

"CENTAURUS SOLAR" PHOTOVOLTAIC SOLAR ARRAY PROJECT

FOR LODESTAR ENERGY

AT 175 BUTTERFIELD DRIVE ASHLAND, MASSACHUSETTS

LOCUS TITLE INFORMATION

LOT 3A, BUTTERFIELD DRIVE

OWNER: BUTTERFIELD DRIVE, LLC
 DEED REFERENCE: BK. 17760 PG. 201
 PLAN REFERENCE: PLAN NO. 7 OF 2015
 ASSESSORS: PARCEL ID

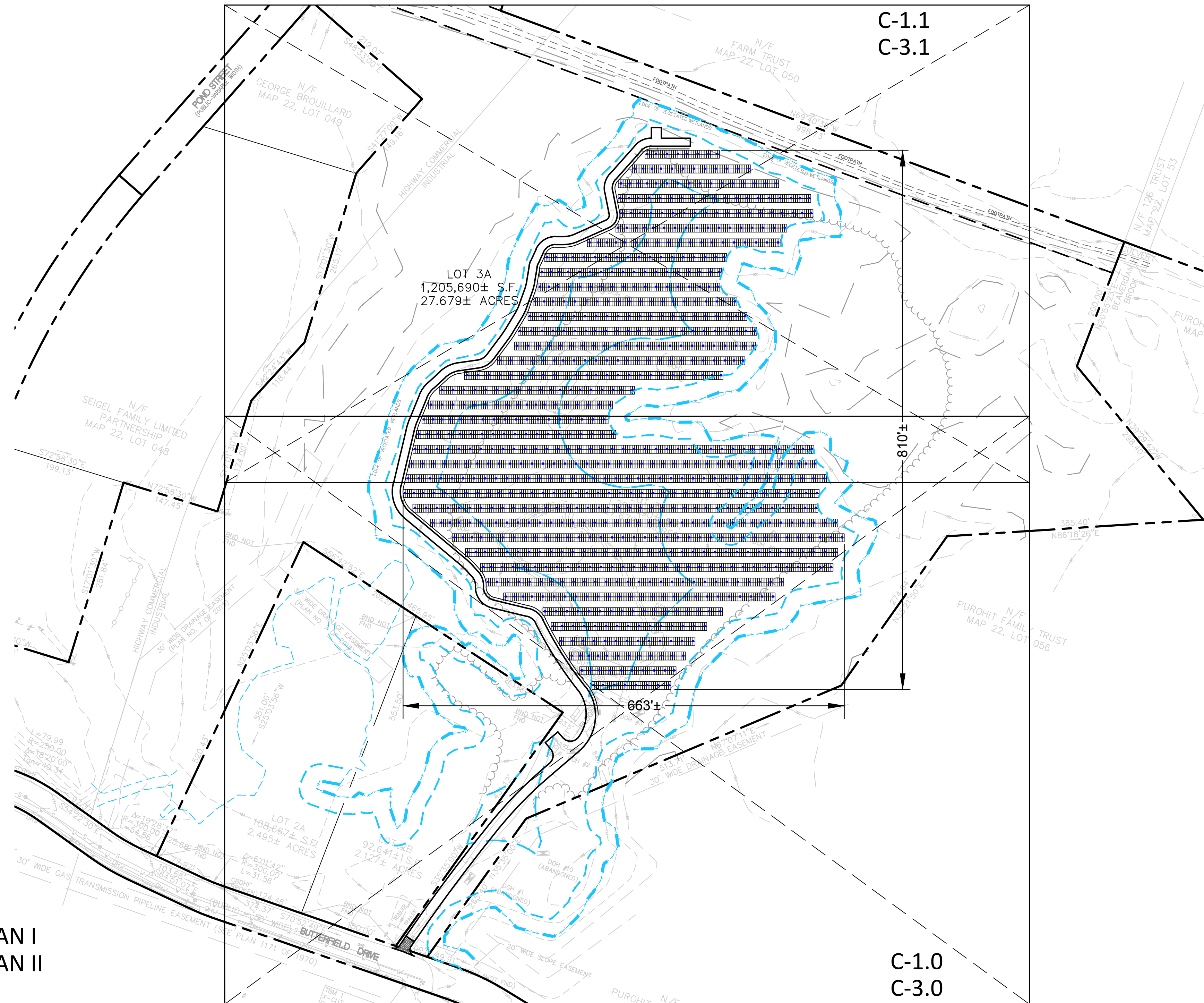
ZONING

INDUSTRIAL (I)		
	REQUIRED	EXISTING
MIN LOT AREA	30,000 SQ. FT.	1,205,690± SQ. FT.
MINIMUM FRONTAGE	150 FEET	586.38 FEET
FRONT SETBACK	40 FEET	400± FEET
SIDE SETBACK	30 FEET	23.5' FEET
REAR	30 FEET	936' FEET

PHOTOVOLTAIC INSTALLATIONS OVERLAY DISTRICT (PIOD)

	REQUIRED	EXISTING
MIN LOT AREA	30,000 SQ. FT.	1,205,690± SQ. FT.
MINIMUM FRONTAGE	150 FEET	586.38 FEET
FRONT SETBACK	*10 FEET	N/A
SIDE SETBACK	*15 FEET	N/A
REAR	*25 FEET	N/A

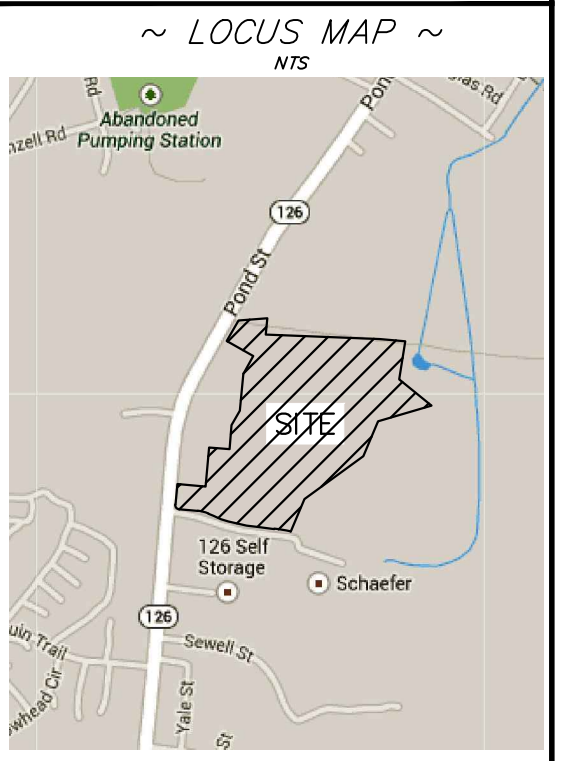
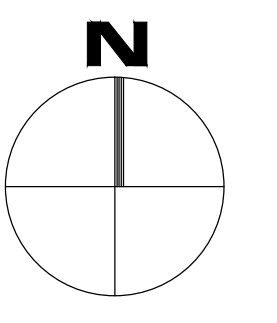
* 50' FRONT, SIDE AND REAR SETBACKS REQUIRED IN RESIDENTIAL ZONE.



LEGEND

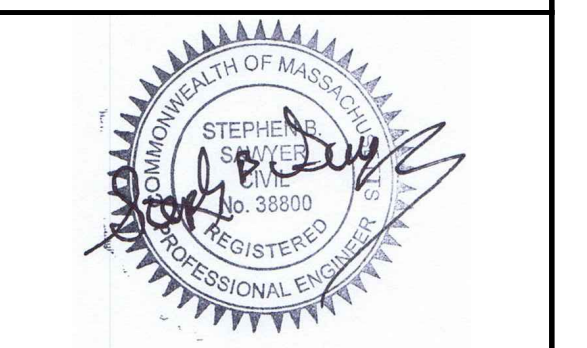
- BOUND
- UTILITY POLE
- IRON ROD FND
- CONC BOUND/DRILL HOLE FND
- CONC BOUND CENTER BACK
- CATCH BASIN
- GAS GATE
- GUY POLE
- FIRE HYDRANT
- LIGHT POLE
- △ SPTB
- SEWER MANHOLE
- BENCHMARK
- UNLABELED MANHOLE
- WATER GATE
- #10-C1 WETLAND FLAG
- STOCK
- ▨ MARSH
- CATCHBASIN
- WATER VALVE
- CONC. BOUND
- CBD

- EASEMENT LINE
- TREE LINE
- WETLANDS LINE
- 25' NO-TOUCH LINE
- 100' BUFFER
- FLOOD-ZONE A



Prepared by:
Design Consultants, Inc.
 CIVIL ENGINEERS AND LAND SURVEYORS
 120 Middlesex Avenue, Suite 20
 Somerville, MA 02145
 617-776-3350 617-776-7710

Prepared for:
LODESTAR ENGERY, LLC
 3 ELLSWORTH PLACE
 SUITE 122
 AVON, CT, 06001



Project Title:
CENTAURUS SOLAR
 IN
 ASHLAND, MA

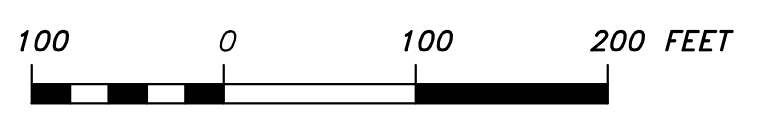
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TITLE SHEET

Date:	9-14-2015
Scale:	1"=100'
Drawn by:	SSW
Checked by:	SBS
Proj. #	2015-017

10/22/2015	MOVE FENCE & ADD EASEMENT
10/8/2015	PANELS & DRIVEWAY LAYOUT
DATE:	ACTION
SHEET C-0.0	

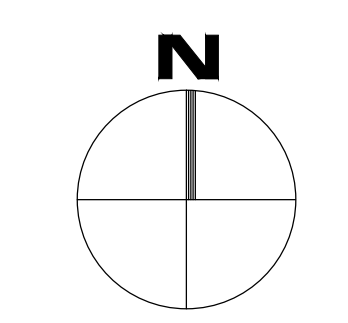
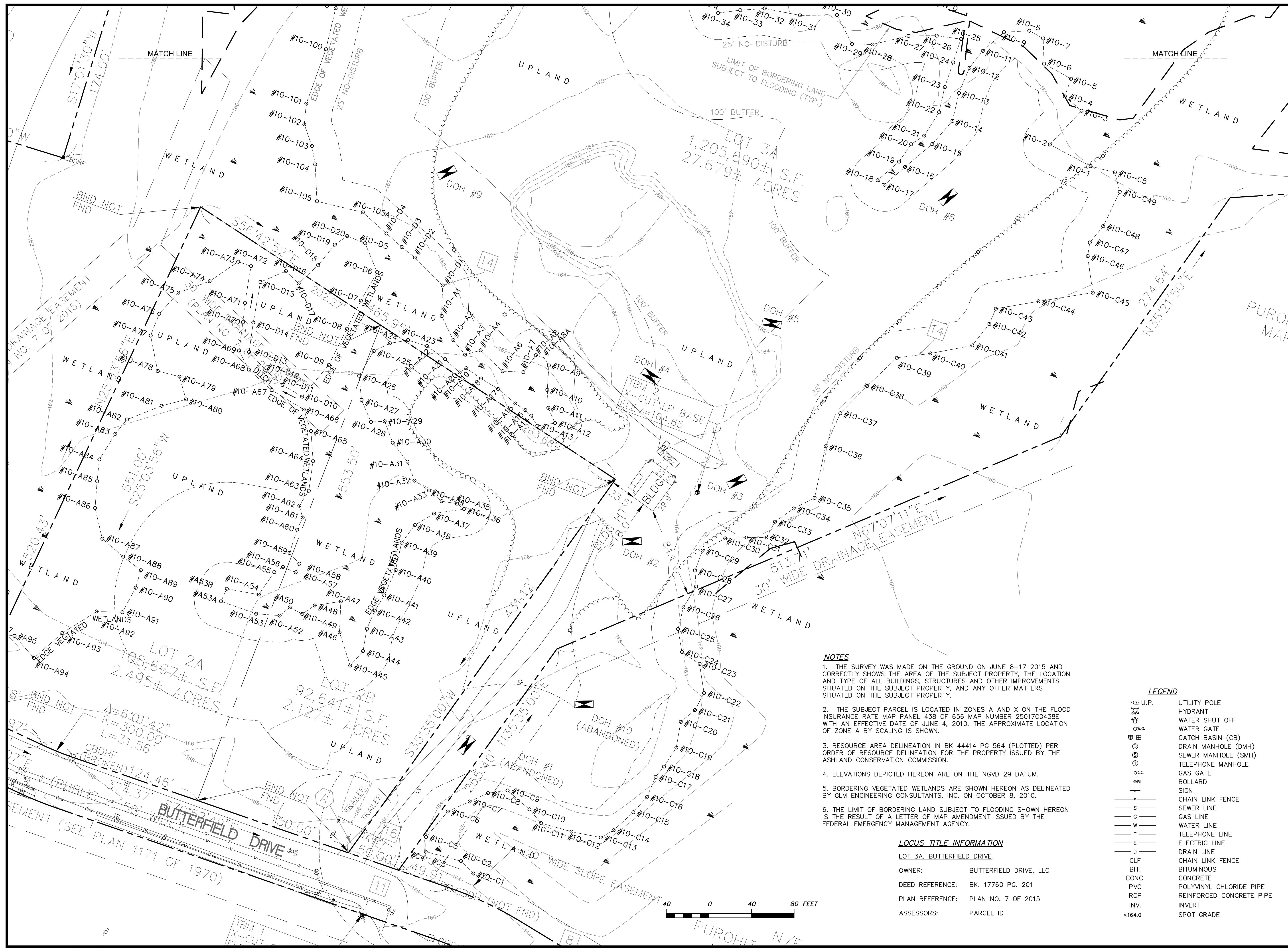
SHEET INDEX:

SHEET No.	DESCRIPTION
C-0.0	COVER SHEET
C-1.0	EXISTING CONDITIONS PLAN I
C-1.1	EXISTING CONDITIONS PLAN II
C-2.0	SITE PREPARATION PLAN
C-3.0	SITE, GRADING & DRAINAGE PLAN I
C-3.1	SITE, GRADING & DRAINAGE PLAN II
C-4.0	DETAILS I
C-4.1	DETAILS II



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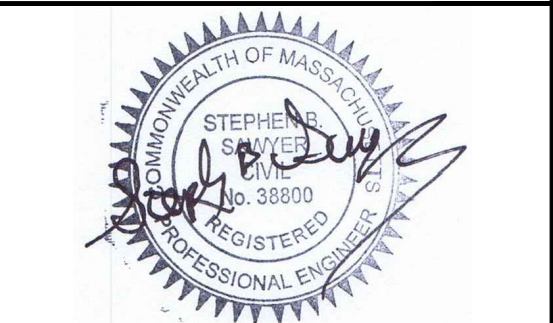
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~ LOCUS MAP ~
NTS

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AVON, CT, 06001



Project Title:
CENTAURUS SOLAR
IN
ASHLAND, MA

Sheet Title:
**EXISTING
CONDITIONS
PLAN I**

Date:	9-14-2015
Scale:	1"=40'
Drawn by:	SSW
Checked by:	SBS
Proj. #	2015-017

10/22/2015	MOVE FENCE & ADD EASEMENT
10/8/2015	PANELS & DRIVEWAY LAYOUT

DATE: ACTION

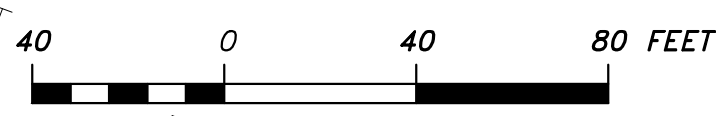
**SHEET
C-1.0**

- NOTES**
- THE SURVEY WAS MADE ON THE GROUND ON JUNE 8-17 2015 AND CORRECTLY SHOWS THE AREA OF THE SUBJECT PROPERTY, THE LOCATION AND TYPE OF ALL BUILDINGS, STRUCTURES AND OTHER IMPROVEMENTS SITUATED ON THE SUBJECT PROPERTY, AND ANY OTHER MATTERS SITUATED ON THE SUBJECT PROPERTY.
 - THE SUBJECT PARCEL IS LOCATED IN ZONES A AND X ON THE FLOOD INSURANCE RATE MAP PANEL 438 OF 656 MAP NUMBER 25017C0438E WITH AN EFFECTIVE DATE OF JUNE 4, 2010. THE APPROXIMATE LOCATION OF ZONE A BY SCALING IS SHOWN.
 - RESOURCE AREA DELINEATION IN BK 44414 PG 564 (PLOTTED) PER ORDER OF RESOURCE DELINEATION FOR THE PROPERTY ISSUED BY THE ASHLAND CONSERVATION COMMISSION.
 - ELEVATIONS DEPICTED HEREON ARE ON THE NGVD 29 DATUM.
 - BORDERING VEGETATED WETLANDS ARE SHOWN HEREON AS DELINEATED BY GLM ENGINEERING CONSULTANTS, INC. ON OCTOBER 8, 2010.
 - THE LIMIT OF BORDERING LAND SUBJECT TO FLOODING SHOWN HEREON IS THE RESULT OF A LETTER OF MAP AMENDMENT ISSUED BY THE FEDERAL EMERGENCY MANAGEMENT AGENCY.

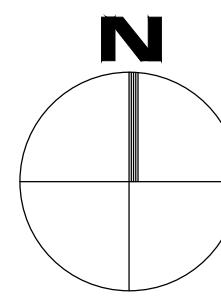
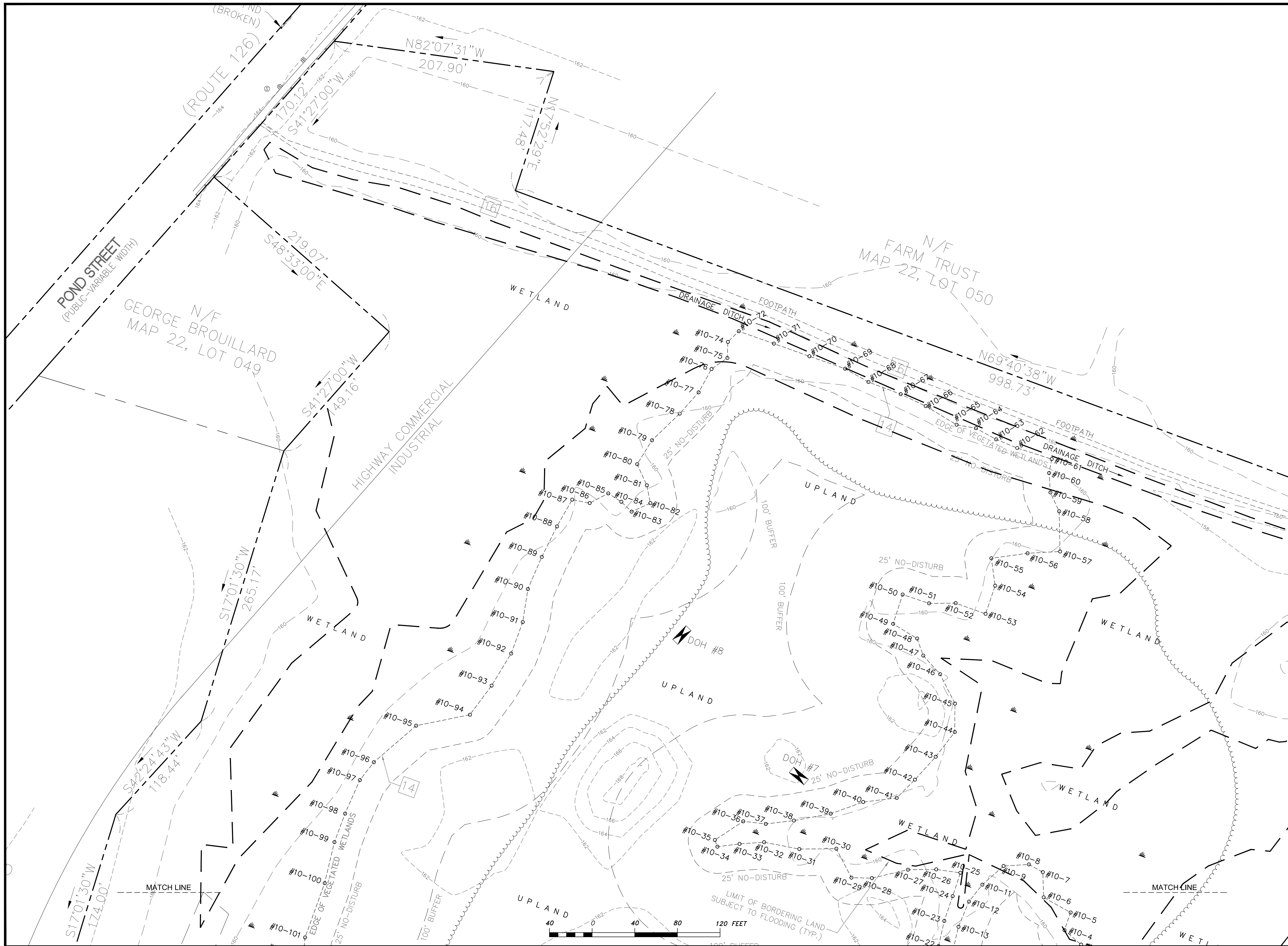
LEGEND

U.P.	UTILITY POLE
HYDRANT	HYDRANT
WATER SHUT OFF	WATER SHUT OFF
WATER GATE	WATER GATE
CATCH BASIN (CB)	CATCH BASIN (CB)
DRAIN MANHOLE (DMH)	DRAIN MANHOLE (DMH)
SEWER MANHOLE (SMH)	SEWER MANHOLE (SMH)
TELEPHONE MANHOLE	TELEPHONE MANHOLE
GAS GATE	GAS GATE
BOLLARD	BOLLARD
SIGN	SIGN
CHAIN LINK FENCE	CHAIN LINK FENCE
SEWER LINE	SEWER LINE
GAS LINE	GAS LINE
WATER LINE	WATER LINE
TELEPHONE LINE	TELEPHONE LINE
ELECTRIC LINE	ELECTRIC LINE
DRAIN LINE	DRAIN LINE
CHAIN LINK FENCE	CHAIN LINK FENCE
BIT.	BITUMINOUS
CONC.	CONCRETE
PVC	POLYVINYL CHLORIDE PIPE
RCP	REINFORCED CONCRETE PIPE
INV.	INVERT
x164.0	SPOT GRADE

LOCUS TITLE INFORMATION
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 PLAN REFERENCE: PLAN NO. 7 OF 2015
 ASSESSORS: PARCEL ID



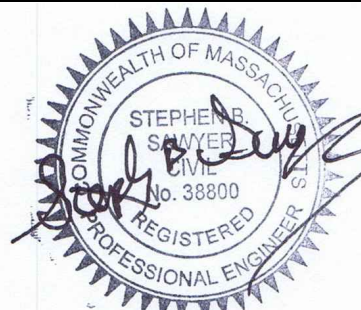
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NTS

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Project Title:
CENTAURUS SOLAR
IN
ASHLAND, MA

Sheet Title:
EXISTING
CONDITIONS
PLAN II

Date:	9-14-2015
Scale:	1"=40'
Drawn by:	SSW
Checked by:	SBS
Proj. #	2015-017

10/22/2015	MOVE FENCE & ADD EASEMENT
10/8/2015	PANELS & DRIVEWAY LAYOUT

DATE: ACTION

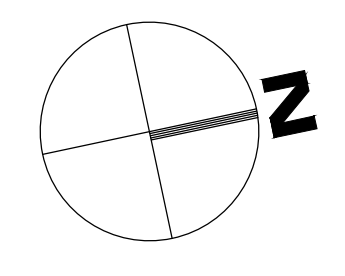
SHEET
C1.1

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LEGEND

○	UTILITY POLE	CLF	CHAIN LINK FENCE
○	HYDRANT	BIT.	BITUMINOUS
○	WATER SHUT OFF	CONC.	CONCRETE
○	WATER GATE	PVC	POLYVINYL CHLORIDE PIPE
○	CATCH BASIN (CB)	RCP	REINFORCED CONCRETE PIPE
○	DRAIN MANHOLE (DMH)	CI	CAST IRON PIPE
○	SEWER MANHOLE (SMH)	VC	VITRIFIED CLAY PIPE
○	GAS GATE		
○	BOLLARD		
○	SIGN		
○	CHAIN LINK FENCE		
○	SEWER LINE		
○	GAS LINE		
○	WATER LINE		
○	TELEPHONE LINE		
○	ELECTRIC LINE		
○	DRAIN LINE		
○	VERTICAL GRANITE CURB		
○	VERTICAL CONCRETE CURB		

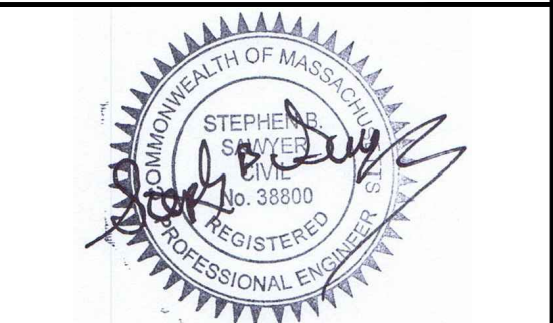
- GENERAL NOTES**
1. ALL WORK PERFORMED AS PART OF THIS PROJECT SHALL CONFORM TO THE TOWN OF ASHLAND, DEPT. OF PUBLIC WORKS AND ANY OTHER AGENCY WITH AUTHORITY IN THIS AREA.
 2. CONTRACTOR TO MAINTAIN WORK AREA IN A CLEAN CONDITION. NO CONSTRUCTION DEBRIS SHALL BE ALLOWED TO ACCUMULATE WITHIN THE WORKSITE AND NO DIRT, GRAVEL, ETC. SHALL BE ALLOWED TO ACCUMULATE ON THE PUBLIC RIGHT-OF-WAY.
 3. AREAS OUTSIDE THE LIMITS OF PROPOSED WORK DISTURBED BY THE CONTRACTOR'S OPERATIONS SHALL BE RESTORED BY THE CONTRACTOR TO THEIR ORIGINAL CONDITION AT THE CONTRACTOR'S EXPENSE.
 4. ALL EXISTING MONITORING WELLS ARE TO BE MAINTAINED DURING CONSTRUCTION.



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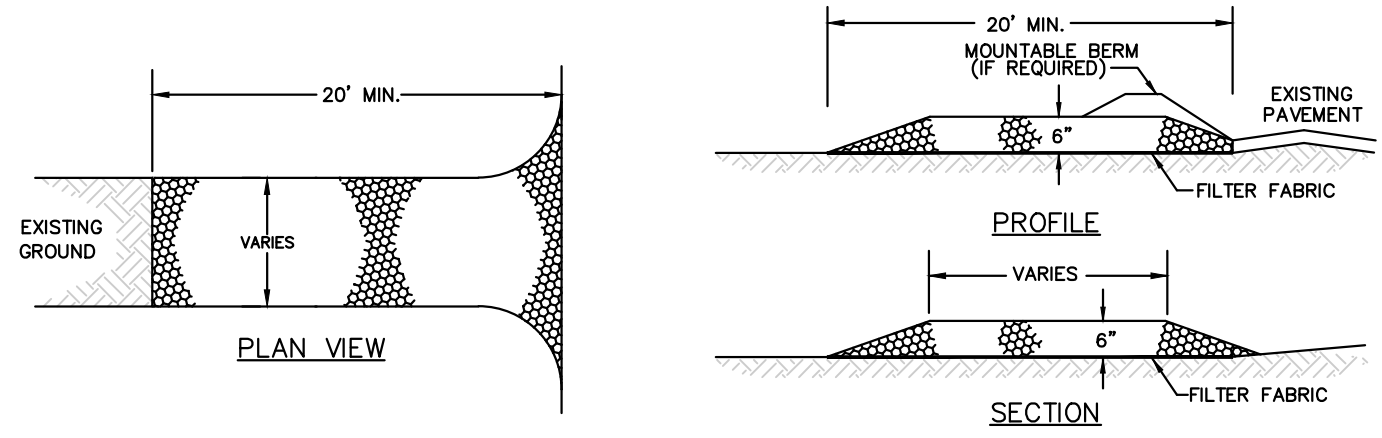
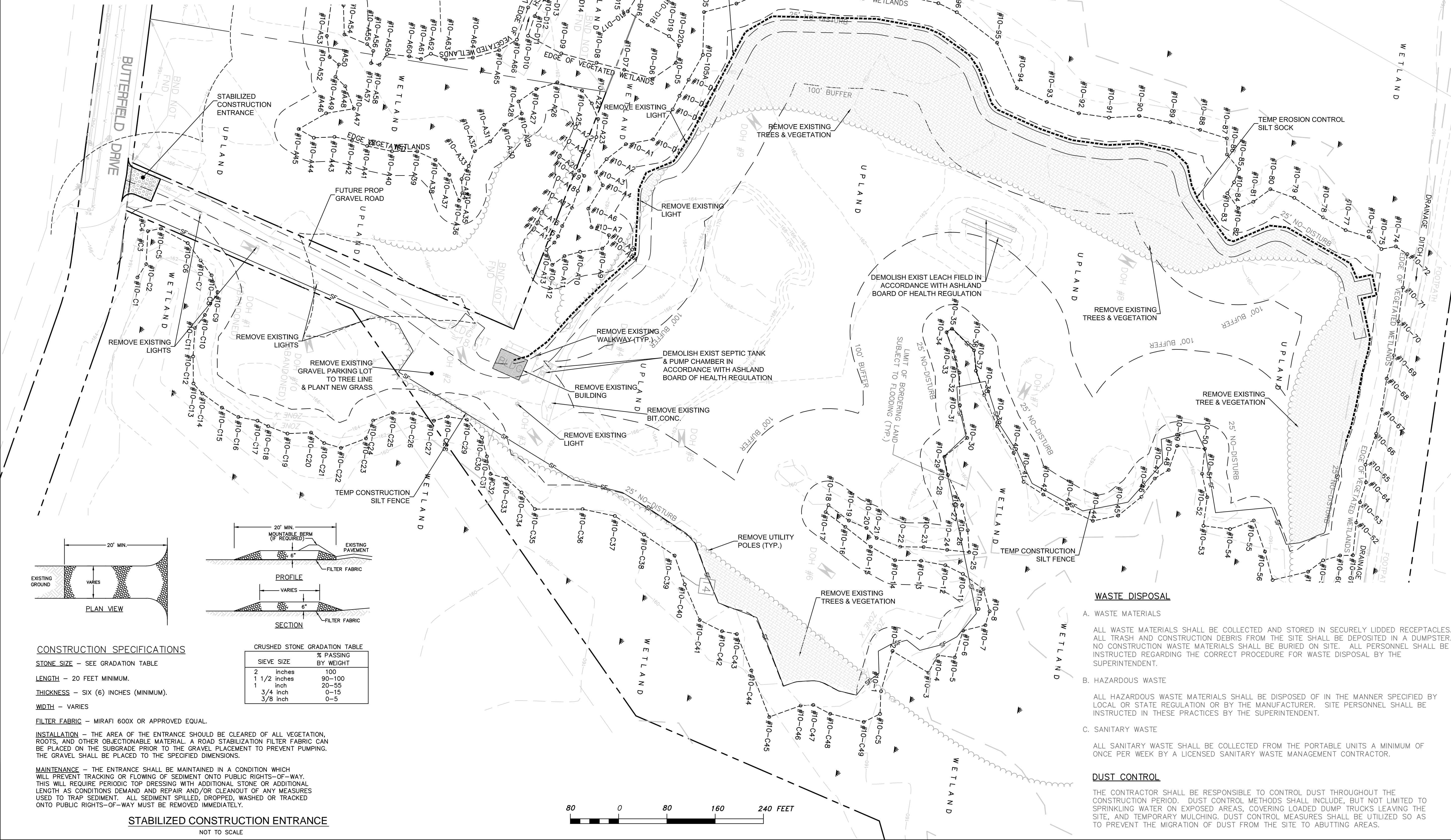
Project Title:
CENTAURUS SOLAR
IN
ASHLAND, MA

Sheet Title:
SITE PREPARATION PLAN

Date:	9-14-2015
Scale:	1"=80'
Drawn by:	SSW
Checked by:	SBS
Proj. #	2015-017

10/22/2015	MOVE FENCE & ADD EASEMENT
10/8/2015	PANELS & DRIVEWAY LAYOUT

DATE: ACTION
SHEET C2.0



CONSTRUCTION SPECIFICATIONS

STONE SIZE - SEE GRADATION TABLE

LENGTH - 20 FEET MINIMUM.

THICKNESS - SIX (6) INCHES (MINIMUM).

WIDTH - VARIES

FILTER FABRIC - MIRAFI 600X OR APPROVED EQUAL.

INSTALLATION - THE AREA OF THE ENTRANCE SHOULD BE CLEARED OF ALL VEGETATION, ROOTS, AND OTHER OBJECTIONABLE MATERIAL. A ROAD STABILIZATION FILTER FABRIC CAN BE PLACED ON THE SUBGRADE PRIOR TO THE GRAVEL PLACEMENT TO PREVENT PUMPING. THE GRAVEL SHALL BE PLACED TO THE SPECIFIED DIMENSIONS.

MAINTENANCE - THE ENTRANCE SHALL BE MAINTAINED IN A CONDITION WHICH WILL PREVENT TRACKING OR FLOWING OF SEDIMENT ONTO PUBLIC RIGHTS-OF-WAY. THIS WILL REQUIRE PERIODIC TOP DRESSING WITH ADDITIONAL STONE OR ADDITIONAL LENGTH AS CONDITIONS DEMAND AND REPAIR AND/OR CLEANOUT OF ANY MEASURES USED TO TRAP SEDIMENT. ALL SEDIMENT SPILLED, DROPPED, WASHED OR TRACKED ONTO PUBLIC RIGHTS-OF-WAY MUST BE REMOVED IMMEDIATELY.

CRUSHED STONE GRADATION TABLE

SIEVE SIZE	% PASSING BY WEIGHT
2 inches	100
1 1/2 inches	90-100
1 inch	20-55
3/4 inch	0-15
3/8 inch	0-5

STABILIZED CONSTRUCTION ENTRANCE
NOT TO SCALE

WASTE DISPOSAL

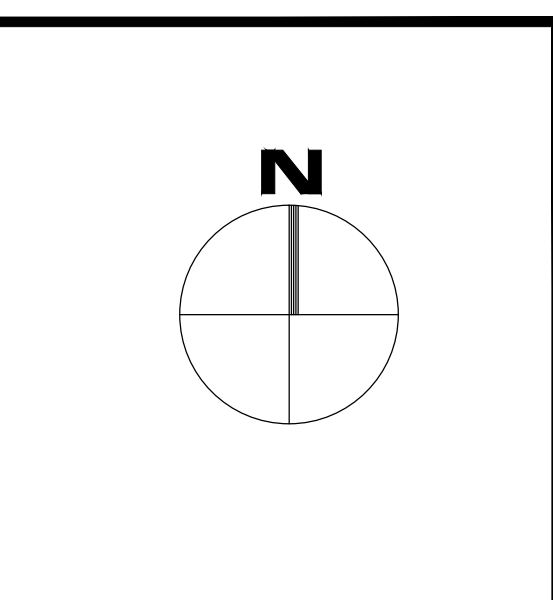
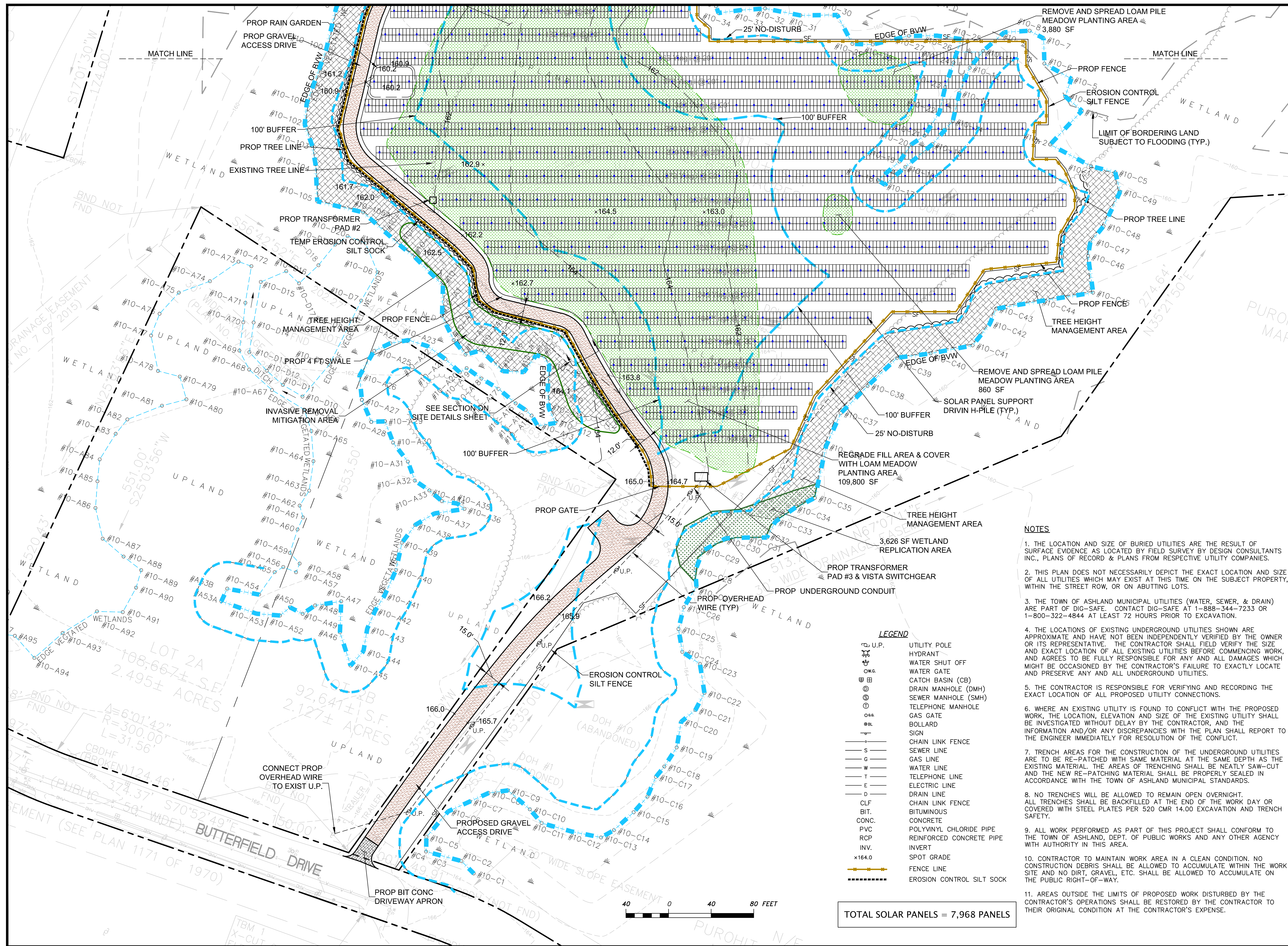
A. WASTE MATERIALS
ALL WASTE MATERIALS SHALL BE COLLECTED AND STORED IN SECURELY LIDDED RECEPTACLES. ALL TRASH AND CONSTRUCTION DEBRIS FROM THE SITE SHALL BE DEPOSITED IN A DUMPSTER. NO CONSTRUCTION WASTE MATERIALS SHALL BE BURIED ON SITE. ALL PERSONNEL SHALL BE INSTRUCTED REGARDING THE CORRECT PROCEDURE FOR WASTE DISPOSAL BY THE SUPERINTENDENT.

B. HAZARDOUS WASTE
ALL HAZARDOUS WASTE MATERIALS SHALL BE DISPOSED OF IN THE MANNER SPECIFIED BY LOCAL OR STATE REGULATION OR BY THE MANUFACTURER. SITE PERSONNEL SHALL BE INSTRUCTED IN THESE PRACTICES BY THE SUPERINTENDENT.

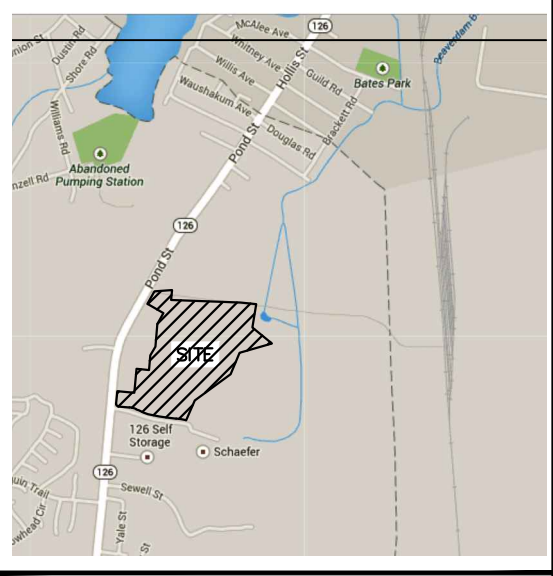
C. SANITARY WASTE
ALL SANITARY WASTE SHALL BE COLLECTED FROM THE PORTABLE UNITS A MINIMUM OF ONCE PER WEEK BY A LICENSED SANITARY WASTE MANAGEMENT CONTRACTOR.

DUST CONTROL
THE CONTRACTOR SHALL BE RESPONSIBLE TO CONTROL DUST THROUGHOUT THE CONSTRUCTION PERIOD. DUST CONTROL METHODS SHOULD INCLUDE, BUT NOT LIMITED TO SPRINKLING WATER ON EXPOSED AREAS, COVERING LOADED DUMP TRUCKS LEAVING THE SITE, AND TEMPORARY MULCHING. DUST CONTROL MEASURES SHALL BE UTILIZED SO AS TO PREVENT THE MIGRATION OF DUST FROM THE SITE TO ADJUTING AREAS.

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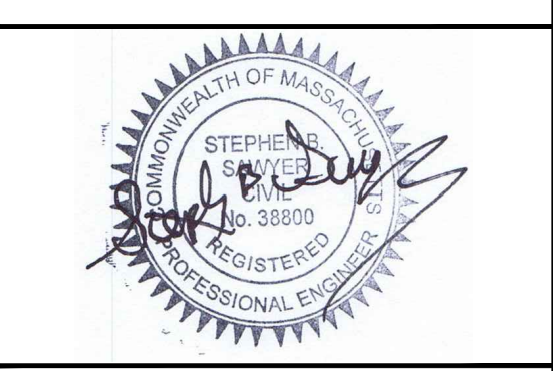


~ LOCUS MAP ~
N15
To see all of the screen, use the



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Prepared for:
LODESTAR ENRGY, LLC
3 ELLSWORTH PLACE
SUITE 122
AVON, CT, 06001



Project Title:
CENTAURUS SOLAR
IN
ASHLAND, MA

Sheet Title:
SITE, GRADING & DRAINAGE PLAN I

Date:	9-14-2015
Scale:	1"=40'
Drawn by:	SSW
Checked by:	SBS
Proj. #:	2015-017

10/22/2015	MOVE FENCE & ADD EASEMENT
10/8/2015	PANELS & DRIVEWAY LAYOUT

DATE: ACTION
SHEET C-3.0

NOTES

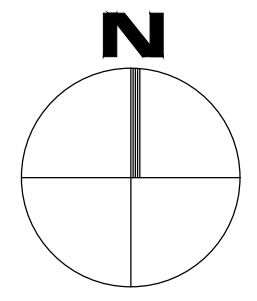
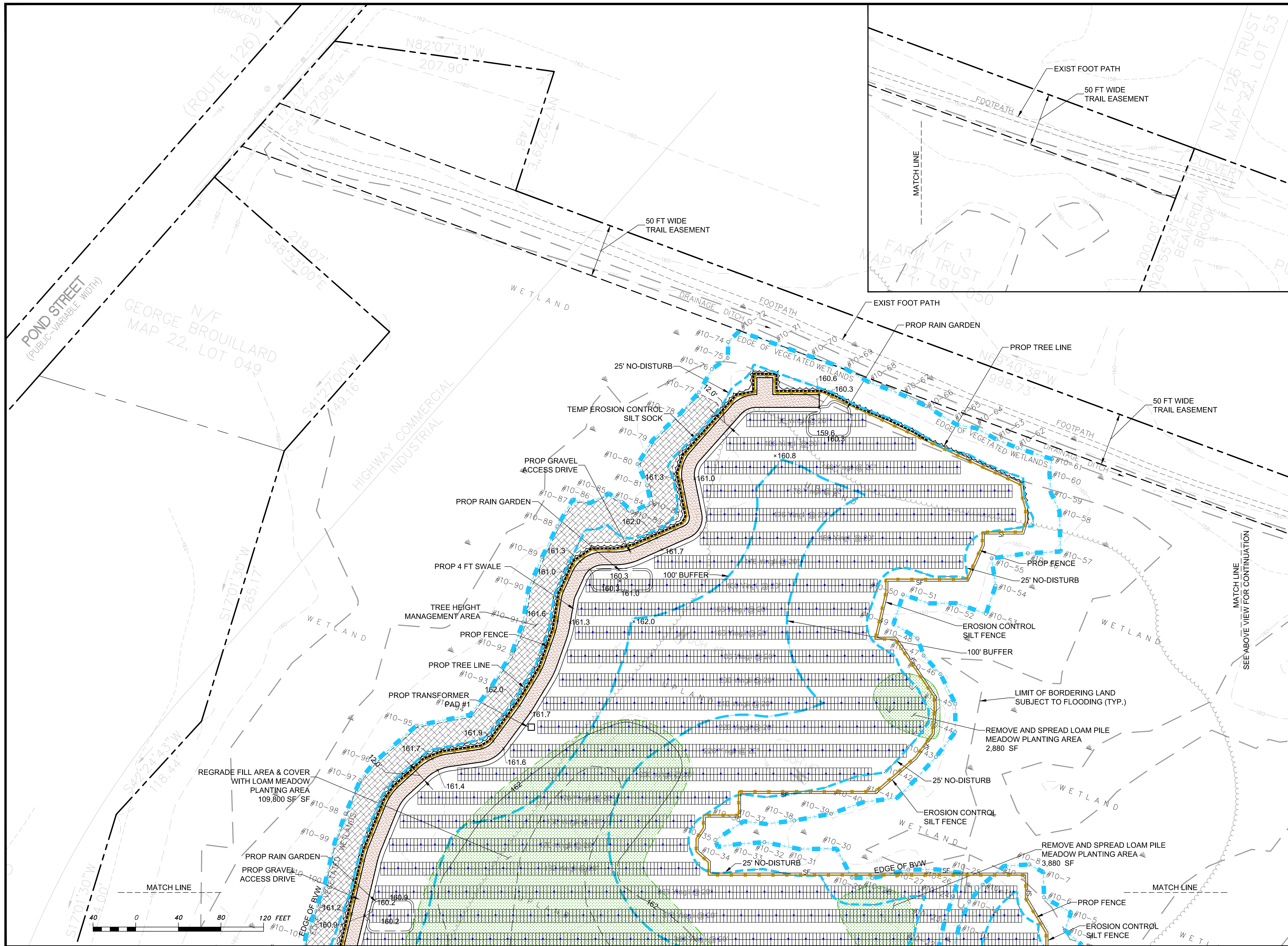
1. THE LOCATION AND SIZE OF BURIED UTILITIES ARE THE RESULT OF SURFACE EVIDENCE AS LOCATED BY FIELD SURVEY BY DESIGN CONSULTANTS INC., PLANS OF RECORD & PLANS FROM RESPECTIVE UTILITY COMPANIES.
2. THIS PLAN DOES NOT NECESSARILY DEPICT THE EXACT LOCATION AND SIZE OF ALL UTILITIES WHICH MAY EXIST AT THIS TIME ON THE SUBJECT PROPERTY, WITHIN THE STREET ROW, OR ON ABUTTING LOTS.
3. THE TOWN OF ASHLAND MUNICIPAL UTILITIES (WATER, SEWER, & DRAIN) ARE PART OF DIG-SAFE. CONTACT DIG-SAFE AT 1-888-344-7233 OR 1-800-322-4844 AT LEAST 72 HOURS PRIOR TO EXCAVATION.
4. THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES SHOWN ARE APPROXIMATE AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL FIELD VERIFY THE SIZE AND EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND UTILITIES.
5. THE CONTRACTOR IS RESPONSIBLE FOR VERIFYING AND RECORDING THE EXACT LOCATION OF ALL PROPOSED UTILITY CONNECTIONS.
6. WHERE AN EXISTING UTILITY IS FOUND TO CONFLICT WITH THE PROPOSED WORK, THE LOCATION, ELEVATION AND SIZE OF THE EXISTING UTILITY SHALL BE INVESTIGATED WITHOUT DELAY BY THE CONTRACTOR, AND THE INFORMATION AND/OR ANY DISCREPANCIES WITH THE PLAN SHALL REPORT TO THE ENGINEER IMMEDIATELY FOR RESOLUTION OF THE CONFLICT.
7. TRENCH AREAS FOR THE CONSTRUCTION OF THE UNDERGROUND UTILITIES ARE TO BE RE-PATCHED WITH SAME MATERIAL AT THE SAME DEPTH AS THE EXISTING MATERIAL. THE AREAS OF TRENCHING SHALL BE NEATLY SAW-CUT AND THE NEW RE-PATCHING MATERIAL SHALL BE PROPERLY SEALED IN ACCORDANCE WITH THE TOWN OF ASHLAND MUNICIPAL STANDARDS.
8. NO TRENCHES WILL BE ALLOWED TO REMAIN OPEN OVERNIGHT. ALL TRENCHES SHALL BE BACKFILLED AT THE END OF THE WORK DAY OR COVERED WITH STEEL PLATES PER 520 CMR 14.00 EXCAVATION AND TRENCH SAFETY.
9. ALL WORK PERFORMED AS PART OF THIS PROJECT SHALL CONFORM TO THE TOWN OF ASHLAND, DEPT. OF PUBLIC WORKS AND ANY OTHER AGENCY WITH AUTHORITY IN THIS AREA.
10. CONTRACTOR TO MAINTAIN WORK AREA IN A CLEAN CONDITION. NO CONSTRUCTION DEBRIS SHALL BE ALLOWED TO ACCUMULATE WITHIN THE WORK SITE AND NO DIRT, GRAVEL, ETC. SHALL BE ALLOWED TO ACCUMULATE ON THE PUBLIC RIGHT-OF-WAY.
11. AREAS OUTSIDE THE LIMITS OF PROPOSED WORK DISTURBED BY THE CONTRACTOR'S OPERATIONS SHALL BE RESTORED BY THE CONTRACTOR TO THEIR ORIGINAL CONDITION AT THE CONTRACTOR'S EXPENSE.

LEGEND

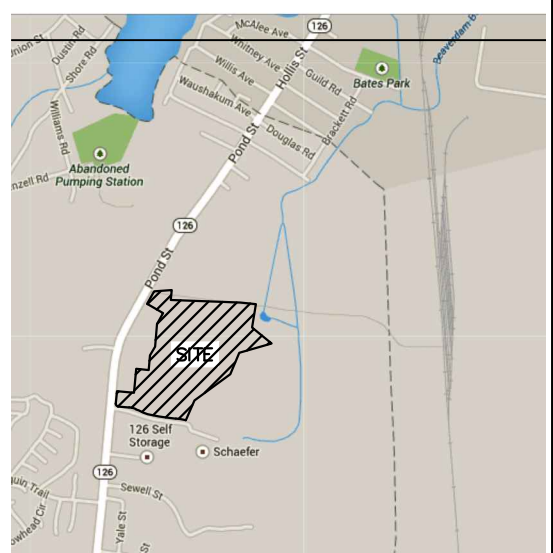
- U.P. UTILITY POLE
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- DRAIN MANHOLE (DMH)
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- TELEPHONE LINE
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- DRAIN LINE
- CHAIN LINK FENCE
- BIT.
- BITUMINOUS
- CONC.
- CONCRETE
- PVC
- POLYVINYL CHLORIDE PIPE
- RCP
- REINFORCED CONCRETE PIPE
- INV.
- INVERT
- x164.0
- SPOT GRADE
- FENCE LINE
- EROSION CONTROL SILT SOCK

TOTAL SOLAR PANELS = 7,968 PANELS

P:\2015 PROJECTS\2015-017 BUTTERFIELD DR. ASHLAND (SOLAR)\DWG\ENGINEERING\15-017 C3.0 SITE PLAN & COVER SHEET.DWG

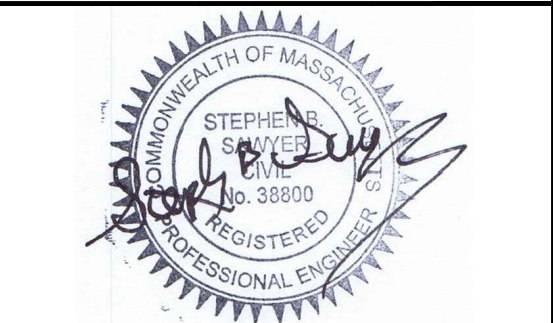


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NYS



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10/22/2015	MOVE FENCE & ADD EASEMENT
10/8/2015	PANELS & DRIVEWAY LAYOUT

DATE: ACTION
SHEET C3.1

MATCH LINE
SEE ABOVE VIEW FOR CONTINUATION

SOIL TEST INFORMATION

BUTTERFIELD DRIVE, ASHLAND
DATE OF TESTS: NOVEMBER 1, 2013

SOILS EVALUATOR: WAYNE KEEFNER, DESIGN CONSULTANTS INC.
(SE#1189, SINCE 1997)

LEGEND:

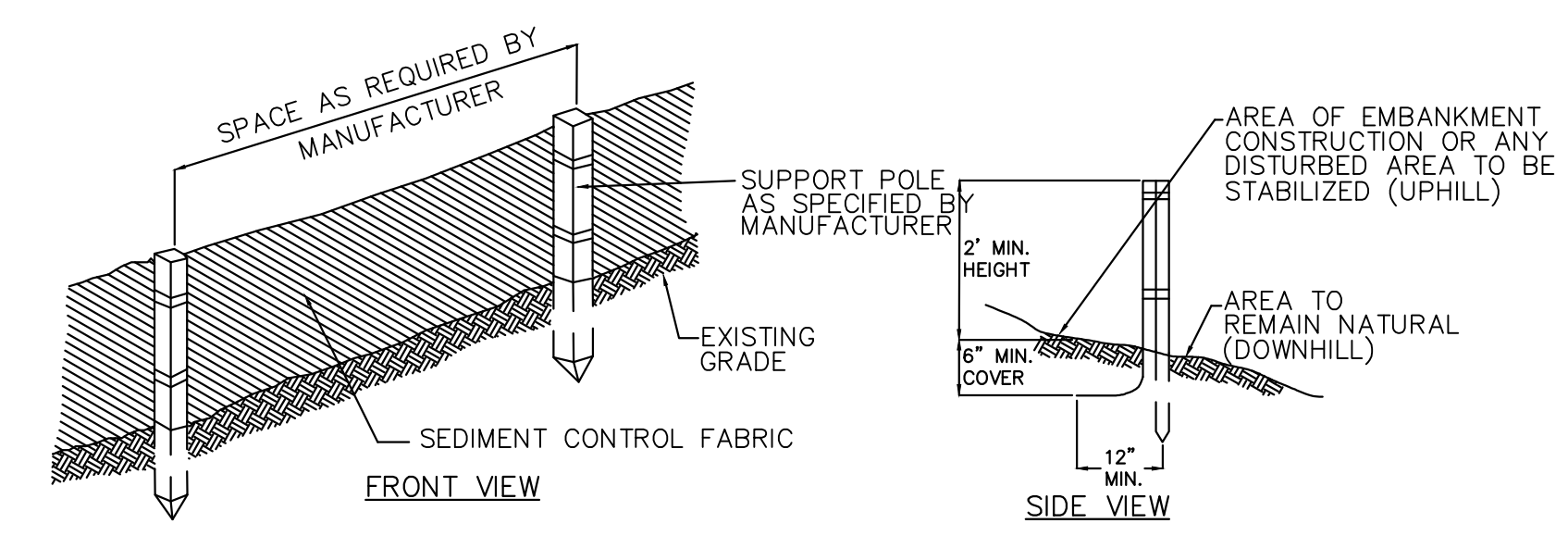
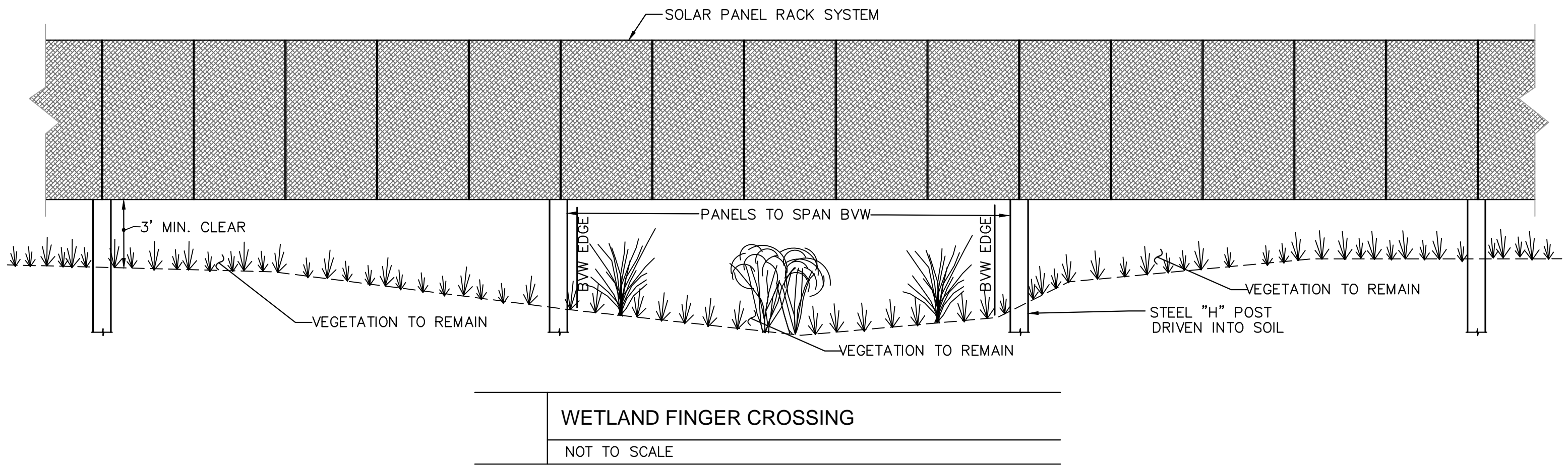
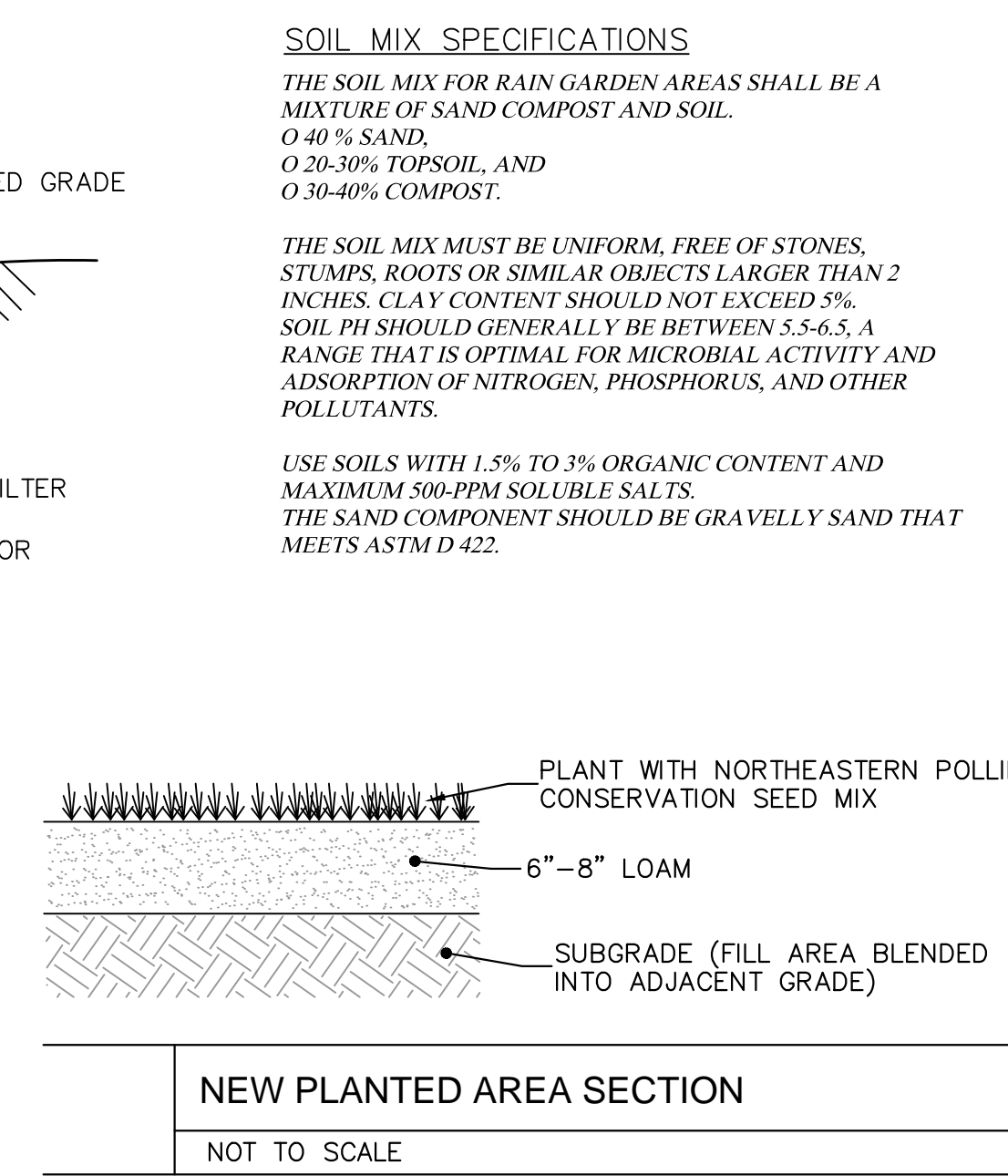
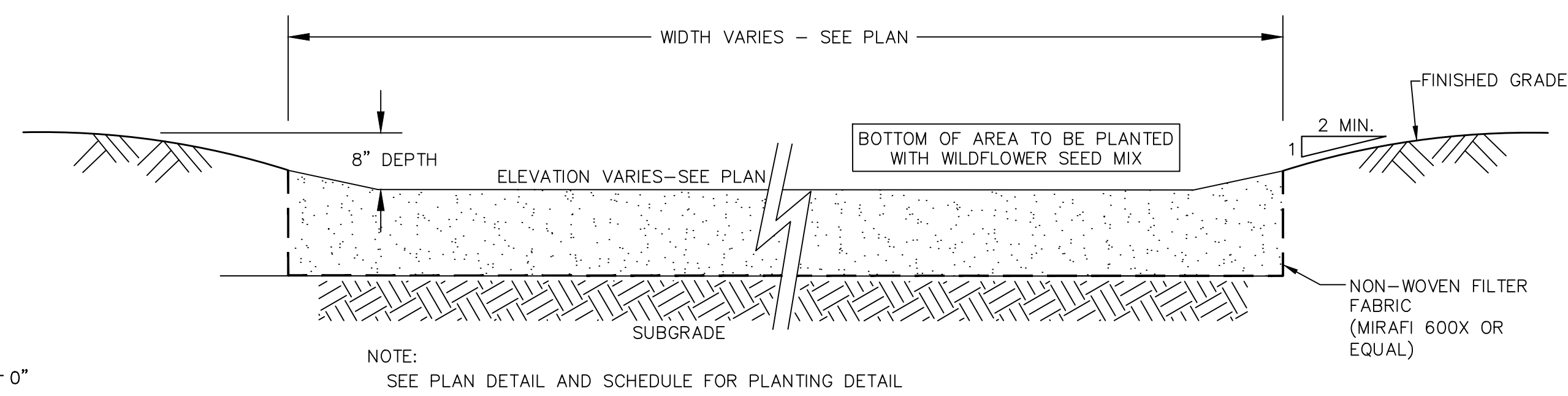
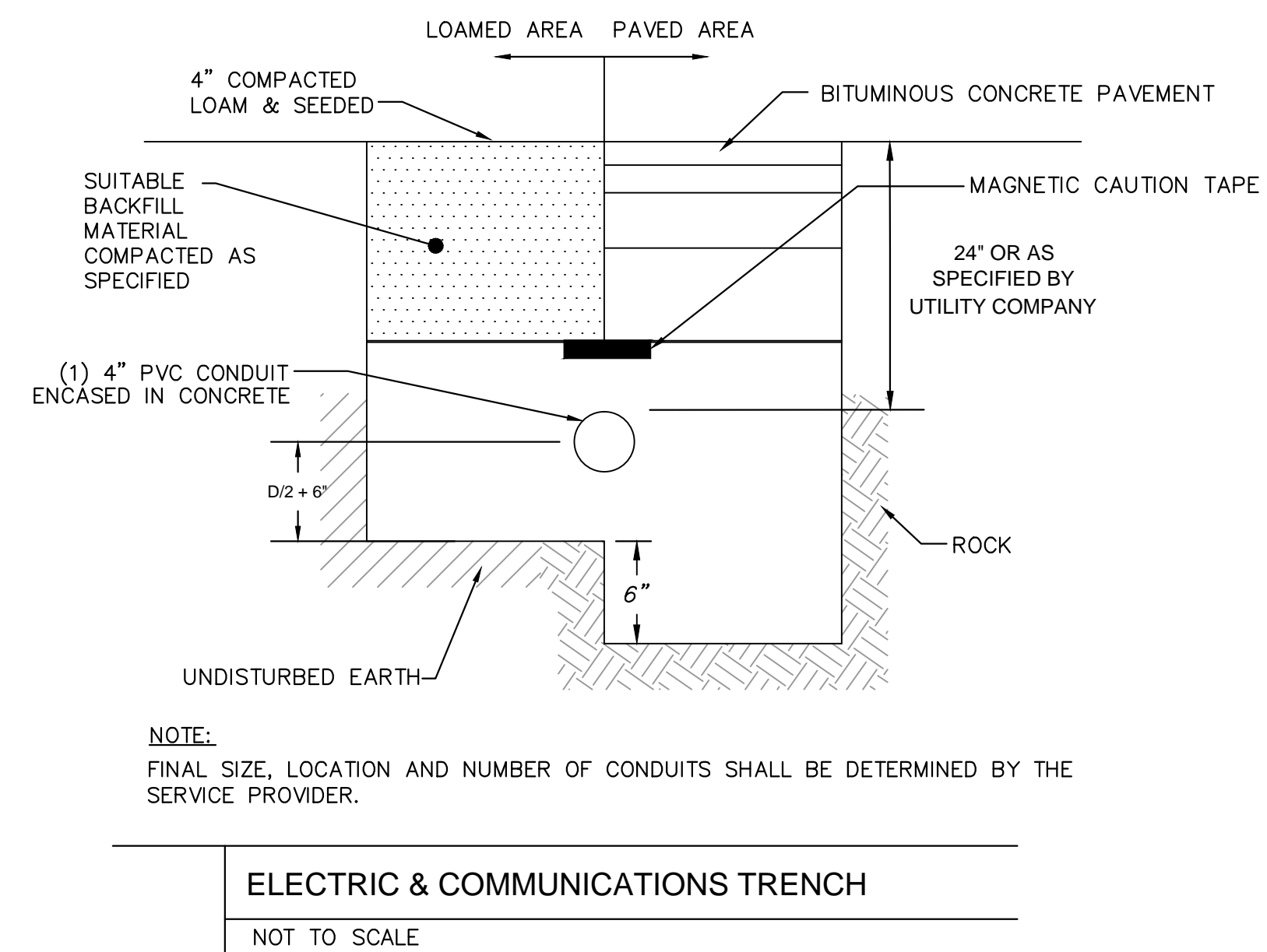
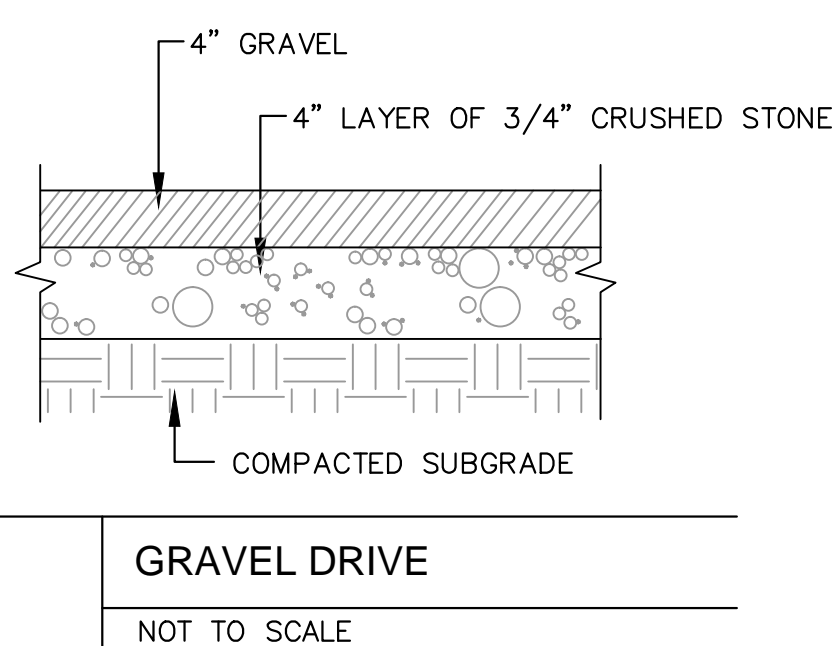
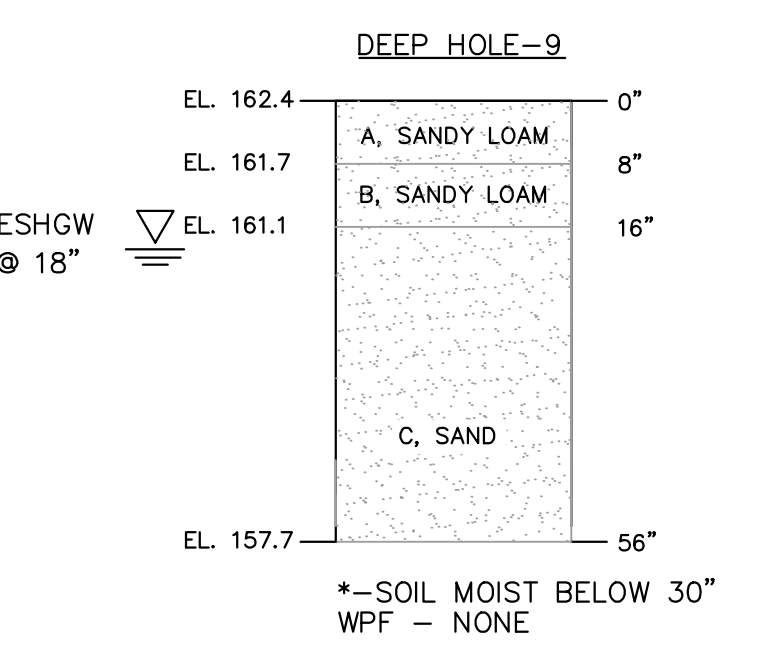
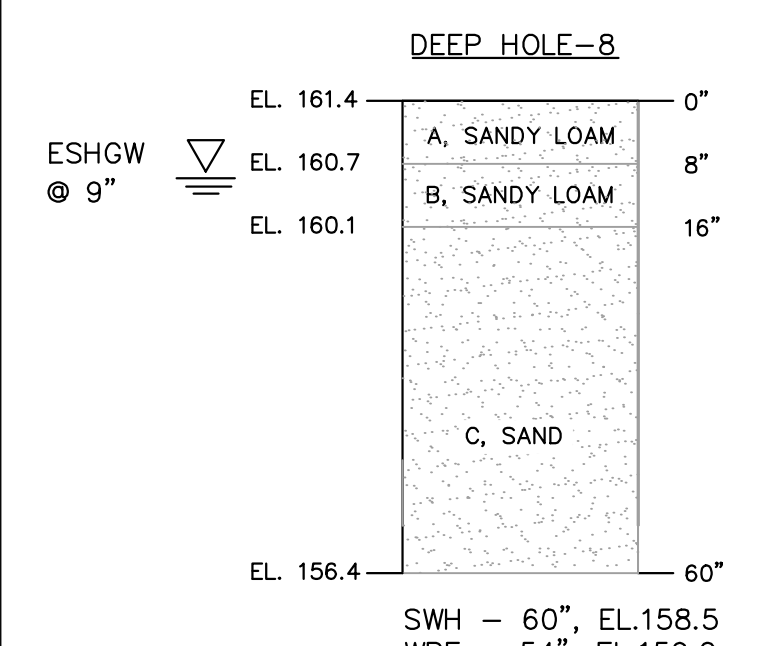
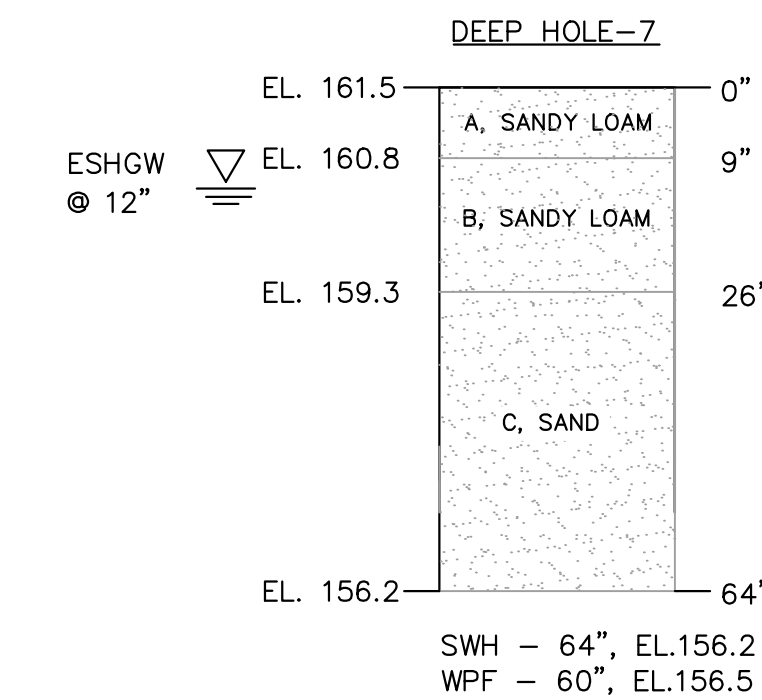
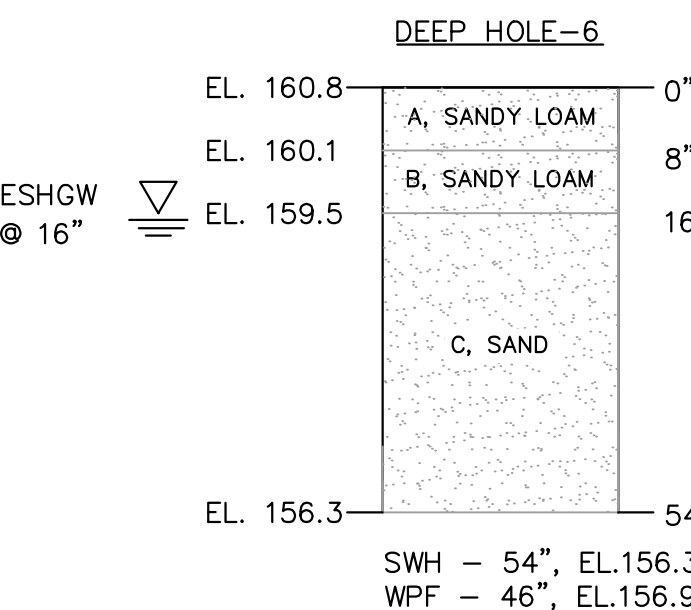
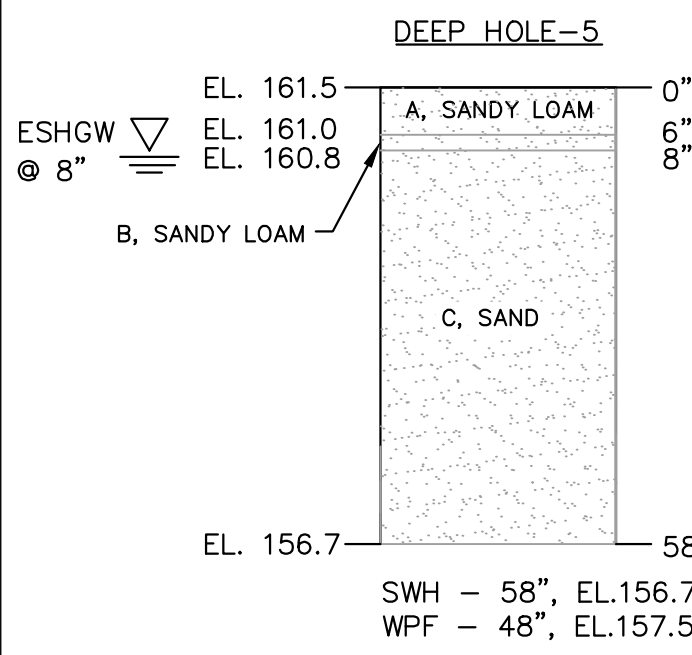
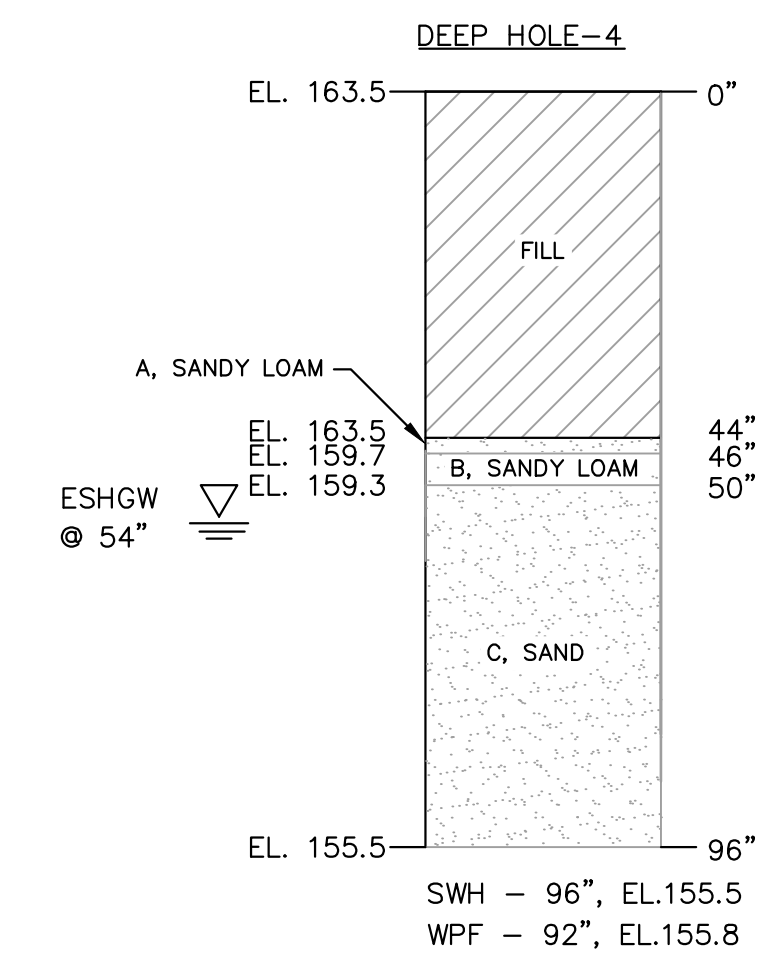
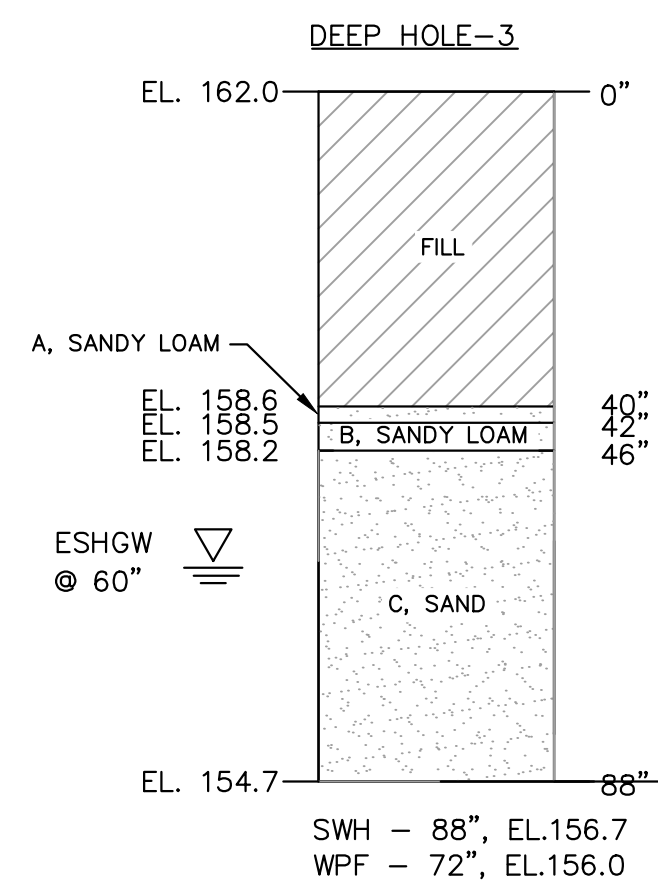
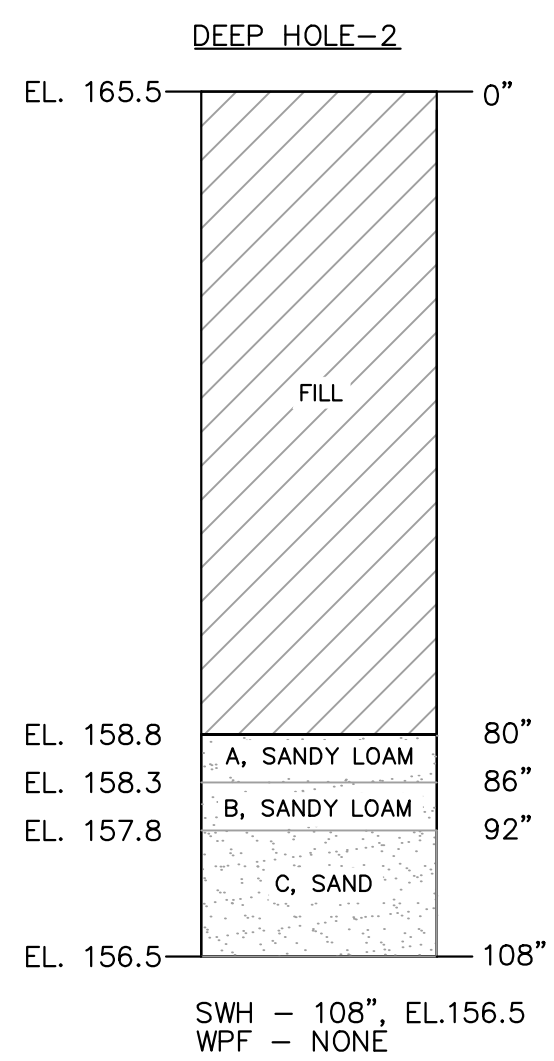
ESHGW= ESTIMATED SEASONAL HIGH GROUNDWATER
WPF= WEeping FROM PIT FACE
SWH= STANDING WATER IN THE HOLE
DOH=DEEP OBSERVATION HOLE

▽ = SEASONAL HIGH GROUNDWATER

* DOH-1 WAS ABANDONED DUE TO WHAT APPEARED TO BE A BURIED FOUNDATION.

* ESHGW IS UNKNOWN IN DOH-2. MOTTLES ARE ABOVE A HORIZON, NOT YET DEFINED IN FILL LAYER.

* DOH-10 WAS ABANDONED DUE TO FILL PRESENT TO A DEPTH OF 8'.

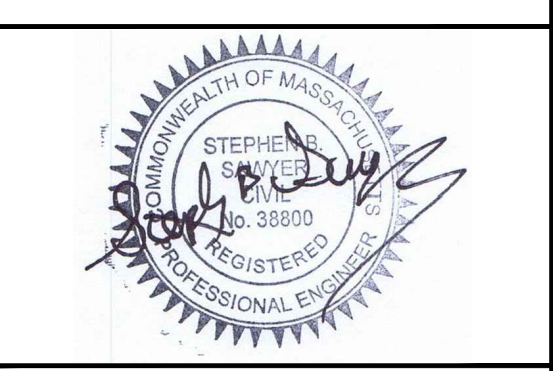


SOIL MIX SPECIFICATIONS
THE SOIL MIX FOR RAIN GARDEN AREAS SHALL BE A MIXTURE OF SAND COMPOST AND SOIL.
0-40% SAND,
0-20-30% TOPSOIL, AND
0-30-40% COMPOST.
THE SOIL MIX MUST BE UNIFORM, FREE OF STONES, STUMPS, ROOTS OR SIMILAR OBJECTS LARGER THAN 2 INCHES. CLAY CONTENT SHOULD NOT EXCEED 5%. SOIL PH SHOULD GENERALLY BE BETWEEN 5.5-6.5, A RANGE THAT IS OPTIMAL FOR MICROBIAL ACTIVITY AND ADSORPTION OF NITROGEN, PHOSPHORUS, AND OTHER POLLUTANTS.
USE SOILS WITH 1.5% TO 3% ORGANIC CONTENT AND MAXIMUM 500-PPM SOLUBLE SALTS. THE SAND COMPONENT SHOULD BE GRAVELLY SAND THAT MEETS ASTM D 422.

~ LOCUS MAP ~
nts

Prepared by:
Design Consultants, Inc.
CIVIL ENGINEERS AND LAND SURVEYORS
120 Middlesex Avenue, Suite 20
Somerville, MA 02145
617-776-3559 617-776-7710

Prepared for:
LODESTAR ENGERY, LLC
3 ELLSWORTH PLACE
SUITE 122
AVON, CT, 06001



Project Title:
CENTAURUS SOLAR
IN
ASHLAND, MA

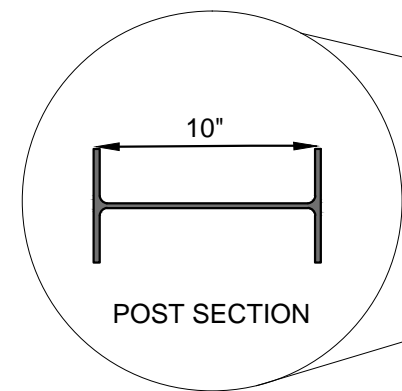
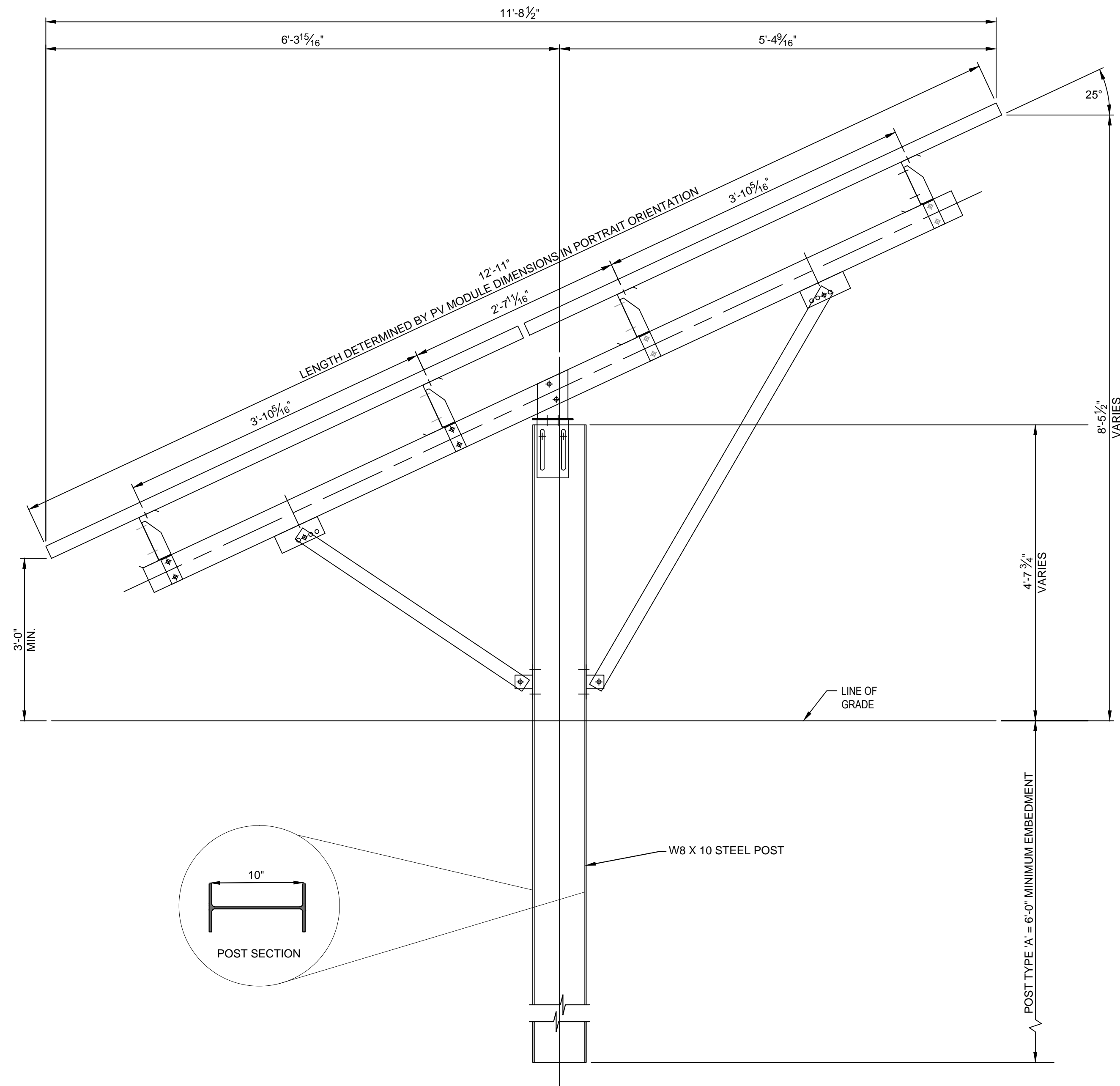
Sheet Title:
SITE DETAILS I

Date:	8-27-2015
Scale:	N.T.S.
Drawn by:	SSW
Checked by:	SBS
Proj. #	2015-017

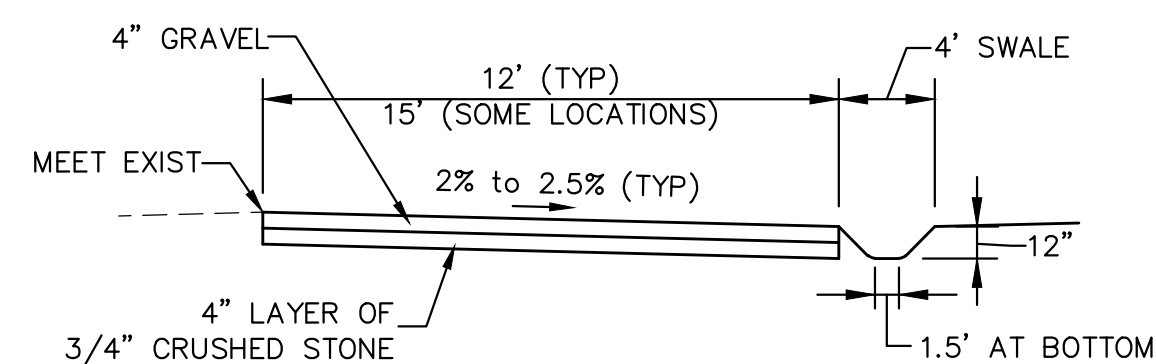
10/22/2015	MOVE FENCE & ADD EASEMENT
10/8/2015	PANELS & DRIVEWAY LAYOUT

DATE: ACTION
SHEET C4.0

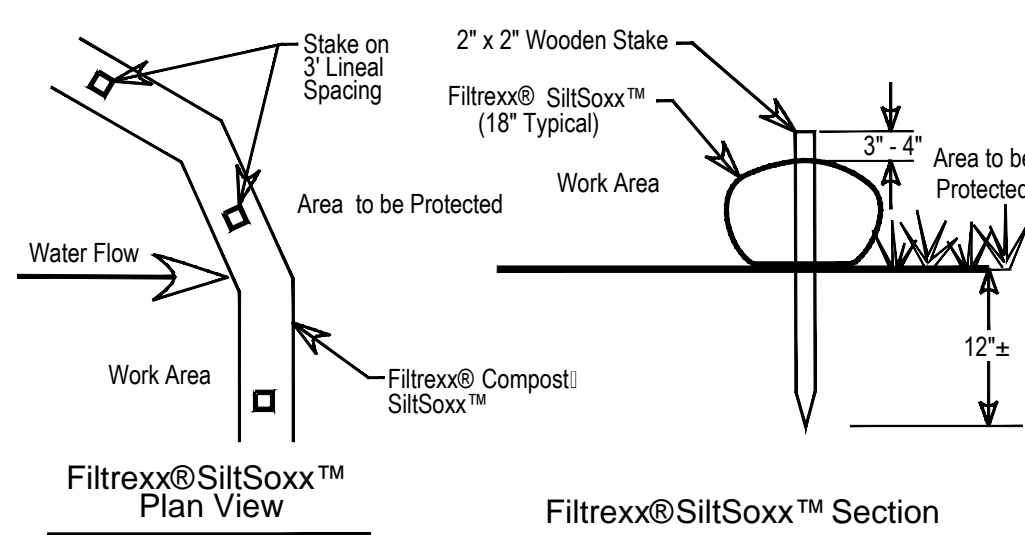
P:\2015 PROJECTS\2015-017 BUTTERFIELD DR. ASHLAND (SOLAR)\ENGINEERING\15-017 C4.0 SITE DETAILS.DWG



SOLAR PANEL AND PILE SUPPORT SECTION
NOT TO SCALE



GRAVEL ACCESS DRIVE
NOT TO SCALE



- Notes:**
1. All material to meet Filtrexx® specifications
 2. SiltSoxx™ compost/soil/rock/seed fill to meet application requirements.
 3. Compost material to be dispersed on site, as determined by Engineer.

Filtrexx@SiltSoxx™

EROSION CONTROL SILT SOCK
NOT TO SCALE

Common Name	Latin Name	Comments	Quantity	Plant Size	Wetland Status
Steeplebush	Spiraea tomentosa	4 to 6 feet on center, small shrub - plant in clusters along edge and do not surround with larger shrubs	24	2-3'	FACW
Winterberry Holly	Ilex verticillata	Group in 6 or more, 5 to 7 feet on center	18	3-4'	FACW+
Silky Dogwood	Cornus amomum	Plant 8 to 10 feet on center with tubelings planted 3 feet on center to fill in area around and between plants	18	3-4'	FACW
Red-osier Dogwood	Cornus sericea	Plant 8 to 10 feet on center with tubelings planted 3 feet on center to fill in area around and between plants	24	3-4'	FACW+
Silky Dogwood	Cornus amomum	Plant 3 feet on center around larger of same species to create dense clusters	110*	tubelings	FACW
Red-osier Dogwood	Cornus sericea	Plant 3 feet on center around larger of same species to create dense clusters	144*	tubelings	FACW+
Pussy Willow	Salix discolor	Plant in groups of 6 or more, 4 to 6 feet on center	30*	Tubelings	FACW

plant size based on availability - sizes based on New England Wetland Plants - typical.

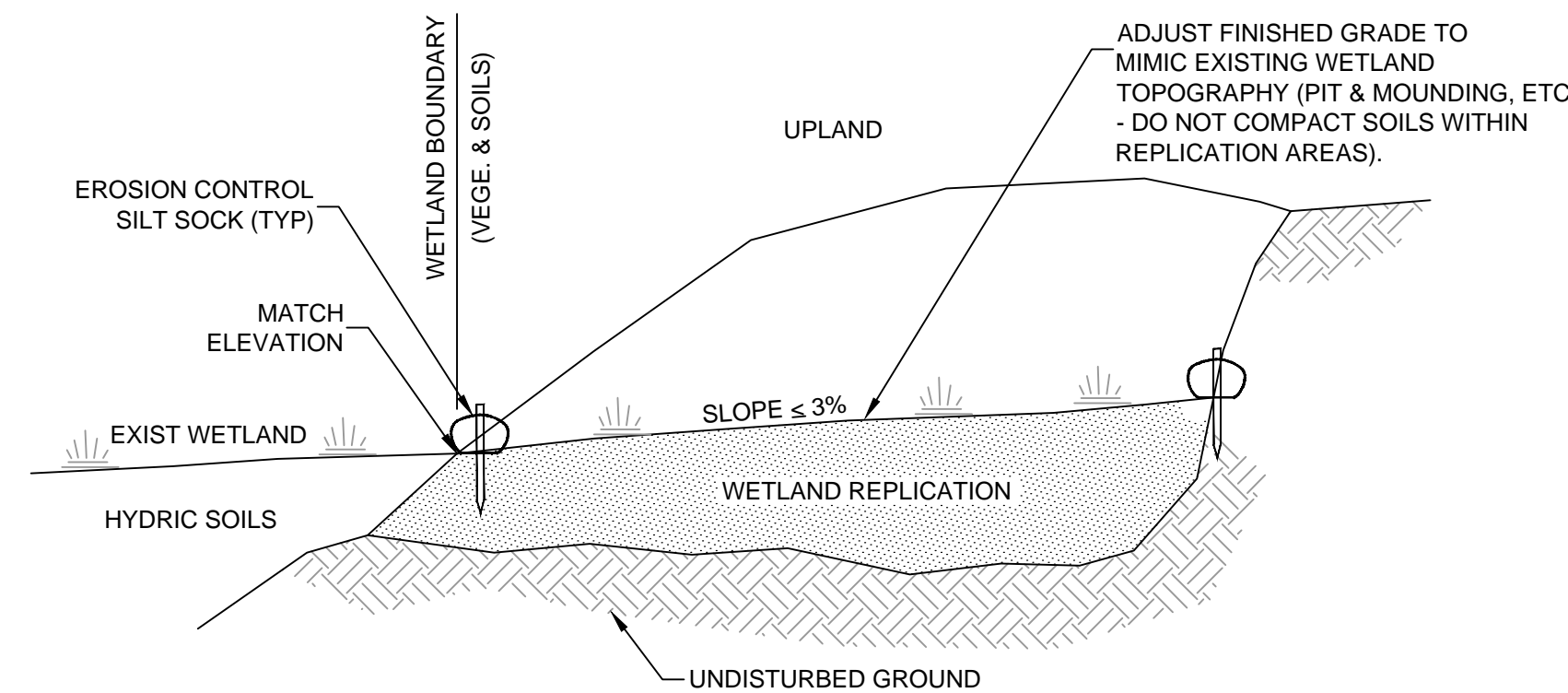
*Actual quantities to plant and purchase are higher, - available in trays of 38, round up for ordering purposes

BVW restoration area**

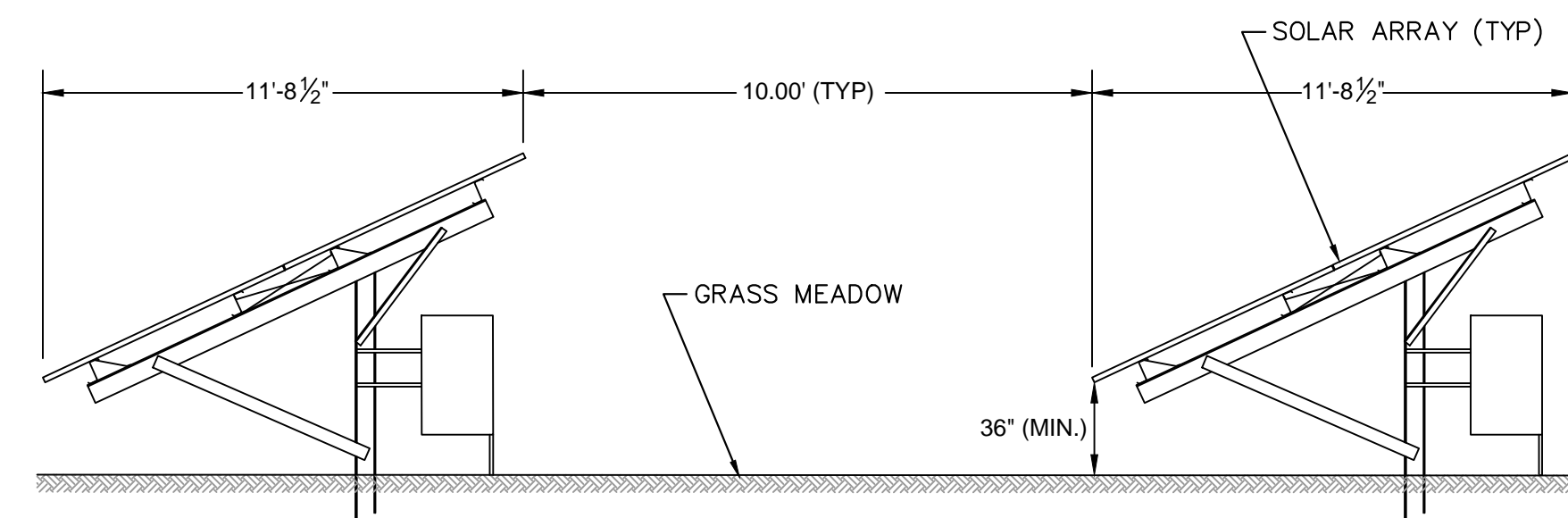
**Species and sizes may be adjusted based on plant availability

NOTES:

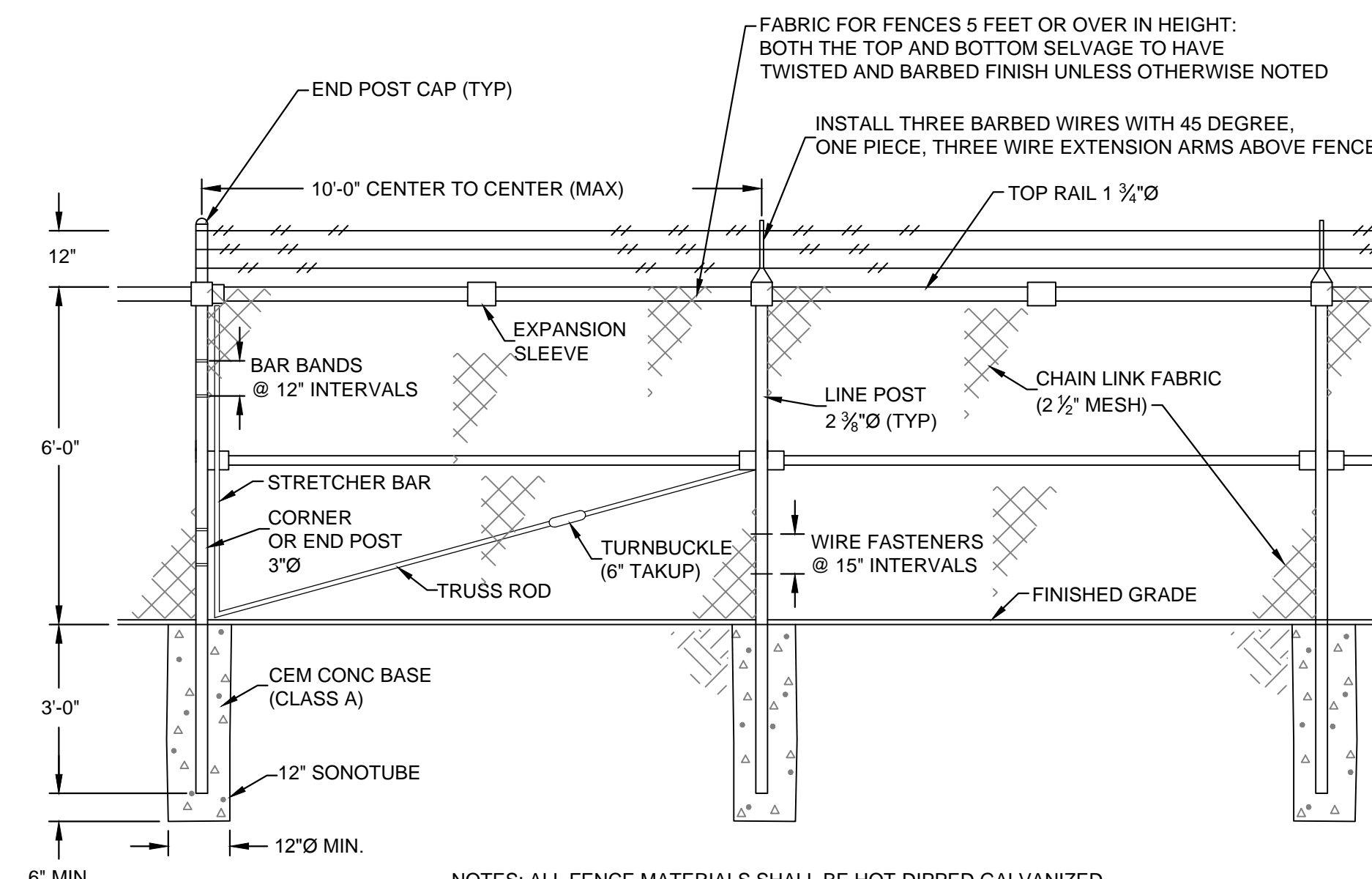
Excavate to match surrounding BVW elevation. If original wetland soil is not encountered, overexcavate 12 inches and use rich organic soil or soil/weed free compost mix to bring area to grade. Grades to be adjusted and plants located under the supervision of wetland scientist.
Mulch area after planting with leaf litter or leafy compost. Scatter woody debris amongst plants as directed by wetland scientist.



WETLAND REPLICATION CONSTRUCTION
NOT TO SCALE



SOLOAR ARRAY SPACING & RACKING
NOT TO SCALE



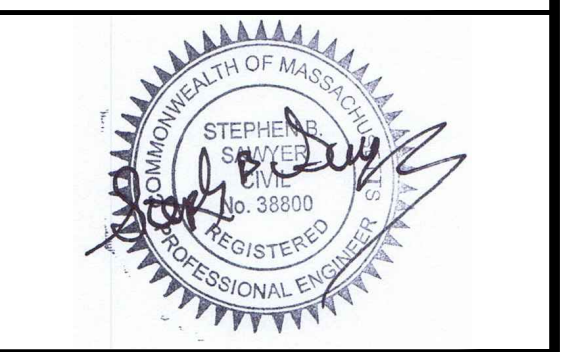
NOTES: ALL FENCE MATERIALS SHALL BE HOT-DIPPED GALVANIZED

CHAIN LINK FENCE
NOT TO SCALE

~ LOCUS MAP ~
N/S



Prepared for:
LODESTAR ENGERY, LLC
3 ELLSWORTH PLACE
SUITE 122
AVON, CT, 06001



Project Title:
CENTAURUS SOLAR
IN
ASHLAND, MA

Sheet Title:
SITE DETAILS II

Date:	9-14-2015
Scale:	N.T.S.
Drawn by:	SSW
Checked by:	SBS
Proj. #	2015-017

10/22/2015	MOVE FENCE & ADD EASEMENT
10/8/2015	PANELS & DRIVEWAY LAYOUT

DATE: ACTION

SHEET
C4.1