS USED TO TRAP SEDIMENT. ALL SEDIMENT TRAP SHOULD BE MAINTAINED ON REGULAR BASIS (WEEKLY OR MONTHLY) TO PREVENT BLOCKAGE. ALL OTHER ACCESS POINTS MUST BE STABILIZED WITH STONE.

STANDARD FOR LAND GRADING

REMOVING THE GRADE SURFACE BY GRADING TO PLANNED ELEVATIONS WHICH ARE DETERMINED BY TOPOGRAPHIC SURVEY AND DESIGN.

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SOIL MANAGEMENT AND PREPARATION

CONSERVE SOIL AS MUCH AS POSSIBLE TO THE EXTENT OF FEASIBLE CONFORMANCE TO A DEGREE OF 60 FEET TO MAINTAIN THE ESTABLISHMENT OF PERMANENT VEGETATION.

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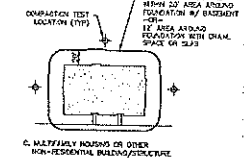
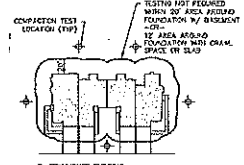
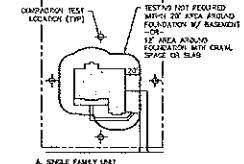
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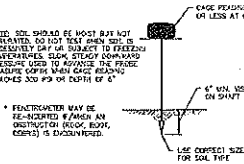
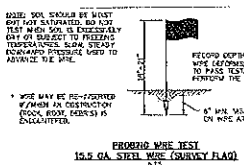
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TYPICAL SOIL COMPACTION TESTING LOCATIONS



SOIL EROSION AND SEDIMENT CONTROL NOTES

1. THE PROPOSED SOIL CONCENTRATION DISTRICT SHALL BE WITHIN FOUR-FOOT (48) INCHES IN ADVANCE OF ANY SOIL EROSION CONTROL MEASURES.
2. ALL SOIL EROSION AND SEDIMENT CONTROL MEASURES SHALL BE INSTALLED FROM SOIL DISTURBANCE ON AT FIVE FEET FROM THE EDGE OF THE DISTURBED AREA.
3. ANY CHANGES TO THE PROPOSED SOIL EROSION AND SEDIMENT CONTROL PLANS SHALL BE APPROVED BY THE ENGINEER OF RECORD.
4. ALL SOIL EROSION AND SEDIMENT CONTROL MEASURES SHALL BE INSTALLED FROM SOIL DISTURBANCE ON AT FIVE FEET FROM THE EDGE OF THE DISTURBED AREA.
5. ALL SOIL EROSION AND SEDIMENT CONTROL MEASURES SHALL BE INSTALLED FROM SOIL DISTURBANCE ON AT FIVE FEET FROM THE EDGE OF THE DISTURBED AREA.
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PROPOSED SOIL CONCENTRATION DISTRICT
 1000 BROADWAY
 FRENCHTON, NJ 07728
 TEL: 732.663.8300 FAX: 732.663.9140

<p>NOTICE: THIS PLAN IS A PRELIMINARY DESIGN AND IS SUBJECT TO CHANGE WITHOUT NOTICE. THE ENGINEER ASSUMES NO LIABILITY FOR ANY DAMAGE OR INJURY TO PERSONS OR PROPERTY CAUSED BY THE USE OF THIS PLAN.</p>	<p>DAVID A. CRANMER, PE LICENSED PROFESSIONAL ENGINEER STATE OF NEW JERSEY LICENSE NO. 41926</p>	<p>Cranmer Engineering, P.A. 41926 1111 NEW JERSEY 1111 NEW JERSEY 1111 NEW JERSEY</p>	<p>SOIL EROSION & SEDIMENT CONTROL NOTES TENNENT ROAD WASH & LUBE, LLC LOT 33, BOX 122 WILMINGTON, NJ 08096</p>	<p>PROJECT NO. 2018-015-125</p>	<p>DATE: 02/14/2018</p>
				<p>DATE: 02/14/2018</p>	<p>DATE: 02/14/2018</p>