GREENBELT LAKE

WETLAND MITIGATION PLAN

BERWYN (21ST) ELECTION DISTRICT, PRINCE GEORGE'S COUNTY, MARYLAND

LANDSCAPE SPECIFICATIONS

A. MATERIALS

1. PLANTS SHALL BE NURSERY GROWN IN ACCORDANCE WITH GOOD HORTICULTURAL PRACTICE, AND GROWN UNDER CLIMATIC CONDITIONS SIMILAR TO THOSE IN THE LOCALITY OF THE PROJECT. THEY SHALL HAVE BEEN ROOT PRUNED, PREFERABLY WITHIN THE LAST YEAR.

   THEY SHALL BE SOUND, HEALTHY AND VIGOROUS, WELL BRANCHED AND DENSELY FOLIATED WHEN IN LEAF. THEY SHALL BE FREE OF DISEASE, PEST, EGGS OR LARVAE, AND SHALL HAVE A HEALTHY DEVELOPED ROOT SYSTEM.

   PLANTS SHALL NOT BE PRUNED BEFORE DELIVERY. TREES WITH A DAMAGED OR CROOKED LEADER OR MULTIPLE LEADERS, SUNSCALDED, DISFIGURING KNOTS OR FRESH CUTS OVER 1 1/2" WILL BE REJECTED.

   NO CHANGE IN QUANTITY, SIZE, KIND OR QUALITY OF PLANT SPECIFIED WILL BE PERMITTED WITHOUT APPROVAL OF THE LANDSCAPE ARCHITECT.

2. TOPSOIL SHALL BE FERTILE, FRIABLE AND TYPICAL OF THE LOCALITY. IT SHALL BE FREE OF STONES, LUMPS, PLANTS, ROOTS, STICKS AND SHALL NOT BE DELIVERED IN A FROZEN OR MUDDY CONDITION.

3. PLANTING SOIL (BACKFILL MIX) SHALL BE FIVE PARTS TOPSOIL AND ONE PART WET LOOSE PEAT MOSS.

4. STAKING MATERIALS: GUYS WIRE SHALL BE PLIABLE #12 GAUGE GALVANIZED TWISTED TWO STRAND WIRE. HOSE SHALL BE A SUITABLE LENGTH OF TWO PLY RUBBER HOSE 3/4" INCH DIAMETER. STAKES SHALL CONFORM TO THE DETAIL ON THIS SHEET.

5. WRAPPING MATERIAL SHALL BE A STANDARD MANUFACTURED TREE WRAPPING PAPER WITH CRINKLED SURFACE AND FASTENED BY AN APPROVED METHOD.

B. APPLICABLE SPECIFICATIONS AND STANDARDS

1. "STANDARD PLANT NAMES" LATEST EDITION AMERICAN JOINT COMMITTEE ON HORTICULTURE NOMENCLATURE.

2. "AMERICAN STANDARD OF NURSERY STOCK," LATEST EDITION, AMERICAN ASSOCIATION OF NURSERYMAN.

C. CHOSING AND HANDLING OF PLANT MATERIALS

1. IMMEDIATELY BEFORE DIGGING, SPRAY ALL EVERGREEN OR DECIDUOUS PLANT MATERIAL IN FULL LEAF WITH ANTI-DESICCANT, APPLYING AN ADEQUATE FILM OVER TRUNKS, BRANCHES, TWIGS AND/OR FOLIAGE.

2. DIG BALLED AND BURLAPPED (B&B) PLANTS WITH FIRM NATURAL BALLS OF EARTH OF A DIAMETER NOT LESS THAN THAT RECOMMENDED BY AMERICAN STANDARD FOR NURSERY STOCK, AND OF SUFFICIENT DEPTH TO INCLUDE THE FIBROUS AND FEEDING ROOTS. PLANTS MOVED WITH A BALL WILL NOT BE ACCEPTED IF THE BALL IS CRACKED OR BROKEN BEFORE OR DURING PLANTING OPERATIONS.

D. EXCAVATING OF PLANTING AREA

1. STAKE OUT ON THE GROUND LOCATIONS FOR PLANTS AND OUTLINES OF AREA TO BE PLANTED, AND OBTAIN APPROVAL OF THE LANDSCAPE ARCHITECT BEFORE EXCAVATION IS BEGUN. LANDSCAPED AREAS TO BE THOROUGHLY WEEDED PRIOR TO PLANTING OPERATIONS.

E. PLANTING OPERATIONS

1. SET PLANTS AT SAME RELATIONSHIP TO FINISHED GRADE AS THEY BORE TO THE GROUND FROM WHICH THEY WERE DUG. USE PLANTING SOIL TO BACKFILL APPROXIMATELY 2/3 FULL. WATER THOROUGHLY BEFORE INSTALLING REMAINDER OF THE PLANTING SOIL TO TOP OF PITS, ELIMINATING ALL AIR POCKETS.

2. SET PLANTING PLUMS AND BRANCHES RIGIDLY IN POSITION UNTIL THE PLANTING SOIL HAS BEEN STAMPED SOLIDLY AROUND THE BALL AND ROOTS. CUT ROPES OR STRINGS FROM THE TOP OF BALL AFTER PLANT HAS BEEN SET. LEAVE BURLAP OR CLOTH WRAPPING INTACT AROUND BALLS. TURN UNDER AND BURY PORTIONS OF BURLAP AT TOP OF BALL.

3. PROTECT PLANTS AT ALL TIMES FROM SUN OR DRYING WINDS. PLANTS THAT CANNOT BE PLANTED IMMEDIATELY ON DELIVERY SHALL BE KEPT IN THE SHADE, WELL PROTECTED WITH SOIL, PEAT MOSS OR OTHER ACCEPTABLE MATERIAL AND SHALL BE KEPT WELL WATERED. PLANTS SHALL NOT REMAIN UNPLANTED FOR LONGER THAN THREE DAYS AFTER DELIVERY.

4. PLANTS SHALL NOT BE BOUND WITH WIRE OR ROPE AT ANY TIME SO AS TO DAMAGE THE BARK OR BREAK BRANCHES. PLANTS SHALL BE LIFTED AND HANDLED FROM THE BOTTOM OF THE BALL ONLY.

5. MULCH ALL PITS AND BEDS WITH A TWO INCH LAYER OF BARK MULCH IMMEDIATELY AFTER PLANTING AND WORK INTO THE TOP THREE INCHES OF THE PLANTING SOIL. FORM A 3" EARTH SAUCER AROUND EACH PLANT. WATER ALL PLANTS IMMEDIATELY AFTER PLANTING. ADD ADDITIONAL MULCH.

F. STAKING, WRAPPING AND PRUNING

1. STAKING SHALL BE COMPLETED IMMEDIATELY AFTER PLANTING. PLANTS SHALL STAND PLUMB AFTER STAKING. STAKES AND GUY WIRE SHALL BE REMOVED AT THE END OF THE GUARANTEE PERIOD AND DISPOSED OF OFF-SITE BY THE CONTRACTOR.

2. WRAP DECIDUOUS TREE TRUNKS STARTING AT THE BASE OF THE TREE UP TO THE SECOND BRANCH. REMOVE WRAPPING AT THE END OF THE GUARANTEE PERIOD.

3. PRUNE PLANTS AT THE TIME OF PLANTING AS DIRECTED BY THE LANDSCAPE ARCHITECT TO REMOVE 1/5 OR 1/3 OF THE FOLIAGE. REMOVE ALL DEAD WOOD, SUCKERS OR BROKEN BRANCHES AND PRESERVE THE NATURAL CHARACTER OF THE PLANT.

G. GUARANTEE

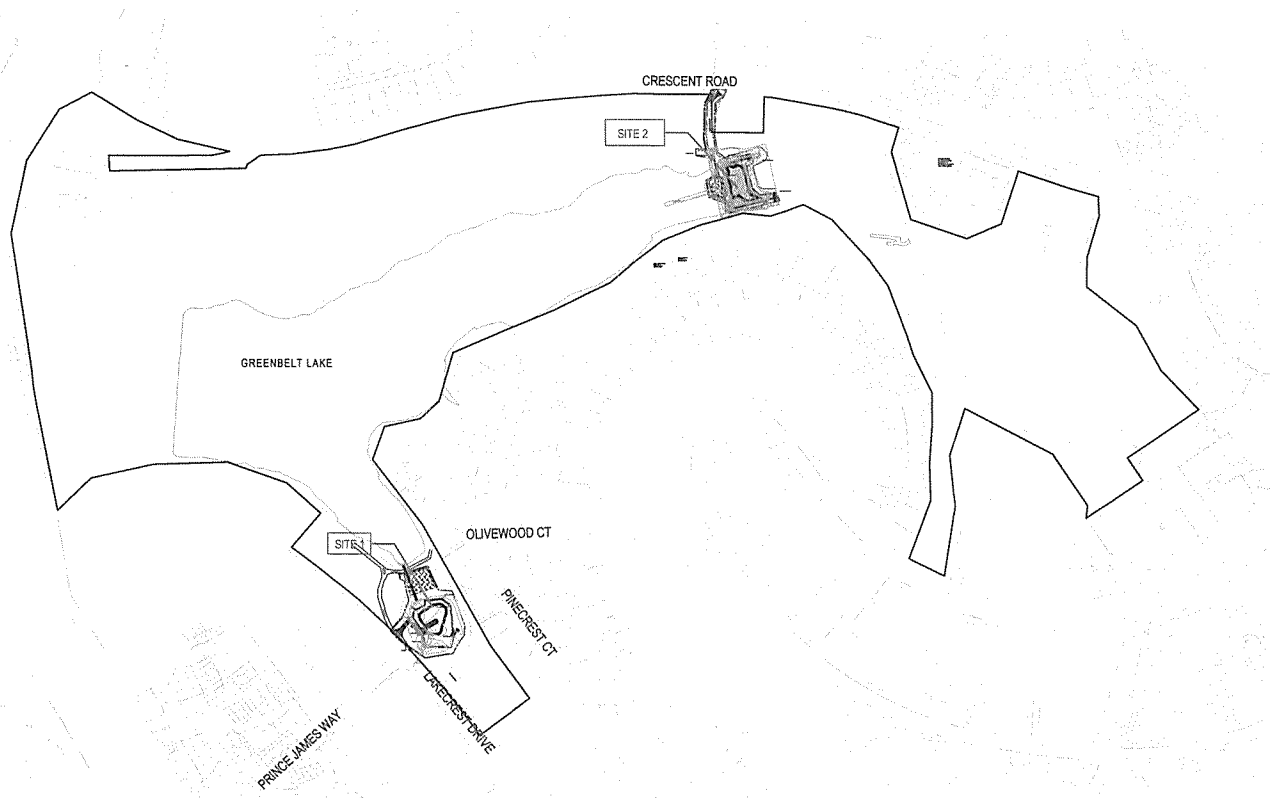
1. ALL PLANT MATERIAL SHALL BE GUARANTEED BY THE CONTRACTOR TO BE IN A HEALTHY AND VIGOROUS CONDITION AT THE BEGINNING OF THE SECOND GROWING SEASON FOLLOWING ACCEPTANCE BY THE LANDSCAPE ARCHITECT.

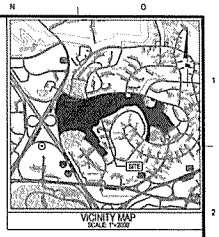
H. TREE PRESERVATION

1. SNOW FENCING SHALL BE ERECTED AROUND ALL AREAS WHERE EXISTING VEGETATION IS TO BE PRESERVED.

2. INDIVIDUAL TREES AND GROUPS OF TREES SHALL BE PROTECTED BY FENCING AROUND A PERIMETER OF THEIR BRANCHES USING STANDARD, 48" HIGH SNOW FENCE SECURELY MOUNTED TO STANDARD STEEL POSTS SET NOT MORE THAN 8' APART.

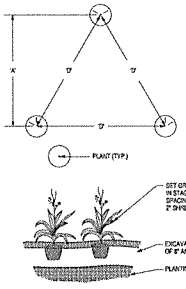
3. FENCING SHALL BE INSTALLED PRIOR TO THE START OF ANY CONSTRUCTION ACTIVITY.





VICINITY MAP
SCALE 1"=2000'

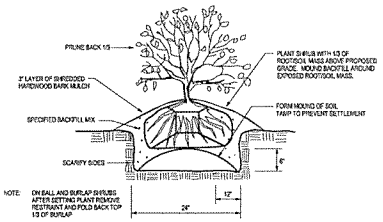
SCALE 1"=200'



NOTE:
GROUNDCOVERS AND PERENNIALS TO BE INSTALLED WITH TRIANGULAR SPACING

PLANT SPACING 'D'	ROW 'A'
6" O.C.	5.19" O.C.
12" O.C.	10.39" O.C.
15" O.C.	13.4" O.C.
18" O.C.	15.6" O.C.
24" O.C.	20.8" O.C.
30" O.C.	26.0" O.C.
36" O.C.	31.2" O.C.

1 GROUND COVER PLANTING DETAIL
NOT TO SCALE



NOTE: ON BALL AND BURLAP SHRUBS AFTER SETTING PLANT REMOVE RESTRAINT AND FOLD BACK TOP 1/3 OF BURLAP

2 BALL AND BURLAP SHRUB PLANTING DETAIL
NOT TO SCALE

SITE #1
OPEN WATER BODY EXISTING: 23,091 SF +/-
OPEN WATER BODY PROPOSED: 23,100 SF +/-

FRINGE WETLANDS DISTURBED: 1,450 SF +/-
WETLAND MITIGATION PROPOSED: 2,500 SF +/-

SITE #2
OPEN WATER BODY EXISTING: 12,764 SF +/-
OPEN WATER BODY PROPOSED: 12,770 SF +/-

FRINGE WETLANDS DISTURBED: 525 SF +/-
WETLAND MITIGATION PROPOSED: 1,550 SF +/-

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NO	REVISIONS	BY	DATE

DATE: NOVEMBER 2015 | CAD STANDARDS VERSION: V5 - 2002
DESIGNED: SMP | TECHNICIAN: SMP | CHECKED: JRM

MISS UTILITY NOTE

INFORMATION CONCERNING EXISTING UNDERGROUND UTILITIES WAS OBTAINED FROM AVAILABLE RECORDS. THE CONTRACTOR MUST DETERMINE THE EXACT LOCATION AND ELEVATION OF ALL UTILITIES BEFORE BEGINNING ANY CONSTRUCTION. CALL MISS UTILITY PRIOR TO THE START OF EXCAVATION. IF CLEARANCES ARE LESS THAN SHOWN ON THIS PLAN OR TWELVE (12) INCHES, WHICHEVER IS LESS, CONTACT THE ENGINEER AND THE UTILITY COMPANY BEFORE PROCEEDING WITH CONSTRUCTION. CLEARANCES LESS THAN NOTED MAY REQUIRE REDESIGN TO THIS PLAN.

OWNER/DEVELOPER/APPLICANT

PRINCE GEORGE'S COUNTY
3120 COUNTY ADMINISTRATION BUILDING
UPPER MARLBORO, MD 20772
PHONE #: (301) 952-7082

MAP 0003 GRID E10	
TAX MAP 77, D1	ZONING CATEGORY R-R
WSSC 200' SHEET 201 SE 14	ZONE ASSR
SITE DATUM HORIZONTAL: NAD83 VERTICAL: NGVD1929	AREA

COVER SHEET

WETLAND MITIGATION PLAN
D.O.E. - CLEANWATER PARTNERSHIP
GREENBELT LAKE
GREENBELT, MD 20770
BERWYN (21ST) ELECTION DISTRICT, PRINCE GEORGE'S COUNTY, MARYLAND

1" = 200'
SHEET 1 OF 3
PROJECT NO. 3064-00-00

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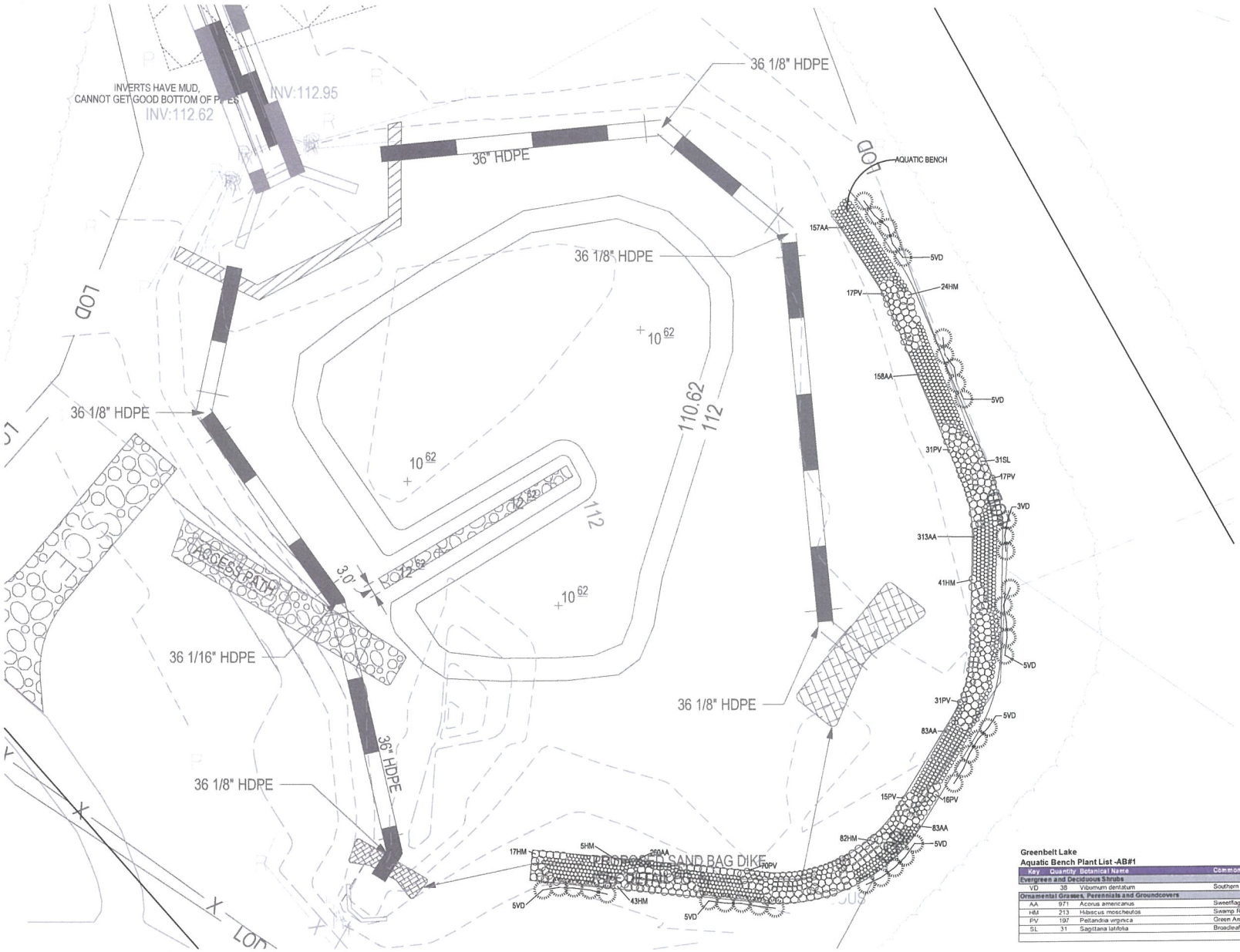

Greenbelt Lake
Aquatic Bench Plant List -AB#1

Key	Quantity	Botanical Name	Common Name	Height/Spread	Caliper	Root	Spacing	Remarks
Evergreen and Deciduous Shrubs								
VD	38	Viburnum dentatum	Southern Arrowwood	18" - 24"		Cont	5' o.c.	Native
Ornamental Grasses, Perennials and Groundcovers								
AA	971	Acorus americanus	Sweetflag			Plug	12" o.c.	
HM	213	Hibiscus moscheutos	Swamp Rosemallow			Plug	24" o.c.	
PV	197	Peltandria virginica	Green Arrow Arum			Plug	18" o.c.	
SL	31	Sagittaria latifolia	Broadleaf Arrowhead			Plug	24" o.c.	

PLAN VIEW-SITE #1

WETLAND MITIGATION PLAN
D.O.E. - CLEANWATER PARTNERSHIP
GREENBELT LAKE
GREENBELT, MD 20770
BERWYN (21ST) ELECTION DISTRICT, PRINCE GEORGE'S COUNTY, MARYLAND

SHEET 2 OF 3
PROJECT NO. 3564-00-00

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OWNER/DEVELOPER/APPLICANT
PRINCE GEORGE'S COUNTY
3120 COUNTY ADMINISTRATION BUILDING
MARLBORO, MD 20772
PHONE # (301) 952-7082

MAP 5633 GRID E10
TAX MAP 77, D1 | ZONING CATEGORY R-R
WSSC 200' SHEET 201 SE 14 | XXXX
SITE DATUM HORIZONTAL NAD83 VERTICAL NGVD1929 | XXXX

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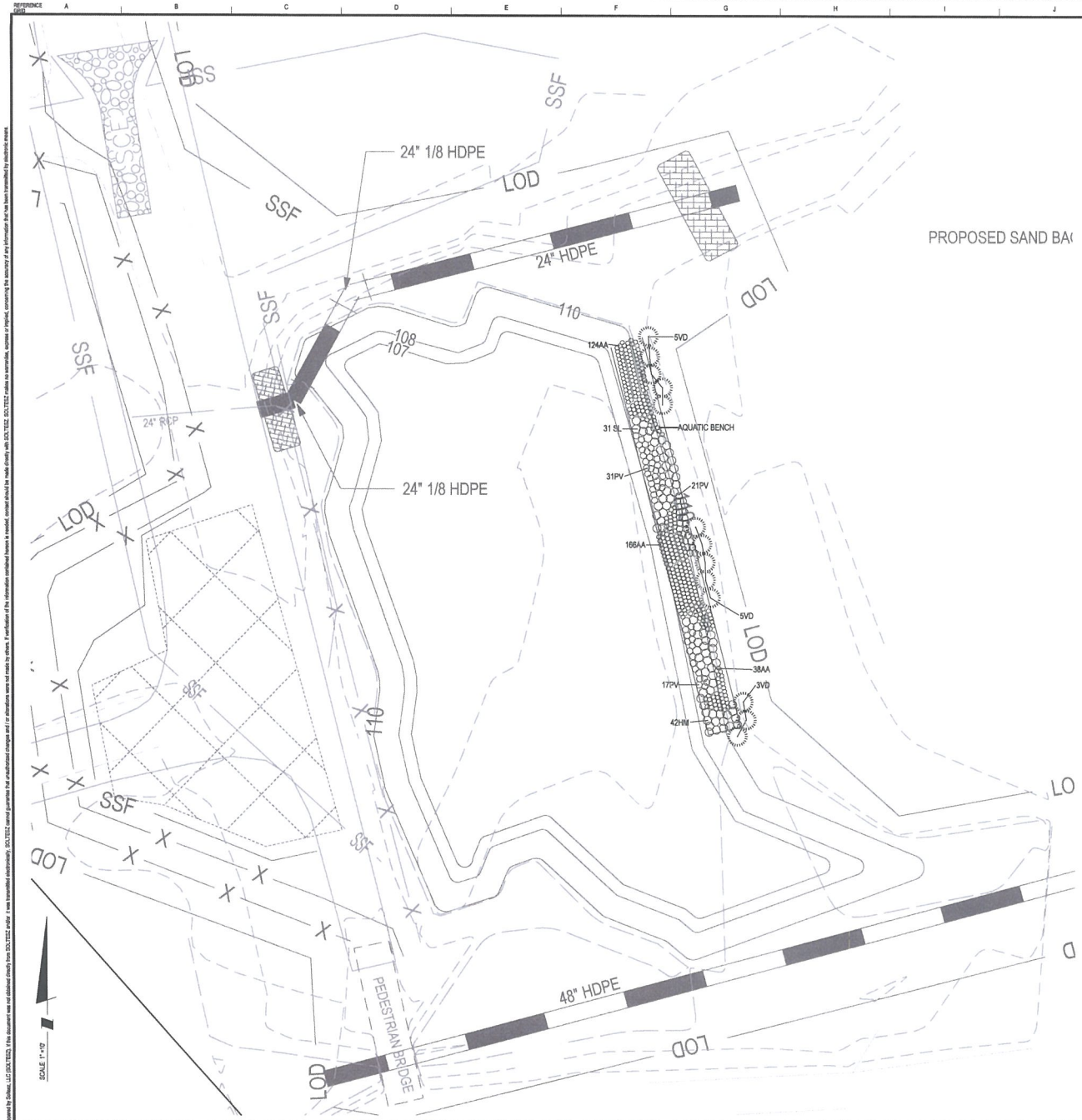

Greenbelt Lake
Aquatic Bench Plant List -AB#2

Key	Quantity	Botanical Name	Common Name	Height/Spread	Caliper	Root	Spacing	Remarks
Evergreen and Deciduous Shrubs								
VD	13	Viburnum dentatum	Southern Arrowwood	18" - 24"		Cont.	5' o.c.	Native
Ornamental Grasses, Perennials and Groundcovers								
AA	333	Acorus americanus	Sweetflag			Plug	12" o.c.	
HM	42	Hibiscus moscheutos	Swamp Rosemallow			Plug	24" o.c.	
PV	69	Peltandra virginica	Green Arrow Arum			Plug	18" o.c.	
SL	31	Sagittaria latifolia	Broadleaf Arrowhead			Plug	24" o.c.	

PLAN VIEW-SITE #2

WETLAND MITIGATION PLAN
D.O.E. - CLEANWATER PARTNERSHIP
GREENBELT LAKE
GREENBELT, MD 20770
BERWYN (21ST) ELECTION DISTRICT, PRINCE GEORGE'S COUNTY, MARYLAND

SHEET 3 OF 3

PROJECT NO. 3684-00-00

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3120 COUNTY ADMINISTRATION BUILDING
MARLBORO, MD 20772
PHONE # (301) 952 7082

MAP 5033	GRID E10
TAX MAP 77, 01	ZONING CATEGORY. R-R
WSSC 200' SHEET 201 SE 14	XXXX.
SITE DATUM HORIZONTAL: NAD83 VERTICAL: NGVD1929	XXXX.

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