AP 304 LOT 27.1 AP 304 LOT 28 NARYA LLC MOO COW LLC 574 GRAVELLY HILL ROAD 40 BANK STREET SOUTH KINGSTON, RI 02879 COVENTRY, RI 02816





# **MOO COW SOLAR** PRELIMINARY PLAN APPLICATION

**PROPERTY**:

2446 VICTORY HIGHWAY COVENTRY, RHODE ISLAND AP 304, LOTS 27.1 AND 28

# **PROPERTY OWNERS**

# **PREPARED FOR:**

EDPR NA DISTRIBUTED GENERATION LLC 100 PARK AVE, SUITE 2400 NEW YORK, NEW YORK 10017 (203) 482-7817

> FEBRUARY 1, 2024 **REVISED: APRIL 24, 2024**

# PREPARED BY:



EAST PROVIDENCE, RHODE ISLAND 02915 401-434-5560

# FOR PERMITTING ONLY

"SOLAR GROUND MOUNT SYSTEM AT COVENTRY - MOO COW" PREPARED BY PURE POWER ENGINEERING, DATED 01/31/2024

BASE PLAN: "PROPERTY & TOPOGRAPHIC SURVEY", DATED

03/06/23, LAST REVISED 03/31/23

-	COVER				
N-1	NOTES				
SO-1	SITE OVERVIEW				
C-1	LAYOUT AND MATERIALS				
C-2	LAYOUT AND MATERIALS				
C-3	GRADING AND DRAINAGE				
C-4	GRADING AND DRAINAGE				
C-5	EROSION AND SEDIMENT CONTROL				
C-6	EROSION AND SEDIMENT CONTROL				
D-1	DETAILS				
D-2	DETAILS				
D-3	DETAILS				
D-4	DETAILS				
L-1	LANDSCAPE PLAN				
L-2	LANDSCAPE PLAN				
L-3	LANDSCAPE DETAILS				
L-4	LANDSCAPE DETAILS				
ATTACHMENTS					

## **DRAWING INDEX**

Sheet Title

Sheet Number



- 1. BASE PLAN: "PROPERTY & TOPOGRAPHIC SURVEY", DATED MARCH 6, 2023, REVISED MARCH 31, 2023, DESIGN PROFESSIONALS, INC.
- 1.1. MAP SHOWING PROPOSED DIVISION OF LAND OF VICTORY HIGHWAY IN THE TOWN OF COVENTRY, RHODE ISLAND OWNED BY WILLIS & SHIRLEY DOROTHY SCALE: 1" = 100' DATE: SEPTEMBER 8, 1996 PREPARED BY THE COVENTRY SURVEY COMPANY, INC
- 1.2. BOUNDARY SURVEY OF ASSESSOR'S PLAT 304 LOT 27.1 VICTORY HIGHWAY COVENTRY RHODE ISLAND PREPARED FOR
- FRANK DOROTHY SCALE: 1" = 100' DATE: MARCH 9, 2020 SHEET 1 OF 1 PREPARED BY SCITUATE SURVEYS. INC. 1.3. BATON REVOCABLE TRUST A.P. 20 LOT 10-1 22 VICTORY HIGHWAY WEST GREENWICH. RHODE ISLAND GD WEST GREENWICH VICTORY 1, LLC GREEN DEVELOPMENT ALTA/ACSM LAND TITLE SURVEY SHEET 1 OF 2 DATE: SEPTEMBER
- 2019 SCALE 1" = 100' PREPARED BY NATIONAL SURVEYORS-DEVELOPERS INC. 1.4. FINAL PLAN SUBDIVISION BATON WOODS EXISTING SITE PLAN DATE: MARCH 2008 SCALE: 1"=100' SHEET 2 OF 5 PREPARED BY OCEAN STATE PLANNERS, INC.
- 1.5. CONCEPTUAL SITE PLAN HIDDEN VALLEY LOCATION VICTORY HIGHWAY (ROUTE 102) COVENTRY, RHODE ISLAND PREPARED FOR: UNIVERSAL REALTY, LLC SCALE: 1" = 150' DATE: JAN 18 2001 PREPARED BY MARTINIQUE DESIGNS. 1.6. FOSTER-COVENTRY WEST GREENWICH-EXETER VICTORY HIGHWAY PLAINFIELD PIKE TO NOOSENECK HILL ROAD. 43
- SHEETS NO. 24 & 25 SCALE 40 FEET PER INCH PLAT NO. 187. RHODE ISLAND DEPARTMENT OF TRANSPORTATION. THE VERTICAL DATUM SHOWN HEREON REFERENCES NAVD88. IN FEET. THE HORIZONTAL DATUM SHOWN HEREON REFERENCES NAD83 RHODE ISLAND STATE PLANE, IN US SURVEY FEET.
- 3. ENGINEER'S ENDORSEMENT IS FOR PERMITTING PURPOSES ONLY. PLANS NOT INTENDED FOR CONSTRUCTION.
- WETLANDS WERE DELINEATED BY ESI IN APRIL AND MAY 2022, AND VERIFIED BY TRC COMPANIES IN NOVEMBER 2022. FINAL WETLAND DELINEATION REPORT DATED JANUARY 2023. WETLAND EDGES WERE VERIFIED BY RIDEM IN A LETTER DATED JULY 14. 2023.
- 5. THE SITE IS NOT LOCATED WITHIN A RHODE ISLAND DEPARTMENT OF ENVIRONMENTAL MANAGEMENT NATURAL HERITAGE AREA ACCORDING TO THE RHODE ISLAND ONLINE GIS MAP LAST UPDATED MARCH 2023.
- 6. SITE IS NOT LOCATED WITHIN A SPECIAL FLOOD HAZARD AREA (SFHA) ZONE, ACCORDING TO FEMA FIRM PANEL 44003C0090J (EFFECTIVE JULY 19, 2023)
- 7. SITE IS NOT LOCATED WITHIN A GROUNDWATER RECHARGE OR WELLHEAD PROTECTION AREA ACCORDING TO THE TOWN OF COVENTRY, RHODE ISLAND ONLINE GIS MAP.
- 8. THESE PLANS FOLLOW THE COVENTRY ZONING BOARD OF REVIEW'S CONDITIONS OF APPROVAL AS DESCRIBED IN THEIR RECORD OF DECISION ON APPLICATION FOR SPECIAL USE PERMIT, RATIFIED AUGUST 2, 2023.
- 9. THE APPLICANT IS PROPOSING TO INSTALL SOLAR PANELS WITHIN 62 FEET OF THE PROPERTY LINE BOUNDARY. THE APPLICANT IS REQUESTING A ZONING VARIANCE UNDER THE COVENTRY ZONING ORDINANCE TO ALLOW FOR INSTALLATION OF PANELS WITHIN THE 85-FOOT SIDE YARD SETBACK.

DOCUMENT USE:

- THESE PLANS AND THE CORRESPONDING CAD DOCUMENTS ARE INSTRUMENTS OF PROFESSIONAL SERVICE PREPARED BY TRC COMPANIES AND SHALL NOT BE USED IN WHOLE OR IN PART. FOR ANY PURPOSE OTHER THAN FOR WHICH IT WAS CREATED WITHOUT THE EXPRESSED WRITTEN CONSENT OF TRC COMPANIES. ANY UNAUTHORIZED USE. REUSE. MODIFICATION, OR ALTERATION, INCLUDING AUTOMATED CONVERSION OF THIS DOCUMENT, SHALL BE AT THE USER'S SOLE RISK WITHOUT LIABILITY OR LEGAL EXPOSURE TO TRC COMPANIES.
- 2. CONTRACTOR SHALL NOT RELY SOLELY ON ELECTRONIC VERSIONS OF PLANS, SPECIFICATIONS, OR DATA FILES THAT ARE OBTAINED FROM THE DESIGNERS OR OWNER, BUT SHALL VERIFY LOCATIONS OF PROJECT FEATURES IN ACCORDANCE WITH THE PAPER COPIES OF THE PLANS AND SPECIFICATIONS THAT ARE SUPPLIED AS PART OF THE CONTRACT DOCUMENTS.
- SYMBOLS AND LEGENDS OF PROJECT FEATURES ARE GRAPHIC REPRESENTATIONS, AND ARE NOT NECESSARILY SCALED TO THEIR ACTUAL DIMENSIONS OR LOCATIONS ON THE DRAWINGS THE CONTRACTOR SHALL REFER TO THE DETAIL SHEET. DIMENSIONS, MANUFACTURER'S LITERATURE, SHOP DRAWINGS, AND FIELD MEASUREMENTS OF SUPPLIED PRODUCTS FOR LAYOUT OF THE PROJECT FEATURES.

CONSTRUCTION NOTES:

- 1. NO CHANGES ARE TO BE MADE UNLESS AUTHORIZED BY THE OWNER.
- 2. THE CONTRACTOR IS RESPONSIBLE FOR REVIEWING, UNDERSTANDING, AND COMPLYING WITH ALL APPLICABLE FEDERAL, STATE, AND LOCAL SAFETY CODES, REGULATIONS, LEGAL REQUIREMENTS, PERMIT CONDITIONS, ETC.
- 3. ALL PRODUCTS TO BE INSTALLED PER MANUFACTURER'S OR DISTRIBUTOR'S INSTRUCTIONS. NOTIFY ENGINEER OF DISCREPANCIES PRIOR TO INSTALLATION.
- UNLESS OTHERWISE NOTED, ALL WORK SHALL CONFORM TO RIDOT'S STANDARD SPECIFICATIONS FOR ROAD AND BRIDGE CONSTRUCTION, 2004 EDITION AMENDED 2018, WITH ALL REVISIONS AND R.I. STANDARD DETAILS, 1998 EDITION, WITH ALL REVISIONS
- . REFER TO CONSTRUCTION RECOMMENDATIONS INCLUDED IN THE "GEOTECHNICAL REPORT" PREPARED BY TRC, DRAFT DATED JULY 2023.
- THE CONTRACTOR SHALL TAKE ADEQUATE PRECAUTIONS TO PROTECT ALL WALKS, STREETS, PAVEMENTS, HIGHWAY GUARDS, CURBING, EDGING, TREES AND PLANTINGS, ETC. ON OR OFF THE PREMISES, AND SHALL REPAIR AND REPLACE OR OTHERWISE MAKE GOOD AT THE CONTRACTOR'S EXPENSE ANY ITEMS DAMAGED AS A RESULT OF THE CONTRACTOR'S WORK.
- IN THE EVENT THAT SUSPECTED CONTAMINATED SOIL, SEDIMENT, GROUNDWATER, OR OTHER MEDIA ARE ENCOUNTERED DURING EXCAVATION AND CONSTRUCTION ACTIVITIES BASED ON VISUAL, OLFACTORY, OR OTHER EVIDENCE, THE CONTRACTOR SHALL STOP WORK IN THE VICINITY OF THE SUSPECT MATERIAL AND SHALL NOTIFY THE OWNER AND TOWN IMMEDIATELY SO THAT THE APPROPRIATE TESTING AND SUBSEQUENT ACTION CAN BE TAKEN.
- THE CONTRACTOR SHALL REMOVE AND DISPOSE OF ALL EXISTING AND GENERATED RUBBLE, DEBRIS AND OTHER DELETERIOUS MATERIAL IN ACCORDANCE WITH THE SPECIFICATIONS AND ALL APPLICABLE CODES AND REGULATIONS.
- THE CONTRACTOR SHALL MAINTAIN THE PROJECT SITE IN A SAFE AND CLEAN CONDITION FOR THE DURATION OF CONSTRUCTION.
- 10. CONTRACTOR SHALL BE RESPONSIBLE FOR SITE SECURITY AND JOB SAFETY. CONSTRUCTION ACTIVITIES SHALL BE IN ACCORDANCE WITH OSHA STANDARDS AND LOCAL REQUIREMENTS
- UPON AWARD OF CONTRACT, CONTRACTOR SHALL MAKE NECESSARY CONSTRUCTION NOTIFICATIONS AND APPLY FOR AND OBTAIN NECESSARY PERMITS, PAY FEES, AND POST BONDS ASSOCIATED WITH THE WORK INDICATED ON THE DRAWINGS, IN THE SPECIFICATIONS, AND IN THE CONTRACT DOCUMENTS. CONTRACTOR SHALL NOT CLOSE OR OBSTRUCT ROADWAYS, SIDEWALKS OR FIRE HYDRANTS WITHOUT APPROPRIATE PERMITS
- 12. AREAS OUTSIDE THE LIMITS OF THE PROPOSED WORK DISTURBED BY THE CONTRACTOR'S OPERATIONS SHALL BE RESTORED BY THE CONTRACTOR TO THEIR ORIGINAL CONDITION AT THE CONTRACTOR'S EXPENSE AND NO ADDITIONAL COST TO THE OWNER.
- 13. DAMAGE RESULTING FROM CONSTRUCTION LOADS SHALL BE REPAIRED BY THE CONTRACTOR AT THE CONTRACTOR'S EXPENSE AND NO ADDITIONAL COST TO THE OWNER.
- 14. THE CONTRACTOR SHALL USE DESIGNATED LOCATIONS WITHIN THE ESTABLISHED LIMITS OF DISTURBANCE TO ACCESS THE SITE.
- UTILITIES NOTES:
- 1. THE CONTRACTOR SHALL CALL "DIG SAFE" AT 1-888-344-7233 AT LEAST 72 HOURS PRIOR TO EXCAVATION.
- THE CONTRACTOR SHALL NOTIFY ALL APPROPRIATE AGENCIES AND UTILITY COMPANIES, IN WRITING, A MINIMUM OF 72 HOURS PRIOR TO ANY CONSTRUCTION WITHIN 15 FEET OF A UTILITY LINE.
- EXISTING UNDERGROUND UTILITIES SHOWN ARE APPROXIMATE. ADDITIONAL UTILITIES MAY EXIST THAT ARE NOT SHOWN. THE CONTRACTOR SHALL VERIFY THE LOCATIONS OF ALL EXISTING DRAINAGE AND UTILITIES BOTH UNDERGROUND AND OVERHEAD BEFORE EXCAVATION BEGINS. IT IS THE CONTRACTOR'S RESPONSIBILITY TO CONTACT DIGSAFE. NOTIFY ALL NON-MEMBER UTILITY COMPANIES AND ENSURE THAT ALL UTILITIES HAVE BEEN MARKED PRIOR TO COMMENCING WORK. ANY DAMAGE TO EXISTING UTILITIES MARKED IN THE FIELD, OR AS A RESULT OF FAILING TO CONTACT THE APPROPRIATE UTILITY COMPANY, SHALL BE REPAIRED OR REPLACED AT NO ADDITIONAL COST TO THE OWNER.
- BEFORE STARTING CONSTRUCTION, THE CONTRACTOR SHALL BE SOLELY RESPONSIBLE FOR MAKING ALL NECESSARY ARRANGEMENTS AND FOR PERFORMING ANY NECESSARY WORK INVOLVED IN CONNECTION WITH THE DISCONTINUANCE OR JURISDICTION OF THE UTILITY COMPANIES, SUCH AS ELECTRICITY, TELEPHONE, WATER, GAS AND ANY SYSTEM OR SYSTEMS WHICH WILL BE AFFECTED BY THE WORK TO BE PERFORMED UNDER THIS CONTRACT.



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- 6. IF REQUIRED, OVERHEAD LINES SHALL BE RELOCATED BY THE UTILITY COMPANY AT THE CONTRACTOR'S EXPENSE
- TO THE ENGINEER FOR RESOLUTION OF THE CONFLICT.
- 8. THE CONTRACTOR SHALL EXERCISE EXTREME CARE WHEN EXCAVATING NEAR AND BACKFILLING IN THE VICINITY OF EXISTING UTILITIES, INCLUDING THE USE OF HAND EXCAVATION WHERE APPROPRIATE.
- STORMWATER DETENTION BASIN (INFILTRATION BASIN) NOTES:
- STRIPPED OF PLANTABLE SOIL. ALL TREES, VEGETATION, ROOTS AND OTHER OBJECTIONABLE MATERIAL SHALL BE MATERIAI
- 2. ALL WORK ON PERMANENT DETENTION BASIN STRUCTURES SHALL BE CARRIED OUT IN AREAS FREE FROM WATER. THE DIVERSION SWALES AS NECESSARY TO PROTECT THE AREAS TO BE OCCUPIED BY THE DETENTION BASINS.
- THE CONTRACTOR SHALL ALSO FURNISH, INSTALL, OPERATE, AND MAINTAIN ALL NECESSARY PUMPING AND OTHER EQUIPMENT REQUIRED FOR REMOVAL OF WATER FROM VARIOUS PARTS OF THE WORK AND FOR MAINTAINING THE EXCAVATIONS, FOUNDATION, AND OTHER PARTS OF THE WORK FREE FROM WATER AS REQUIRED OR DIRECTED BY THE ENGINEER FOR CONSTRUCTING EACH PART OF THE WORK. AFTER HAVING SERVED THEIR PURPOSE, ALL TEMPORARY IN ANY DEGREE WHATSOEVER OF THE FLOW OF WATER TO THE SPILLWAY OR OUTLET WORKS AND SO AS NOT TO REQUIRED EXCAVATION AND THE FOUNDATION SHALL BE ACCOMPLISHED IN A MANNER AND TO THE EXTENT THAT WILL EXCAVATION AT SUCH LOCATIONS WHICH MAY REQUIRE DRAINING THE WATER SUMPS FROM WHICH THE WATER SHALL BE PUMPED
- 4. ALL EXCAVATED AREAS SHALL BE GRADED TO PROVIDE PROPER DRAINAGE AND LEFT IN A SIGHTLY CONDITION. ALL SEEDING, LIMING, FERTILIZING AND MULCHING.
- BACKFILL ADJACENT TO PIPES OR STRUCTURES SHALL BE OF THE TYPE AND QUALITY CONFORMING TO THAT SPECIFIED FOR THE ADJOINING FILL MATERIAL. THE FILL SHALL BE PLACED IN HORIZONTAL LAYERS NOT TO EXCEED FOUR INCHES IN NEEDS TO FILL COMPLETELY ALL SPACES UNDER AND ADJACENT TO THE PIPE. AT NO TIME DURING THE BACKFILLING STRUCTURE OR PIPE, UNLESS THERE IS A COMPACTED FILL OF 24 INCHES OR GREATER OVER THE STRUCTURE OR PIPE. LAYERS NOT TO EXCEED 4 INCHES IN THICKNESS AND COMPACTED BY HAND TAMPERS OR OTHER MANUALLY DIRECTED FEET, MEASURED HORIZONTALLY, TO ANY PART OF A STRUCTURE. UNDER NO CIRCUMSTANCES SHALL EQUIPMENT BE MATERIALS.
- 6. FILL MATERIAL THE FILL MATERIAL SHALL BE TAKEN FROM APPROVED DESIGNATED BORROW AREAS. IT SHALL BE FREE OF QUALITY REQUIRED TO PREVENT EROSION OF THE EMBANKMENT.
- INTO THE EMBANKMENT.
- 8. COMPACTION THE MOVEMENT OF THE HAULING AND SPREADING EQUIPMENT OVER THE FILL SHALL BE CONTROLLED SO THAT THE ENTIRE SURFACE OF EACH LIFT SHALL BE TRAVERSED BY NOT LESS THAN ONE TREAD TRACK OF HEAVY DENSITY WITH A MOISTURE CONTENT WITHIN 2% OF THE OPTIMUM. EACH LAYER OF FILL SHALL BE COMPACTED AS NECESSARY TO OBTAIN THAT DENSITY. AND IS TO BE CERTIFIED BY THE ENGINEER AT THE TIME OF CONSTRUCTION. ALL COMPACTION IS TO BE DETERMINED BY AASHTO METHOD T-99 (STANDARD PROCTOR).

**EROSION & SEDIMENTATION CONTROL NOTES:** 

- THE SESC PLAN REMAINS COMPLIANT WITH THE RIPDES CONSTRUCTION GENERAL PERMIT.
- PARTY DESIGNATED SITE INSPECTOR
- RIGHT OF WAYS AT THE END OF EACH DAY.
- 4. TEMPORARY CONSTRUCTION ENTRANCE SHALL BE INSTALLED PRIOR TO THE START OF CONSTRUCTION. THE ENTRANCE SHALL BE APPROXIMATELY 50 FEET LONG. AND SHALL BE MADE OF CRUSHED STONE CONSISTENT WITH RIDOT MATERIAL OF THE PROPOSED SITE ENTRANCE. THE CONSTRUCTION ENTRANCE SHALL BE MAINTAINED BY THE CONTRACTOR IN A TIRES AT THESE LOCATIONS PRIOR TO VEHICLES LEAVING THE SITE.
- 5. PERIMETER SOIL AND EROSION CONTROLS SHALL BE PLACED PRIOR TO ANY CONSTRUCTION ACTIVITIES. CONTRACTOR TO SOIL AND EROSION CONTROLS SHALL BE CHECKED AND REPAIRED AS NECESSARY.
- THE TIME EARTH DISTURBANCE HAS BEGUN.
- HEALTHY VEGETATION, PROMOTE SOIL STABILIZATION, AND INCREASE STORMWATER INFILTRATION RATES.
- 8. INITIATE APPROPRIATE TEMPORARY OR PERMANENT STABILIZATION PRACTICES ON ALL DISTURBED AREAS AS SOON AS OR PERMANENTLY CEASED. ANY DISTURBED AREA THAT WILL NOT HAVE ACTIVE CONSTRUCTION ACTIVITY OCCURRING WITHIN 14 DAYS MUST BE STABILIZED IN ACCORDANCE WITH THE RI SESC HANDBOOK.



5. UNLESS OTHERWISE NOTED OR APPROVED BY THE ENGINEER, THE CONTRACTOR SHALL MAINTAIN ALL EXISTING UTILITIES.

WHERE AN EXISTING UTILITY IS FOUND TO CONFLICT WITH THE PROPOSED WORK, THE LOCATION, ELEVATION AND SIZE OF THE UTILITY SHALL BE ACCURATELY DETERMINED WITHOUT DELAY BY THE CONTRACTOR AND THE INFORMATION FURNISHED

AREAS DESIGNATED FOR BORROW AREAS, EMBANKMENT AND STRUCTURAL WORKS SHALL BE CLEARED, GRUBBED AND REMOVED, ALL GRADED AREAS SHALL BE NO STEEPER THAN 3:1, ALL TREES SHALL BE CLEARED AND GRUBBED WITHIN 15 FEET OF THE TOE OF THE EMBANKMENT, AND WITHIN 25 FEET OF THE PRINCIPAL SPILLWAY OUTLET. AREAS TO BE COVERED BY THE DETENTION BASIN WILL BE CLEARED OF ALL TREES, BRUSH, LOGS, FENCES, RUBBISH AND OTHER OBJECTIONABLE

CONTRACTOR SHALL CONSTRUCT AND MAINTAIN ALL TEMPORARY DIKES, LEVEES, COFFERDAMS, DRAINAGE CHANNELS, AND

PROTECTIVE WORKS SHALL BE REMOVED OR LEVELED AND GRADED TO THE EXTENT REQUIRED TO PREVENT OBSTRUCTION INTERFERE IN ANY WAY WITH THE OPERATION OR MAINTENANCE OF THE STRUCTURE. THE REMOVAL OF WATER FROM THE MAINTAIN STABILITY OF THE EXCAVATED SLOPES AND BOTTOM REQUIRED EXCAVATIONS AND WILL ALLOW SATISFACTORY PERFORMANCE OF ALL CONSTRUCTION OPERATIONS. DURING THE PLACING AND COMPACTING OF MATERIAL IN REQUIRED EXCAVATIONS. THE WATER LEVEL AT THE LOCATIONS BEING REFILLED SHALL BE MAINTAINED BELOW THE BOTTOM OF THE

EXPOSED SURFACES OF THE EMBANKMENT, SPILLWAY, SPOIL AND BORROW AREAS, AND BERMS SHALL BE STABILIZED BY

THICKNESS AND COMPACTED BY HAND TAMPERS OR OTHER MANUALLY DIRECTED COMPACTION FOUIPMENT. THE MATERIAL OPERATION SHALL DRIVEN EQUIPMENT BE ALLOWED TO OPERATE CLOSER THAN FOUR FEET, MEASURED HORIZONTALLY, TO ANY PART OF A STRUCTURE. UNDER NO CIRCUMSTANCES SHALL EQUIPMENT BE DRIVEN OVER ANY PART OF A CONCRETE STRUCTURE BACKEILL MAY BE FLOWABLE FILL MEETING THE REQUIREMENTS OF THE FEDERAL HIGHWAY ADMINISTRATION STANDARDS. THE MIXTURE SHALL HAVE A 100-200 PSI; 28-DAY UNCONFINED COMPRESSIVE STRENGTH. THE FLOWABLE FILL SHALL HAVE A MINIMUM PH OF 4.0 AND A MINIMUM RESISTIVITY OF 2,000 OHM-CM. MATERIAL SHALL BE PLACED SUCH THAT A MINIMUM OF 6 INCHES (MEASURED PERPENDICULAR TO THE OUTSIDE OF THE PIPE) OF FLOWABLE FILL SHALL BE UNDER (BEDDING), OVER AND, ON THE SIDES OF THE PIPE. IT ONLY NEEDS TO EXTEND UP TO THE SPRING LINE FOR RIGID CONDUITS AVERAGE SLUMP OF THE FILL SHALL BE 7 INCHES TO ASSURE FLOWABILITY OF THE MATERIAL. ADEQUATE MEASURES SHALL BE TAKEN (SAND BAGS, ETC.) TO PREVENT FLOATING THE PIPE. ANY ADJOINING SOIL FILL SHALL BE PLACED IN HORIZONTAL COMPACTION EQUIPMENT. THE MATERIAL SHALL COMPLETELY FILL ALL VOIDS ADJACENT TO THE FLOWABLE FILL ZONE. AT NO TIME DURING THE BACKFILLING OPERATION SHALL DRIVEN EQUIPMENT BE ALLOWED TO OPERATE CLOSER THAN FOUR DRIVEN OVER ANY PART OF A STRUCTURE OR PIPE UNLESS THERE IS A COMPACTED FILL OF 24 INCHES OR GREATER OVER THE STRUCTURE OR PIPE. BACKFILL MATERIAL OUTSIDE THE STRUCTURAL BACKFILL (FLOWABLE FILL) ZONE SHALL BE OF THE TYPE AND QUALITY CONFORMING TO THAT SPECIFIED FOR THE CORE OF THE EMBANKMENT OR OTHER EMBANKMENT

ROOTS, STUMPS, WOOD, RUBBISH, STONES GREATER THAN 6 INCHES, FROZEN OR OTHER OBJECTIONABLE MATERIALS. FILL MATERIAL FOR THE CENTER OF THE EMBANKMENT SHALL CONFORM TO THE SPECIFICATIONS PROVIDED ON DRAWING D-4. MATERIALS USED IN THE OUTER SHELL OF THE EMBANKMENT MUST HAVE THE CAPABILITY TO SUPPORT VEGETATION OF THE

7. PLACEMENT - AREAS ON WHICH FILL IS TO BE PLACED SHALL BE SCARIFIED PRIOR TO PLACEMENT OF FILL MATERIALS SHALL BE PLACED IN MAXIMUM 8-INCH THICK (BEFORE COMPACTION) LAYERS WHICH ARE TO BE CONTINUOUS OVER THE ENTIRE LENGTH OF THE FILL. THE MOST PERMEABLE BORROW MATERIAL SHALL BE PLACED IN THE DOWNSTREAM PORTIONS OF THE EMBANKMENT. THE PRINCIPAL SPILLWAY MUST BE INSTALLED CONCURRENTLY WITH FILL PLACEMENT AND NOT EXCAVATED

FOUIPMENT OR COMPACTION SHALL BE ACHIEVED BY A MINIMUM OF FOUR COMPLETE PASSES OF A SHEEPSFOOT, RUBBER TIRED OR VIBRATORY ROLLER. FILL MATERIAL SHALL CONTAIN SUFFICIENT MOISTURE SUCH THAT THE REQUIRED DEGREE OF COMPACTION WILL BE OBTAINED WITH THE EQUIPMENT USED. THE FILL MATERIAL SHALL CONTAIN SUFFICIENT MOISTURE SO THAT IF FORMED INTO A BALL IT WILL NOT CRUMBLE. YET NOT BE SO WET THAT WATER CAN BE SOUFEZED OUT. WHEN REQUIRED BY THE APPROVING AGENCY THE MINIMUM REQUIRED DENSITY SHALL NOT BE LESS THAN 95% OF MAXIMUM DRY

THE CONTRACTOR IS REQUIRED TO REVIEW AND IMPLEMENT THE SOIL EROSION AND SEDIMENT CONTROL (SESC) PLAN THROUGHOUT CONSTRUCTION THE PLAN MUST BE MAINTAINED AT THE SITE. IT IS THE OPERATOR'S RESPONSIBILITY TO MANAGE THE SITE DURING EACH CONSTRUCTION PHASE SO AS TO PREVENT POLLUTANTS FROM LEAVING THE SITE. THIS MAY REQUIRE THE CONTRACTOR TO REVISE AND AMEND THE SESC PLAN DURING CONSTRUCTION TO ADDRESS VARYING SITE AND/OR WEATHER CONDITIONS, SUCH AS BY ADDING OR REALIGNING EROSION OR SEDIMENT CONTROLS TO ENSURE

EROSION CONTROL MEASURES SHALL BE INSTALLED AND MAINTAINED AS SHOWN HEREIN OR AS DIRECTED BY A THIRD

THE CONTRACTOR SHALL BE RESPONSIBLE FOR IMPLEMENTING EROSION CONTROL MEASURES TO PREVENT OFF-SITE TRACKING OF EARTH, SEDIMENT AND DEBRIS. THE CONTRACTOR SHALL REMOVE ANY SEDIMENT TRACKED ONTO PUBLIC

SPECIFICATION M.01.09 TABLE I, COLUMN II. THE WIDTH OF THE CONSTRUCTION ENTRANCE SHALL BE EQUAL TO THE WIDTH CONDITION THAT SHALL PREVENT TRACKING OR FLOWING OF SEDIMENT ONTO ROADS. ALL SEDIMENT SPILLED, DROPPED, WASHED, OR TRACKED ONTO ROADS SHALL BE REMOVED. DURING WET WEATHER, IT MAY BE NECESSARY TO WASH VEHICLE

NOTIFY THE THIRD PARTY DESIGNATED SITE INSPECTOR AT LEAST 48 HOURS PRIOR TO ANY CONSTRUCTION ACTIVITIES. ALL

6. ALL TEMPORARY EROSION, RUNOFF, SEDIMENT, AND POLLUTION PREVENTION CONTROL MEASURES SHALL BE INSTALLED BY

7. EXISTING PLANTABLE SOIL SHALL BE PRESERVED TO THE MAXIMUM EXTENT FEASIBLE AND AS NECESSARY TO SUPPORT

POSSIBLE, BUT NOT MORE THAN FOURTEEN (14) DAYS AFTER THE CONSTRUCTION ACTIVITY IN THE AREA HAS TEMPORARILY

- 9. TEMPORARY STRAW MULCH, WOOD CHIP MULCH, OR TEMPORARY EROSION CONTROL BLANKETS, SHALL BE USED WHERE NON-VEGETATIVE COVER IS REQUIRED FOR A PERIOD GREATER THAN 14 DAYS BUT LESS THAN SIX MONTHS. MULCH SHAL BE SPREAD UNIFORMLY BY HAND OR MACHINE RESULTING IN 100% COVERAGE OF THE DISTURBED SOIL. IF ANCHORING IS NECESSARY, TACKIFIERS AND/OR NETTING EITHER WITH THE MULCH OR IMMEDIATELY FOLLOWING MULCH APPLICATION SHALL BE USED.
- 10. WOOD CHIP MULCH GENERATED ON-SITE MAY BE APPLIED TO SLOPES 3:1 OR FLATTER FOR TEMPORARY EROSION CONTROL WHEN SOIL AND SITE CONDITIONS ARE SUITABLE FOR SPREADING. ALL MULCH MATERIAL SHALL BE CAPABLE OF BEING APPLIED EVENLY SUCH THAT IT PROVIDES 100% INITIAL SOIL COVERAGE AND ADHERES TO THE SOIL SURFACE, DOES NOT SUP ON SUOPES WHEN IT RAINS OR IS WATERED, DOES NOT BLOW OFF SITE AND DISSIPATES RAINDROP SPLASH, SPREAD WOOD CHIP MULCH UNIFORMLY RESULTING IN 100% COVERAGE OF DISTURBED SOIL TO BE STABILIZED. SUGGESTED APPLICATION RATE IS 6 CY/1,000 SQ FT. DO NOT SPREAD WOOD CHIPS ON SLOPES SO THICK THAT IT WILL SLIP OR SLUMP.
- 11. IF SEEDING IS PERFORMED WHERE WOOD CHIPS HAVE BEEN PREVIOUSLY APPLIED, THE WOOD CHIPS SHOULD BE REMOVED OR TILLED INTO THE GROUND AND ADDITIONAL NITROGEN APPLIED PRIOR TO SEEDING. NITROGEN APPLICATION RATE SHALL BE DETERMINED BY SOIL TEST AT TIME OF SEEDING.
- 12. WHERE SOIL PROTECTION FALLS BELOW 100%, REAPPLY SOIL PROTECTION WITHIN 48 HOURS. DETERMINE THE CAUSE OF THE FAILURE. IF FAILURE WAS THE RESULT OF WIND, CONSIDER APPLYING A TACKIFIER OR NETTING. IF FAILURE WAS CAUSED BY CONCENTRATING WATER, INSTALL ADDITIONAL MEASURES TO CONTROL WATER AND SEDIMENT MOVEMENT, REPAIR EROSION DAMAGE, REAPPLY MULCH WITH ANCHORING OR USE TEMPORARY EROSION CONTROL BLANKETS.
- 13. TEMPORARY SEEDING SHALL BE USED WHERE VEGETATIVE COVER IS REQUIRED FOR A PERIOD GREATER THAN ONE MONTH BUT LESS THAN TWELVE MONTHS ON DISTURBED SOIL AREAS. RAPIDLY GROWING ANNUAL GRASSES WILL BE UNIFORMLY APPLIED AT THE RATE ASSOCIATED WITH HYDRAULIC APPLICATION (HYDORSEED) THE SITE SHALL BE CHECKED PERIODICALLY TO ASSESS THE GROWTH OF THE PLANTS. IF SEEDING FAILS TO GROW, THE AREA SHALL BE RE-ESTABLISHED TO PROVIDE ADEQUATE EROSION CONTROL. THE SEED MIXTURE SHALL BE RIDOT TEMPORARY SEED MIX (M18.10.5), OR APPROVED EQUIVALENT.
- 14 EROSION CONTROL MEASURES SHALL BE REMOVED WHEN THE DISTURBED AREA IS STABILIZED OR AS SPECIFIED BY THE ENGINEER. DISTURBED AREA RESULTING FROM THE FILTER SOCK REMOVAL OPERATION SHALL BE PERMANENTLY SEEDED. ALL ACCUMULATED SEDIMENT SHALL BE STOCKPILED FOR LATER REUSE.
- 15. ALL DISTURBED OR UNVEGETATED SOIL SHALL HAVE A MINIMUM OF FOUR INCHES OF LOAM (RIDOT M.18.01) OR PLANTABLE SOIL (RIDOT M.18.02) PLACED BEFORE BEING PERMANENTLY SEEDED AND MULCHED AS APPLICABLE. LOAM OR PLANTABLE SOIL FROM AN OFF SITE BORROW SOURCE SHALL BE SAMPLED AND APPROVED FOR USE PRIOR TO ITS DELIVERY TO THE
- 16. PERMANENT SEEDING SHALL BE APPLIED HYDRAULICALLY. REFER TO THE GENERAL LANDSCAPE AND SEEDING NOTES ON DRAWING L-3. HYDROSEED PRODUCTS APPROVED BY THE ENGINEER SHALL BE APPLIED AS PERMANENT SEEDING PRIOR TO INSTALLING FROSION CONTROL BLANKETS OR TURE REINFORCEMENT MATS. GROUNDWATER SEEPAGE OCCURRING AT CUT SLOPES SHALL BE ADDRESSED PRIOR TO INSTALLING HYDROSEED AND EROSION CONTROL BLANKET/TURF REINFORCEMENT
- 17 PERMANENT SEEDING SHALL BE USED ON AREAS SHOWN AND WHERE PERMANENT VEGETATIVE COVER IS NEEDED TO STABILIZE THE SOIL AND REDUCE EROSION AND SEDIMENTATION. RAPIDLY GROWING ANNUAL GRASSES SHALL BE UNIFORMLY APPLIED AT THE RATE ASSOCIATED WITH HYDRAULIC APPLICATION (HYDROSEEDING). REFER TO THE SEEDING NOTES ON DRAWING L-3 FOR THE SEED MIXTURES TO BE USED FOR PERMANENT STABILIZATION.
- 18. FULL ADVANTAGE SHALL BE TAKEN OF TIME AND WEATHER CONDITIONS BEST SUITED FOR SEEDING. REFER TO THE SEEDING NOTES ON DRAWING L-3 FOR THE NORMAL DATES FOR PERMANENT SEEDING AREAS THAT DO NOT HAVE ADEQUATE VEGETATIVE STABILIZATION BY NOVEMBER 15TH, MUST BE STABILIZED THROUGH THE USE OF NON- VEGETATIVE EROSION CONTROL MEASURES. AREAS SEEDED BETWEEN MAY 31ST AND AUGUST 15TH SHALL BE COVERED WITH STRAW MULCH. DURING THESE MONTHS. TEMPORARY AND PERMANENT SEEDED AREAS SHALL BE MULCHED IMMEDIATELY FOLLOWING SEEDING.
- 19. DUST FROM THE SITE SHALL BE CONTROLLED BY USING COVERED TRUCKS, WETTING EXPOSED SOIL AREAS, SEEDING, INSTALLING WIND SCREENS AND/OR BARRIERS, MINIMIZING UNNECESSARY TRANSFERS AND DISTURBANCES OF EARTH MATERIALS AND ON-GOING CONSTRUCTION CLEAN-UP. SEVERAL APPLICATIONS PER DAY MAY BE NECESSARY DEPENDING UPON WEATHER CONDITIONS AND WORK ACTIVITY. DUST CONTROL TREATMENT AGENTS SHALL NOT BE APPLIED.
- 20. CARE SHOULD BE TAKEN TO THE BEST OF THE OPERATOR'S ABILITY TO AVOID DISTURBING LARGE AREAS PRIOR TO ANTICIPATED PRECIPITATION EVENTS. AT A MINIMUM, STORM EVENTS MUST BE MONITORED AND TRACKED IN ORDER TO DETERMINE WHEN POST-STORM EVENT INSPECTIONS MUST BE CONDUCTED.
- 21. INSPECTIONS OF EROSION CONTROLS SHALL BE CONDUCTED BY QUALIFIED PERSONNEL, AS DESIGNATED BY THE RIPDES CGP, RETAINED BY AND REPORTING TO EDPR NA DISTRIBUTED, LLC. (THIRD PARTY DESIGNATED SITE INSPECTOR). INSPECTIONS OF EROSION CONTROLS MUST BE DOCUMENTED AT LEAST ONCE EVERY SEVEN (7) CALENDAR DAYS AND WITHIN TWENTY-FOUR (24) HOURS AFTER ANY STORM EVENT, WHICH GENERATES AT LEAST 0.25 INCHES OF RAINFALL PER TWENTY-FOUR (24) HOUR PERIOD AND/OR AFTER A SIGNIFICANT AMOUNT OF RUNOFF OR SNOWMELT. ALL DAMAGED EROSION CONTROLS SHALL BE REPLACED. ACCUMULATED SEDIMENT SHALL BE STOCKPILED FOR LATER REUSE.
- 22. FILL MATERIAL SHALL BE FREE OF STUMPS, WOODS, ROOTS, AND OTHER DELETERIOUS MATERIAL.
- 23. SOIL AND MATERIAL STOCKPILES SHALL BE LOCATED AND MANAGED AS SHOWN HEREIN, AND AS SPECIFIED BY THE ENGINEER. ALL SOIL STOCKPILES SHALL BE SURROUNDED BY EROSION CONTROL BARRIERS REGARDLESS OF THEIR DURATION OF EXPOSURE UNTIL SUCH TIME AS THE MATERIAL IS RESPREAD AND STABILIZED OR TRANSPORTED OFF SITE. STOCKPILES THAT ARE NOT TO BE USED WITHIN 30 DAYS SHALL BE TEMPORARILY STABILIZED WITH SEED AND MULCH OR COVERED WITH POLYETHYLENE SHEETING. SOIL AND MATERIAL STOCKPILES SHALL NOT BE LOCATED IN AREAS ASSOCIATED WITH PERMANENT STORMWATER BASINS
- 24. SELF-INSTALLED ABOVE-GRADE CONCRETE WASHOUTS SHOULD BE CONSTRUCTED WITH A RECOMMENDED MINIMUM LENGTH AND MINIMUM WIDTH OF 10 FEET. BUT WITH SUFFICIENT QUANTITY AND VOLUME TO CONTAIN ALL LIQUIDS AND CONCRETE WASTE GENERATED BY WASHOUT OPERATIONS. INCLUDE A MINIMUM OF 12 INCHES OF ERFEBOARD IN THE SIZING CALCULATIONS. PLASTIC LINING MATERIAL SHOULD BE A MINIMUM OF 10 MIL POLYETHYLENE SHEETING AND SHALL BE FREE OF HOLES, TEARS, OR OTHER DEFECTS THAT COMPROMISE THE IMPERMEABILITY OF THE MATERIAL. WHEN TEMPORARY CONCRETE WASHOUT FACILITIES ARE NOT LONGER REQUIRED FOR THE WORK. THE HARDENED CONCRETE. SLURRIES AND LIQUIDS SHALL BE REMOVED AND PROPERLY DISPOSED OF.
- 25. ONCE GRADED, STORMWATER BASINS SHALL BE SURROUNDED WITH SNOW FENCE AND PROTECTED FROM HEAVY EQUIPMENT, IF THE SOIL OR SAND FILTER BECOMES COMPACTED, IT SHALL BE SUITABLY AMENDED, TILLED, AND RE-VEGETATED AS NEEDED ONCE CONSTRUCTION IS COMPLETE TO RESTORE INFILTRATION CAPACITY.
- 26. THE TEMPORARY LAYDOWN AREA SHALL BE RESTORED TO ORIGINAL CONDITIONS WITHIN FOURTEEN DAYS AFTER CONSTRUCTION ACTIVITY HAS PERMANENTLY CEASED. THE SUBGRADE SHALL BE SUITABLY AMENDED, TILLED, AND **RE-VEGETATED TO RESTORE INFILTRATION CAPACITY.**

TEMPORARY SEDIMENT TRAP NOTES

ACCUMULATION AND FILTRATION PERFORMANCE.

- 1. CLEAR, GRUB AND STRIP ANY VEGETATION AND ROOT MAT FROM ANY PROPOSED EMBANKMENT AND OUTLET AREA. REMOVE STONES AND ROCKS WHOSE DIAMETER IS GREATER THAN THREE (3) INCHES AND OTHER DEBRIS.
- 2. EXCAVATE WET STORAGE AND CONSTRUCT THE EMBANKMENT AND/OR OUTLET AS NEEDED TO ATTAIN THE NECESSARY STORAGE REQUIREMENTS. USE ONLY FILL MATERIAL FOR THE EMBANKMENT THAT IS FREE FROM EXCESSIVE ORGANICS. DEBRIS, LARGE ROCKS (OVER SIX (6) INCHES) OR OTHER UNSUITABLE MATERIALS, COMPACT THE EMBANKMENT IN 9-INCH LAYERS BY TRAVERSING WITH EQUIPMENT WHILE IT IS BEING CONSTRUCTED.
- STABILIZE THE EARTHEN EMBANKMENT USING ANY OF THE FOLLOWING MEASURES, SEEDING FOR TEMPORARY VEGETATIVE COVER; SEEDING FOR PERMANENT VEGETATIVE COVER; OR SLOPE PROTECTION, IMMEDIATELY AFTER INSTALLATION. 4. CARRY OUT CONSTRUCTION OPERATIONS IN SUCH A MANNER THAT EROSION AND WATER POLLUTION ARE MINIMIZED.
- 5. INSPECT THE TEMPORARY SEDIMENT TRAP AT LEAST ONCE A WEEK AND WITHIN 24 HOURS OF THE END OF A STORM WITH A RAINFALL AMOUNT OF 0.25 INCH OR GREATER. CHECK THE OUTLET TO ENSURE THAT IT IS STRUCTURALLY SOUND AND HAS NOT BEEN DAMAGED BY EROSION OR CONSTRUCTION FOUIPMENT. THE HEIGHT OF THE STONE OUTLET OR WEIR CREST SHOULD BE MAINTAINED AT LEAST 1 FOOT BELOW THE CREST OF THE EMBANKMENT. ALSO CHECK FOR SEDIMENT
- 6. WHEN SEDIMENTS HAVE ACCUMULATED TO ONE HALF THE MINIMUM REQUIRED VOLUME OF THE WET STORAGE, DEWATER THE TRAP AS NEEDED. REMOVE SEDIMENTS AND RESTORE THE TRAP TO ITS ORIGINAL DIMENSIONS. DISPOSE OF THE SEDIMENT REMOVED FROM THE BASIN IN A SUITABLE AREA AND IN SUCH A MANNER THAT IT WILL NOT ERODE AND CAUSE SEDIMENTATION PROBLEMS
- 7. THE TEMPORARY SEDIMENT TRAP MAY BE REMOVED AFTER THE CONTRIBUTING DRAINAGE AREA IS STABILIZED.

MOO COW SOLAR AP 304, LOTS 27.1 and 28	AARON CHIN-HUI TING							
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## PROPOSED LEGEND



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PROJECT NO: 500563 DATE OF ISSUE: 2/1/2024 SHEET NO: 2 OF 17



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## PRELIMINARY PLAN APPLICATION SITE OVERVIEW



DESCRIPTION	REQUIR	ED	PROPOSED		
MINIMUM LOT FRONTAGE	1 LOT FRONTAGE 300 FT				
MINIMUM FRONT YARD SETBACK	100 F1	-	1277± FT		
MINIMUM SIDE YARD SETBACK **	85 FT		62± FT		
MINIMUM REAR YARD SETBACK	150 FT		2513± FT		
MINIMUM VEGETATED BUFFER	40 FT		40 FT		
MAXIMUM LOT COVERAGE	15 %		8± %		
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DIMENSIONAL REGULATIONS ZONE RR-5 (NURSERY/GREENHOUSE) / MAJOR SOLAR INSTALLATIONS





:: Apr 24, 2024 — 1:17PM VAME: C:\Users\mobrien\AppData\Loca\\Temp\AcPublish\_27236\500563 Moo Cow Prelim Layout and Materials P NOTES:

- 1. FINAL LOCATION OF ALL ELECTRICAL EQUIPMENT, WIRES, POLES, INVERTERS, ETC. TO BE DETERMINED BY OTHERS AND APPROVED BY OWNER. ALL ELECTRICAL CONNECTION AND DISTRIBUTION WITHIN THE ARRAY SHALL BE UNDERGROUND. ALL UNDERGROUND ELECTRICAL NOT SHOWN ON THIS PLAN SET.
- 2. FINAL NUMBER AND LOCATION OF SOLAR MODULES TO BE DESIGNED BY OTHERS. PRIOR TO INSTALLATION. FINAL NUMBER AND LOCATION MAY VARY AS NEEDED WITHIN PROPOSED FENCE LINE. MAX PANEL HEIGHT SHALL NOT EXCEED 12 FEET.
- 3. SIGNAGE INDICATING MANUFACTURER'S IDENTIFICATION, INSTALLER'S IDENTIFICATION, EQUIPMENT INFORMATION, INDICATION OF OWNERSHIP, AND APPROPRIATE WARNING STATEMENTS SHALL BE POSTED ON OR NEAR THE SOLAR MODULES IN A CLEAR VISIBLE MANNER AND SHALL COMPLY WITH PREVAILING REGULATIONS.
- 4. WARNING/DANGER SIGNAGE TO BE INSTALLED AT 300 FT INTERVALS ON PERIMETER FENCE AND NO TRESPASSING SIGN TO BE INSTALLED AT 100 FT INTERVALS, WITH A MINIMUM OF ONE (1) SIGN EACH FENCE SIDE AROUND THE FULL INSTALLATION PERIMETER.
- 5. POST SIGNAGE WITH 24-HOUR EMERGENCY CONTACT INFORMATION ON THE VEHICLE GATE.
- 6. EXTERIOR LIGHTING IS NOT PROPOSED.
- 7. DECORATIVE ACCESS GATE SUBJECT TO APPROVAL BY TOWN PLANNER PRIOR TO INSTALLATION.

		PRELIMINARY PLAN APPLICATION LAYOUT AND MATERIALS
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PROJECT NO: 500563 DATE OF ISSUE: 2/1/2024 SHEET NO: 8 OF 17



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LOCATED WITHIN TEMPORARY LAYDOWN AREA. FINAL LOCATIONS OF TO BE DETERMINED BY CONTRACTOR AS APPROVED BY OWNER.

NOTES: 1. ROLL-OFF CONTAINER AND CONCRETE WASHOUT AREA TO BE

PRELIMINARY PLAN APPLICATION

**EROSION AND SEDIMENT CONTROL** 

SLOPES >15%



SLOPES 8% - 15%





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TEMPORARY SEDIMENT TRAPS SUMMARY TABLE								
PARAMETER	TST-1	TST-2	TST-3					
DRAINAGE AREA, AC	1.52	5.00	1.97					
WET VOLUME RQD, CF	2,764	9,075	3,576					
DRY VOLUME RQD, CF	2,764	9,075	3,576					
MINIMUM DEPTHS (MEASURED FROM BOTTOM OF SEDIMENT TRAP)								
SEDIMENT REMOVAL	1'	1'	1'					
BOTTOM OF FILTER STONE (WET STORAGE)	2'	2'	2'					
WEIR CREST (DRY STORAGE)	3'	3'	3'					
BERM	4'	4'	4'					
MINIMUM AREAS	(SQUARE FEET)							
WET STORAGE SURFACE AREA (AW)	2,736	8,976	3,526					
DRY STORAGE SURFACE AREA (AD)	3,200	9,800	4,050					



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MOO COW SOLAR
AP 304, LOTS 27.1 and 28
2446 VICTORY HIGHWAY
COVENTRY, RHODE ISLAND

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### TYPICAL EMERGENCY SPILLWAY 4 11 SCALE: NTS

2. CURB JOINTS SHALL BE SEALED WITH NON-SHRINK GROUT TO PROVIDE A CONTINUOUS FLAT TOP SURFACE.

NOTES: 1. CONCRETE CURB SHALL BE SET LEVEL ON A COMPACTED GRAVEL BORROW SUBBASE BEDDING

LOCATION	LEVEL LIP ELEVATION	CREST WIDTH (FT)	RIP RAP THICKNESS (IN)	RIP RAP GRADATION
WEST BASIN	575.50	50	12	R-3
EAST BASIN	554.00	20	12	R-3
SAND FILTER	575.50	10	12	R-3

**PROFILE VIEW** 

SECTION VIEW











- 2. INSTALL FENCE PER MANUFACTURER INSTRUCTIONS.

SCALE: NTS

11 /

- 3. FENCE POSTS TO BE PILE DRIVEN EXCEPT AT CORNERS AND GATES WHICH SHALL BE SET IN CONCRETE. 4. FENCE HEIGHT SHALL BE 7 FEET.
- 5. PROVIDE 6-8 INCH CLEARANCE BENEATH THE FENCE ALONG AT LEAST ONE THIRD OF EACH SIDE OF THE FENCE. <sup>3</sup> TYPICAL 7-FT CHAIN LINK FENCE





- AREA FOR CONSTRUCTION ACTIVITIES AND TO PREVENT SEDIMENTATION.
- 2. SANDBAGS TO BE LOCATED UPSTREAM OF THE WORK AREA AND DOWNSTREAM OF THE WORK AREA. A TEMPORARY FLEXIBLE PIPE SHALL CONVEY FLOW AROUND THE WORK AREA.
- 3. SIZE AND PROVIDE A TEMPORARY FLEXIBLE PIPE TO BE WITH ADEQUATE CAPACITY TO MAINTAIN BASE STREAM FLOW.
- 4. DIVERSION PUMP AND DISCHARGE LINE SIZE AND TYPE TO BE DETERMINED BY CONTRACTOR BASED ON DEWATER OPERATIONS.





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MOO COW SOLAR AP 304, LOTS 27.1 and 28	AARON CHIN-HUI TING No.							PRELIMINARY PLAN APPLICATION DETAILS	D-3
2446 VICTORY HIGHWAY COVENTRY, RHODE ISLAND	REGISTERED PROFESSIONAL ENGINEER CIVIL Not Valid Without Signature	1     RESPONSE TO TOWN'S COMMENTS       No.     REVISION       DRAWN BY: TL     DESIGNED BY:TL     CHECK	4/24/2024 DATE (ED BY: PRW	MMO DRAWN	ACT DESIGN	АСТ СНК	FOR PERMITTING ONLY	PROJECT NO: 500563 DATE OF ISSUE: 2/1/2024 SHEET NO: 12 OF 17	

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12 SCALE: NTS









## 1. MATCH EXISTING DRAINAGE PATTERNS WITHIN RIGHT OF WAY.

2. SAW CUT EXISTING PAVEMENT 6 INCHES FROM EDGE OF PAVEMENT. TACK COAT FACE BEFORE PAVING.

## TYPICAL PAVED APRON



MOO COW SOLAR
AP 304, LOTS 27.1 and 28
2446 VICTORY HIGHWAY
COVENTRY, RHODE ISLAND

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### LEGEND - REFER TO L4 DETAILS



ACCESS ROAD - UPL SEED MIXES -28,400 SF = .65 ACRES



ACCESS ROAD - FACU SEED MIXES -5,000 SF = .11 ACRES

ACCESS ROAD - FAC SEED MIXES -

17,000 SF = .39 ACRES



ACCESS ROAD - FACW SEED MIXES -818 SF = .02 ACRES

NOTES:

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DRAWING NO:

		APPLICATION FOR SIGNIFICANT ALTERATION LANDSCAPE PLAN	L-1
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## 15" On 83 14.51' (TYP.) OAK

-FT VEGETATED

BUFFER

S89'02'32

159.98'

Es? SOLAR ARRAY 4.37± MW DC 7,464± 585 W MODULES 9.74± ACRES N/F 0304–028.00 82.91± AC. - R.O.W. IN FAVOR OF 

Jan Skod

**MOO COW SOLAR** AP 304, LOTS 27.1 and 28 2446 VICTORY HIGHWAY COVENTRY, RHODE ISLAND

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STORMWATER.

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APPROXIMATE STREAM EDGES AS OBSERVED BY TRC

SCALE: 1" = 50'



## **GENERAL LANDSCAPE AND SEEDING NOTES**

- . THE LANDSCAPE PLAN AND DETAILS ARE FOR LANDSCAPING INFORMATION ONLY. PLEASE REFER TO THE SITE LAYOUT PLAN, GRADING PLAN AND/OR UTILITIES PLAN FOR ALL OTHER INFORMATION
- THE CONTRACTOR SHALL MONITOR AND GUARANTEE THAT ALL PLANTS, TREES, AND SHRUBS SHALL BE HEALTHY AND FREE OF DISEASE FOR A PERIOD OF (1) ONE YEAR AFTER SUBSTANTIAL COMPLETION AND ACCEPTANCE BY THE OWNER. CONTRACTOR SHALL REPLACE ANY DEAD OR UNHEALTHY PLANTS AT CONTRACTOR'S EXPENSE. FINAL ACCEPTANCE SHALL BE MADE IF ALL PLANTS MEET THE GUARANTEE REQUIREMENTS INCLUDING MAINTENANCE. MAINTENANCE RESPONSIBILITIES INCLUDE INVASIVE SPECIES MONITORING, REMOVAL, AND SUPPLEMENTATION. MONITORING OF THE PROJECT SITE SHALL OCCUR IN THE SPRING AND THE FALL TO DETERMINE THE PRESENCE OF INVASIVE SPECIES. SHOULD ANY INVASIVE SPECIES BE IDENTIFIED WITHIN THE PROJECT SITE, THE INVASIVE SPECIES SHALL BE REMOVED ACCORDING TO METHODS MOST LIKELY TO BE EFFECTIVE IN CONTROLLING THAT SPECIES AND SUPPLEMENTING ITS REPLACEMENT WITH APPROPRIATE VEGETATION AND SEED MIX IDENTIFIED (AND APPROVED) ON THIS PLAN AND/OR AN APPROVED EQUAL. ADDITIONAL MAINTENANCE RESPONSIBILITIES INCLUDE: APPROVED CULTIVATING, SPRAYING, WEEDING, WATERING, TIGHTENING OF TREE STRAP GUYS, PRUNING, FERTILIZING, MULCHING, AND ANY OTHER OPERATIONS NECESSARY TO MAINTAIN PLANT VIABILITY. MAINTENANCE SHALL BEGIN IMMEDIATELY AFTER PLANTING AND CONTINUE UNTIL 90 DAYS AFTER FINAL ACCEPTANCE.
- THE CONTRACTOR SHALL SUPPLY ALL LABOR, PLANTS, APPROVED SEEDING MIX, AND MATERIALS IN QUANTITIES SUFFICIENT TO COMPLETE THE WORK SHOWN ON THE DRAWING(S) AND LISTED IN THE PLANT SCHEDULE(S) AND/OR SEEDING TABLE(S). IN THE EVENT OF A DISCREPANCY BETWEEN QUANTITIES SHOWN IN THE PLANT SCHEDULE AND/OR SEEDING TABLE AND THOSE REQUIRED BY THE DRAWINGS, THE LARGER SHALL APPLY. ALL PLANTS SHALL BE ACCLIMATED BY THE SUPPLY NURSERY TO THE LOCAL HARDINESS ZONE AND BE CERTIFIED THAT THE PLANTING MATERIAL HAS BEEN GROWN FOR A MINIMUM OF (2) TWO YEARS AT THE SOURCE AND OBTAINED WITHIN 200 MILES OF PROJECT SITE UNLESS OTHERWISE APPROVED BY OWNER, CERTIFIED LANDSCAPE INSPECTOR, OR LANDSCAPE ARCHITECT.
- THE LOCATIONS FOR PLANT MATERIAL ARE APPROXIMATE AND ARE SUBJECT TO FIELD ADJUSTMENT DUE TO SLOPE, VEGETATION, AND SITE FACTORS SUCH AS THE LOCATION OF ROCK OUTCROPS. PRIOR TO PLANTING THE CONTRACTOR SHALL ACCURATELY STAKE OUT THE LOCATIONS FOR ALL PLANTS. THE OWNER, CERTIFIED LANDSCAPE INSPECTOR, OR LANDSCAPE ARCHITECT SHALL APPROVE THE FIELD LOCATIONS OR ADJUSTMENTS OF THE PLANT MATERIAL
- . ALL SHRUB MASSING AREAS SHALL BE MULCHED TO A DEPTH OF 2" WITH SHREDDED HARDWOOD BARK MULCH.
- NO PLANT SHALL BE PLACED IN THE GROUND BEFORE ROUGH GRADING HAS BEEN COMPLETED AND APPROVED BY THE OWNER, CERTIFIED LANDSCAPE INSPECTOR, OR LANDSCAPE CONTRACTOR. STAKING THE LOCATION OF ALL TREES AND SHRUBS SHALL BE COMPLETED PRIOR TO PLANTING FOR APPROVAL BY THE OWNER, CERTIFIED LANDSCAPE INSPECTOR, OR LANDSCAPE ARCHITECT. STAKING OF THE INSTALLED TREE MUST BE COMPLETED THE SAME DAY AS IT IS INSTALLED. ALL TREES SHALL BE STAKED OR GUYED AS PER THE DETAIL. SEE LANDSCAPING PLAN(S) FOR PLANTING DETAILS.
- COORDINATE PLANT MATERIAL LOCATIONS WITH SITE UTILITIES. SEE SITE LAYOUT, GRADING AND/OR UTILITY PLANS FOR STORM, SANITARY, GAS, ELECTRIC, TELEPHONE AND WATER LINES. UTILITY LOCATIONS ARE APPROXIMATE. EXERCISE CARE WHEN DIGGING IN AREAS OF POTENTIAL CONFLICT WITH UNDERGROUND OR OVERHEAD UTILITIES. THE CONTRACTOR IS RESPONSIBLE FOR ANY DAMAGE DUE TO CONTRACTOR'S NEGLIGENCE AND SHALL REPLACE OR REPAIR ANY DAMAGE AT CONTRACTOR'S EXPENSE.
- . LANDSCAPE PLANTING PITS MUST BE FREE DRAINING. PAVEMENT, COMPACTED SUBGRADE, AND BLASTED ROCK SHALL BE REMOVED TO A DEPTH OF 2' OR TO A GREATER DEPTH IF REQUIRED BY PLANTING DETAILS OR SPECIFICATIONS. REPLACE SOIL WITH MODERATELY COMPACTED LOAM OR SANDY LOAM FREE FROM STONES AND RUBBISH 1" OR GREATER IN DIAMETER AND ANY OTHER MATERIAL HARMFUL TO PLANT GROWTH AND DEVELOPMENT. PLANTING INSTALLATION SHALL BE AS DETAILED AND CONTAIN PLANTING MIX AS SPECIFIED UNLESS RECOMMENDED OTHERWISE BY SOIL ANALYSIS.
- PLANTING SOIL MIXTURE: 2 PARTS PEAT MOSS
- 5 PARTS TOPSOIL
- MYCORRHIZA INOCULANT "TRANSPLANT 1-STEP" AS MANUFACTURED BY ROOTS, INC. OR APPROVED EQUAL USE PER MANUFACTURER'S RECOMMENDATIONS FOR TREES AND SHRUBS.
  - FERTILIZER/LIME APPLY AS RECOMMENDED BY SOIL ANALYSIS
- TREES, AND SHRUBS: TREES AND SHRUBS SHALL BE NURSERY GROWN UNLESS OTHERWISE NOTED AND HARDY UNDER CLIMATIC CONDITIONS SIMILAR TO THOSE IN THE LOCATION OF THE PROJECT. THEY SHALL BE TYPICAL OF THEIR SPECIES OR VARIETY, WITH NORMAL HABIT OF GROWTH. THEY SHALL BE SOUND, HEALTHY, VIGOROUS, WELL-BRANCHED AND DENSELY FOLIATED WHEN IN LEAF. THEY SHALL BE FREE OF DISEASE, INSECT PESTS, EGGS OR LARVAE. THEY SHALL HAVE HEALTHY AND WELL-DEVELOPED ROOT SYSTEMS. ALL TREES SHALL HAVE STRAIGHT SINGLE TRUNKS WITH THEIR MAIN LEADER INTACT UNLESS OTHERWISE STATED. THE OWNER, CERTIFIED LANDSCAPE INSPECTOR, OR LANDSCAPE ARCHITECT SHALL ONLY PERMIT SUBSTITUTIONS UPON WRITTEN APPROVAL. THEIR SIZES SHALL CONFORM TO THE MEASUREMENT SPECIFIED ON THE DRAWINGS. PLANTS LARGER THAN SPECIFIED ON THE DRAWINGS MAY BE USED IF APPROVED. THE USE OF SUCH PLANTS SHALL NOT INCREASE THE CONTRACT PRICE. ALL TREES AND SHRUBS SHALL BE MULCHED IN ACCORDANCE WITH THE RESPECTIVE PLANTING DETAIL(S) PROVIDED IN THE LANDSCAPING PLAN.
- ALL PRUNING SHALL CONFORM TO THE TREE CARE INDUSTRY ASSOCIATION (TCIA) ANSI A300 (PART 1) 2017 PRUNING STANDARDS. PRUNING STANDARDS SHALL RECOGNIZE BUT, ARE NOT LIMITED TO, THE FOLLOWING PRUNING OBJECTIVES: MANAGE RISK. MANAGE HEALTH. DEVELOP STRUCTURE. PROVIDE CLEARANCE, MANAGE SIZE OR SHAPE, IMPROVE AESTHETICS, MANAGE PRODUCTION OF FRUIT, FLOWERS, OR OTHER PRODUCTS, AND/OR MANAGE WILDLIFE HABITAT. DEVELOPING STRUCTURE SHALL IMPROVE BRANCH AND TRUNK ARCHITECTURE, PROMOTE OR SUBORDINATE CERTAIN LEADERS, STEMS, OR BRANCHES; PROMOTE DESIRABLE BRANCH SPACING; PROMOTE OR DISCOURAGE GROWTH IN A PARTICULAR DIRECTION (DIRECTIONAL PRUNING); MINIMIZE FUTURE INTERFERENCE WITH TRAFFIC, LINES OF SIGHT, INFRASTRUCTURE, OR OTHER PLANTS; RESTORE PLANTS FOLLOWING DAMAGE; AND/OR REJUVENATE SHRUBS. PROVIDING CLEARANCE SHALL ENSURE SAFE AND RELIABLE UTILITY SERVICES; MINIMIZE CURRENT INTERFERENCE WITH TRAFFIC, LINES OF SITE, INFRASTRUCTURE, OR OTHER PLANTS; RAISE CROWN(S) FOR MOVEMENT OF TRAFFIC OR LIGHT PENETRATION; ENSURE LINES OF SIGHT OR DESIRED VIEWS; PROVIDE ACCESS TO SITES, BUILDINGS, OR OTHER STRUCTURES: AND/OR COMPLY WITH REGULATIONS.
- TOPSOIL SHALL BE INSTALLED AT A MINIMUM DEPTH OF 4 INCHES. CONTRACTOR SHALL SUBMIT TOPSOIL TO A CERTIFIED TESTING LABORATORY TO DETERMINE PH, FERTILITY, ORGANIC CONTENT AND MECHANICAL COMPOSITION. THE CONTRACTOR SHALL SUBMIT THE TEST RESULTS FROM REGIONAL EXTENSION OFFICE OF USDA TO THE OWNER, CERTIFIED LANDSCAPE INSPECTOR, OR LANDSCAPE ARCHITECT FOR REVIEW AND APPROVAL. CONTRACTOR SHALL INCORPORATE AMENDMENTS FOR GOOD PLANT GROWTH AND PROPER SOIL ACIDITY RECOMMENDED FROM THE TOPSOIL TEST.
- NO PHOSPHOROUS SHALL BE USED AT PLANTING TIME UNLESS SOIL TESTING HAS BEEN COMPLETED AND TESTED BY A HORTICULTURAL TESTING LAB AND SOIL TESTS SPECIFICALLY INDICATE A PHOSPHOROUS DEFICIENCY THAT IS HARMFUL, OR WILL PREVENT NEW LAWNS/GRASSES AND PLANTINGS FROM ESTABLISHING PROPERLY.
- IF SOIL TESTS INDICATE A PHOSPHOROUS DEFICIENCY THAT WILL IMPACT PLANT AND LAWN ESTABLISHMENT, PHOSPHOROUS SHALL BE APPLIED AT THE MINIMUM RECOMMENDED LEVEL PRESCRIBED IN THE SOIL TEST FOLLOWING ALL APPLICABLE STANDARDS, REQUIREMENTS, AND/OR REGULATIONS.
- ALL SLOPES GREATER THAN 3:1 RECEIVING A WILDFLOWER, WETLAND, AND/OR GRASS SEEDING MIXTURE SHALL BE COVERED WITH AN EROSION CONTROL BLANKET.
- ALL WILDFLOWERS AND GRASSES SOWED SHALL BE ALLOWED TO GROW TO THEIR NATURALLY OCCURRING HEIGHTS WHENEVER POSSIBLE. NATIVE WILDFLOWERS AND/OR GRASSES CAN BE MOWED/MAINTAINED (WITHIN ACCEPTABLE AREAS IDENTIFIED AND/OR APPROVED BY APPROPRIATE REGULATORY AGENCIES) AS OFTEN AS NEEDED TO KEEP THE VEGETATION AT A DESIRED AND/OR MANAGEABLE/MANICURED HEIGHT.

#### ADDITIONAL LANDSCAPE AND SEEDING NOTES

THE LANDSCAPING SEED MIXTURES AND SPECIFICATIONS ARE FOR INFORMATIONAL PURPOSES ONLY. PLEASE REFER TO THE SITE LAYOUT PLAN, GRADING PLAN AND/OR UTILITIES PLAN FOR ALL OTHER INFORMATION.

- THE CONTRACTOR SHALL MONITOR AND GUARANTEE THAT ALL SEEDED AREAS ON SITE ARE HEALTHY AND FREE OF DISEASE FOR THE LIFETIME OF THE PROJECT AFTER SUBSTANTIAL COMPLETION AND ACCEPTANCE BY THE OWNER. CONTRACTOR SHALL RESEED ANY DEAD, UNHEALTHY, OR BARREN SEEDED AREAS AT CONTRACTOR'S EXPENSE. FINAL ACCEPTANCE SHALL BE MADE IF ALL VEGETATIVE AREAS MEET THE GUARANTEE REQUIREMENTS INCLUDING MAINTENANCE AND COVERAGE PERCENTAGES REQUIRED BY THE STORMWATER POLLUTION PREVENTION PLAN. MAINTENANCE RESPONSIBILITIES INCLUDE INVASIVE SPECIES MONITORING REMOVAL AND SUPPLEMENTATION MONITORING OF THE PROJECT SITE SHALL OCCUR IN THE SPRING AND THE FALL TO DETERMINE THE PRESENCE OF INVASIVE SPECIES. SHOULD ANY INVASIVE SPECIES BE IDENTIFIED WITHIN THE PROJECT SITE, THE INVASIVE SPECIES SHALL BE REMOVED ACCORDING TO METHODS MOST LIKELY TO BE EFFECTIVE IN CONTROLLING THAT SPECIES AND SUPPLEMENTING ITS REPLACEMENT WITH APPROPRIATE VEGETATION AND SEED MIX IDENTIFIED (AND APPROVED) ON THIS PLAN AND/OR AN APPROVED EQUAL. ADDITIONAL MAINTENANCE RESPONSIBILITIES MAY INCLUDE BUT NOT LIMITED TO: APPROVED CULTIVATING, WEEDING, WATERING, FERTILIZING, MULCHING, AND ANY OTHER OPERATIONS NECESSARY TO MAINTAIN VIABILITY. MAINTENANCE SHALL BEGIN IMMEDIATELY AFTER PLANTING AND CONTINUE FOR THE DURATION OF SOLAR ARRAY USE BY THE OWNER/OPERATOR AFTER FINAL ACCEPTANCE. WATERING OF THE LANDSCAPE AREAS SHALL BE IMPLEMENTED BY THE USE OF A WATERING TRUCK.
- THE CONTRACTOR SHALL SUPPLY ALL LABOR, APPROVED SEEDING MIX, AND MATERIALS IN QUANTITIES SUFFICIENT TO COMPLETE THE WORK SHOWN ON THE DRAWING(S) AND SPECIFICATIONS AND/OR SEEDING TABLE(S). IN THE EVENT OF A DISCREPANCY BETWEEN QUANTITIES SHOWN IN THE SEED SCHEDULES AND/OR SEEDING TABLE AND THOSE REQUIRED BY THE DRAWINGS, THE LARGER SHALL APPLY. ALL SEED MIXTURES SHALL BE OF THE LOCAL HARDINESS ZONE AND BE CERTIFIED THAT THE SEED MATERIAL HAS BEEN GROWN LOCALLY, AND OBTAINED WITHIN 200 MILES OF PROJECT SITE UNLESS OTHERWISE APPROVED BY OWNER, CERTIFIED LANDSCAPE INSPECTOR, OR LANDSCAPE ARCHITECT.
- THE LOCATIONS FOR SEEDED AREAS ARE APPROXIMATE AND ARE SUBJECT TO FIELD ADJUSTMENT DUE TO SLOPE. VEGETATION, AND SITE FACTORS SUCH AS THE LOCATION OF ROCK OUTCROPS. PRIOR TO SEEDING THE CONTRACTOR SHALL ACCURATELY STAKE OUT THE LOCATIONS FOR ALL AREAS. THE OWNER, CERTIFIED LANDSCAPE INSPECTOR, OR LANDSCAPE ARCHITECT SHALL APPROVE THE FIELD LOCATIONS OR ADJUSTMENTS OF THESE AREAS.
- 4. COORDINATE SEEDED AREA LOCATIONS WITH SITE UTILITIES. SEE SITE LAYOUT, GRADING AND/OR UTILITY PLANS FOR STORM, SANITARY, GAS, ELECTRIC, TELEPHONE AND WATER LINES. UTILITY LOCATIONS ARE APPROXIMATE. EXERCISE CARE WHEN DISTURBING THESE AREAS AN AVOID POTENTIAL CONFLICT WITH UNDERGROUND OR OVERHEAD UTILITIES. THE CONTRACTOR IS RESPONSIBLE FOR ANY DAMAGE DUE TO CONTRACTOR'S NEGLIGENCE AND SHALL REPLACE OR REPAIR ANY DAMAGE AT CONTRACTOR'S EXPENSE.
- 5. HYDROMULCH APPLICATION RATES FOR SLOPES GREATER THAN 3:1 RECEIVING A WILDFLOWER, AND/OR GRASS SEEDING MIXTURE MAY INCREASE PER SITE CONDITIONS, SEE MANUFACTURER'S RECOMMENDATIONS FOR STEEP SLOPES.
- ALL WILDFLOWERS AND GRASSES SOWED SHALL BE ALLOWED TO GROW TO THEIR NATURALLY OCCURRING HEIGHTS WHENEVER POSSIBLE. NATIVE WILDFLOWERS AND/OR GRASSES CAN BE MOWED/MAINTAINED (WITHIN ACCEPTABLE AREAS IDENTIFIED AND/OR APPROVED BY APPROPRIATE REGULATORY AGENCIES) AS OFTEN AS NEEDED TO KEEP THE VEGETATION AT A DESIRED AND/OR MANAGEABLE/MANICURED HEIGHT.

SEEDING

- APPLY SEED AT RATE PER SEED MIXTURES
- APPROVED STORMWATER POLLUTION PREVENTION PLAN. 3. DO NOT SOW IMMEDIATELY FOLLOWING RAIN, WHEN GROUND IS TOO DRY, OR WHEN WINDS EXCEED 12 MPH.
- HYDROSEEDING
- SPECIFIED SEED-SOWING RATE; MANUFACTURED BY GeoE nvironmental OR AN APPROVED EQUIVALENT.
- GeoEARTH: 2.000 LBS./ACRE GeoPERM: 3,000 LBS./ACRE
- SEED MIXTURE: PER SEED MIX (ADD SEED DRY WEIGHT TO TOTAL APPLICATION RATE)
- 2. AFTER APPLICATION, APPLY WATER WITH FINE SPRAY IMMEDIATELY AFTER EACH AREA HAS BEEN HYDROSEEDED. SATURATE TO 4 INCHES OF SOIL AND MAINTAIN MOISTURE LEVELS TWO TO FOUR INCHES.
- RECOMMENDATIONS AND FINAL APPLICATION RATES.

### MAINTENANCE

- THE OWNER'S REPRESENTATIVE MINIMUM OF 2 TO 3 TIMES PER GROWING SEASON. 2. WATER TO PREVENT SEED MIXTURES AND SOIL FROM DRYING OUT.
- 3. HAD RAKE AND SMOOTH SURFACE TO REMOVE MINOR DEPRESSIONS OR IRREGULARITIES.
- 4. CONTROL GROWTH OF WEEDS AND INVASIVE SPECIES USING MECHANICAL METHODS OR NATURAL/ORGANIC
- 5. IMMEDIATELY RESEED AREAS SHOWING BARE SPOTS WITH SPECIFIED SEED MIXTURE AND APPLICATION RATE
- 6. REPAIR WASHOUTS OR GULLIES.
- 7. PROTECT SEEDED AREAS WITH WARNING SIGNS DURING MAINTENANCE PERIOD.

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## MOO COW SOLAR AP 304, LOTS 27.1 and 28 SCALE: 1" = 50 2446 VICTORY HIGHWAY COVENTRY, RHODE ISLAND No. REVISION DATE DRAWN DESIGN CHK DRAWN BY: TD/TL DESIGNED BY: TD/TL CHECKED BY:

![](_page_15_Figure_53.jpeg)

![](_page_16_Figure_0.jpeg)

### **BUFFER PLANTING**

VISUAL MITIGATION PLANTING TEMPLATE - TYP	ΕÆ
ANDSCARE DI ANTINO SCHEDULE (2017/18/14) DUEEED/CODEENING EEE	דחי

LEGEND

LANDSCAPE PLANTING SCHEDULE (30' VISUAL BUFFER/SCREENING EFFORT)

DECIDU	JOUS AND EVERGREEN TREES				
SYMBOL	BOTANICAL NAME/ COMMON PLANT NAME	QUANTITY	SIZE	ROOT	MATURE HEIGHT
AA	AMELANCHIER ARBOREA DOWNY SHADBUSH	5	8' MIN. HT. CLUMP	B&B	15'-20' HT.
сс	CARPINUS CAROLINIANA AMERICAN HORNBEAM	4	2" MIN. CAL.	B&B	25'-30' HT.
ΗV	HAMAMELIS VIRGINIANA COMMON WITCH HAZEL	4	8' MIN. HT. CLUMP	B&B	20'-25' HT.
JV	JUNIPERUS VIRGINIANA EASTERN RED CEDAR	6	8' MIN. HT.	B&B	40'-50' HT.
PR	PICEA RUBENS RED SPRUCE	8	8' MIN. HT.	B&B	30'-60' HT.
PG	PICEA GLAUCA WHITE SPRUCE	6	8' MIN. HT.	B&B	40'-60' HT.
SHRUB	S				
SYMBOL	BOTANICAL NAME/ COMMON PLANT NAME	QUANTITY	SIZE	ROOT	MATURE HEIGHT
AAR	ARONIA ARBUTIFOLIA RED CHOKEBERRY	13	36" HT. MIN.	3 / 5 GAL. CONT.	5'-12' HT.
IV	ILEX VERTICILLATA COMMON WINTERBERRY	21	36" HT. MIN.	3 / 5 GAL. CONT.	10'-12' HT.
ю	ILEX OPACA AMERICAN HOLLY	16	36" HT. MIN.	5 / 7 GAL. CONT.	12'-30' HT.
VN	VIBURNUM NUDUM VAR. NUDUM WITHEROD	12	36" HT. MIN.	3 / 5 GAL. CONT.	6'-12' HT.

![](_page_16_Picture_7.jpeg)

NEW ENGLAND WETLA	NE
BOTANICAL NAME	СС
ELYMUS RIPARIUS	Rľ
BIDENS FRONDOSA	BE
EUPATORIUM PERFOLIATUM	BC
SCIRPUS CYPERINUS	wo

ACCESS ROAD - FACW SEED MIXES

**BUFFER PLANTING SCHEDULE** 

![](_page_16_Picture_10.jpeg)

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![](_page_16_Picture_14.jpeg)

ACCESS ROAD - UPL SEED MIXES

NEW ENGLAND	ROADSIDE MATRIX UPLA	AND SEED MIX (UPL AND FA	CU)	
	BOTANICAL NAME	COMMON NAME	RATE (LBS/ACRE)	RATE (LBS/1000 FT²)
	SORGHASTUM NUTANS	INDIANGRASS		
	SCHIZACHYRIUM SCOPARIUM	LITTLE BLUESTEM		
	CHAMAECRISTA FASCICULATA	PARTRIDGE PEA		
	FESTUCA RUBRA	RED FESCUE	35	1250
			]	

### ACCESS ROAD - UPL SEED MIXES

![](_page_16_Picture_18.jpeg)

ACCESS ROAD - FACU SEED MIXES

IEW ENGLAND WETLAND PLANTS (FACU)					
	BOTANICAL NAME	COMMON NAME	RATE (LBS/ACRE)	RATE (LBS/1000 FT <sup>2</sup> )	
	FESTUCA RUBRA	RED FESCUE			
	SCHIZACHYRIUM SCOPARIUM	LITTLE BLUESTEM			
	AGROSTIS PERENNANS	UPLAND BENTGRASS			
			35	1250	

### ACCESS ROAD - FACU SEED MIXES

ACCESS ROAD - FACW SEED MIXES

D PLANTS (FACW)		
OMMON NAME	RATE (LBS/ACRE)	RATE (LBS/1000 FT <sup>2</sup> )
IVERBANK WILD RYE		
EGGAR TICKS		
ONESET		
OOL GRASS	35	1250

ACCESS ROAD - FAC SEED MIXES

IEW ENGLAND	WETLAND PLANTS (FAC	)		
	BOTANICAL NAME	COMMON NAME	RATE (LBS/ACRE)	RATE (LBS/1000 FT <sup>2</sup> )
	ANDROPOGON GERARDII	BIG BLUESTEM		
	PANICUM VIRGATUM	SWITCH GRASS		
			35	1250

#### ACCESS ROAD - FAC SEED MIXES

	NANAAAAAAAAAAAAAAAAAAAAAAAAAAAAAAAAAAA							
	DEGISTERA	0 20	100					
	Ser F. Intrange CO.							
	SIL INTE							
AP 304, LOTS 27.1 and 28	SAMATA K	SCALE: 1" = 20'						
	S- MILTONY MILLAN TOLEAND							
COVENTRY, RHODE ISLAND	AT No. 705							
·	ASCARE ARCHAN		No.	REVISION			DATE	DRAWN
	WWWWWWW		DRA	WN BY: TD/TL	DESIGNED BY: TD/TL	CHECKED	BY:	

DETENTION BASIN - NATIVE GRASS SEED MIXES DETENTION BASIN SEED MIXES

NATIVE GRA	ASS SEED MIX			
PERCENT	BOTANICAL NAME	COMMON NAME	RATE (LBS/ACRE)	RATE (LBS/1000 FT <sup>2</sup> )
25%	ANDROPOGON GERARDII	BIG BLUESTEM		
20%	SORGHASTUM NUTANS	INDIANGRASS		
20%	ANDROPOGON SCOPARIUS	LITTLE BLUESTEM		
20%	BOUTELOUA CURTIPENDULA	SIDEOATS GRAMA	20	0.50
10%	ELYMUS CANADENSIS	CANADA WILD RYE		
5%	PANICUM VIRGATUM	SWITCH GRASS		

### **DETENTION BASIN SEED MIXES**

SOLAR FARM GRASS SEED MIXES

ERNST SOLAR FARM SEED MIX: ERNMX – 186					
MIX CONCENTRATION	BOTANICAL NAME	COMMON NAME	RATE (LBS/ACRE)	RATE (LBS/1000 FT <sup>2</sup> )	
45.5%	FESTUCA RUBRA	CREEPING RED FESCUE			
15.0%	FESTUCA OVINA VAR. DURIUSCULA, 'JETTY'	HARD FESCUE, 'JETTY'			
15.0%	FESTUCA OVINA VAR. DURIUSCULA, 'GLADIATOR'	HARD FESCUE, 'GLADIATOR'			
10.0%	FESTUCA RUBRA SSP. COMMUTATA	CHEWING FESCUE	262	6	
5.0%	POA PRATENSIS, 'KELLY'	KENTUCKY BLUEGRASS, 'KELLY'			
5.0%	POA PRATENSIS, 'MAVERICK'	KENTUCKY BLUEGRASS, 'MAVERICK'			
4.5%	TRIFOLIUM REPENS, DUTCH	WHITE CLOVER, DUTCH			

NOTE:

GRASS SEED MIXES ARE COMPRISED OF GRASSES THAT ARE NATIVE AND/OR INDIGENOUS TO THE AREA AND/OR CONSIDERED FAVORABLE FOR WILDLIFE HABITAT AND SUSTAINABLE GROWTH. ADDITIONALLY, THE SOLAR FARM SEED MIX WAS DEVELOPED ESPECIALLY FOR GRASS PLANTINGS AROUND SOLAR ARRAY FIELDS AND SHALL BE UTILIZED ACCORDINGLY. THESE GRASSES WILL MATURE OUT TO A HEIGHT OF APPROXIMATELY 1 TO 3 FEET HIGH. WHITE CLOVER IS THE ONLY WILDFLOWER OR POLLINATOR SEED SPECIES CONTAINED IN THESE GRASS SEED MIX.

PRELIMINARY SOLAR FARM GRASS SEED MIXES

POLLINATOR FRIENDLY BUFFER SEED MIXES

ERNST NORTHEAST SOLAR POLLINATOR 3' MIX: ERNMX - 612 RATE RATE (LBS/1000 (LBS/ACRE) FT<sup>2</sup>) (LBS/1000 MIX CONCENTRATION BOTANICAL NAME COMMON NAME FESTUCA OVINA, VARIETY NOT STATED SHEEP FESCUE, VARIETY NOT 94.9% STATED 2.5% ASCLEPIAS TUBEROSA BUTTERFLY MILKWEED CHAMAECRISTA 

2.0%	FASCICULATA, PA ECOTYPE	PARTRIDGE PEA, PA ECOTYPE	60	1.4		
0.3%	OENOTHERA FRUTICOSA VAR. FRUTICOSA	SUNDROPS				
0.3%	TRADESCANTIA OHIENSIS, PA ECOTYPE	OHIO SPIDERWORT, PA ECOTYPE				
SEED AT A RATE OF 60 LB / ACRE WITH 45 LBS / ACRE OF A COVER CROP. FOR A COVER CROP USE EITHER <u>GRAIN OATS</u> (1 JAN TO 31 JUL) OR <u>GRAIN RYE</u> (1 AUG TO 31 DEC)						
NOTE:						
NATIVE POLLINATOR SEED MIXES ARE INTENDED TO PROVIDE A EXCELLENT WILDLIFE FOOD AND SHELTER THAT WILL ATTRACT A VARIETY OF POLLINATORS AND SONGBIRDS. THE NATIVE WILDEI OWERS AND GRASSES IN THIS MIX PROVIDE						

AN ATTRACTIVE DISPLAY OF COLOR FROM SPRING TO FALL. POLLINATOR SEED MIXES ARE INTENDED TO PROVIDE NECTAR AND FOOD SOURCES FOR A VARIETY OF POLLINATORS AND LARVA. THESE MIXES ARE COMPRISED OF A FAIRLY EVEN MIX OF NATIVE AND/OR INDIGENOUS WILDFLOWERS AND GRASSES. THE POLLINATOR SEED MIX IS INTENDED TO BE SOWN IN THE DESIGNATED AREAS OR POCKETS THAT ARE ADJACENT TO THE SOLAR ARRAY FIELD AND AROUND THE INSIDE PERIMETER OF THE SECURITY FENCE. SEE CIVIL DRAWING FOR APPROXIMATE LOCATIONS.

FLOWERING HERBACEOUS LAYER/NORTHEAST SOLAR POLLINATOR SEED MIXES

APPLICATION FOR SIGNIFIC		
7		
	СНК	DESIGN

APPLICATION FOR SIGNIFICANT ALTERATION LANDSCAPE DETAILS

![](_page_16_Picture_50.jpeg)

**L-4** 

PROJECT NO: 500563 DATE OF ISSUE: 2/15/2024

SHEET NO: 19 OF 19

DRAWING NO:

	LEGEND	
EXISTING	DESCRIPTION	
	BORING / TEST PIT LOCATION	-1.R. 5/8 .4 BG
COMMUNICATION		
C <sub>x</sub> C	OVERHEAD COMM. LINES (CABLE, TEL, ETC.)	() N/F
CONTROL POINTS	AFFROA, UNDERGROUND COMMUNICATION LINES	EDWARD F. & MARY CASE (VOL. 1780 PG. 784)
$\bullet$	BENCHMARK	
DOMESTIC WATER		N/F
	- APPROX. WATER MAIN	JONATHAN J. OLSON (VOL. 2176 PG. 575)
	WATER VALVE	
	FIRE HYDRANT	N/F
¢	POLE MOUNTED LIGHT	(VOL. 109 PG. 480)
NATURAL GAS		I.P. 2 IN TALL 3.9 AG AT TOP
G <sub>x</sub> G <sub>x</sub> G <sub>x</sub>	APPROX. GAS MAIN	
GS <sub>x</sub> GS <sub>x</sub>	APPROX. GAS SERVICE LINE	
E0x	- ELECTRICAL LINES, OVERHEAD	N/F
EU <sub>x</sub> EU <sub>x</sub>	APPROX. ELECTRICAL LINES, UNDERGROUND	ALARM SERVICES LLC (VOL. 2017 PG. 609)
ىلى ك	UTILITY POLE UTILITY POLE WITH LIGHT	$\int -LR$
<u>ک</u>	UTILITY POLE WITH TRANSFORMER	
PROPERTY	PROPERTY LINE	₹ 1 D.H
	EASEMENT LINE	N/F
0 0	IRON PIPE IRON ROD	
	MONUMENT	0304-02)
ROADS	GUARD RAIL	1,452,332.7 S.F. C
	SIGN	ROOF PEAK
SITE FEATURES	EDGE OF WATER	2 g f f f f f f f f f f f f f f f f f f
x x x x x	BARBED WIRE FENCE	HOLE EXISTING HOUSE
······ = ······ = ······ = ······ = ·····	- CHAIN LINK FENCE RAIL FENCE	SEPTIC TANK -
0 0 0	STOCKADE FENCE	MH TF: 593.64
	WIRE FENCE	TF: 593.82 ELECTRIC TRANSFORMER NECO 41?2
€ OR ₩	TREE	ED <sub>x</sub> ED <sub>x</sub> GRAVEL DRIVE
SANITARY SEWER	TREE LINE	EXISTING EXISTING EXISTING SHED 113 CE
S <sub>x</sub> S <sub>x</sub> S <sub>x</sub>	APPROX. SANITARY SEWER MAIN	
<u> </u>	APPROX. SANITARY SEWER SERVICE LINE SANITARY SEWER MANHOLE	
° <i>C.O.</i>	SEWER CLEAN OUT	
	APPROX. STORM DRAIN PIPE	DECIDUOUS FORESTED
0	STORM DRAIN MANHOLE	SWAMP ≥1 ACRE BUT 
	CORB INLET CATCH BASIN	
TOPOGRAPHY		
×61.95	SPOT ELEVATION	
WETLANDS		
AB3	WEILANDS LINE	
		$\begin{array}{c c} A & D \\ \hline \\$
		SAD CALL
		L RC
		-I.R. 5/8
		452.88' S87'57'00"W
		HSC COMMUNITY SIGN
		DOUC BIT.
		O'Z
	GRAN. MON. CL 1.6	
		- <i>I.R. 5/8</i>
		• I.P. 1.5 INCH 1.6 AG
	CONC. MON. DH CL	
		CONC. MON. DH CL

![](_page_17_Figure_3.jpeg)

![](_page_18_Figure_0.jpeg)

File: C.) jobs/4372/Survey/Survey-Base/4372 Survey Basedwg Layout: V-2 100 SCALE Plotted: 3/31/2023 9.57 AM Last Saved: 3/31/2023 9.52 AM Last Saved By: MattArse

![](_page_19_Figure_0.jpeg)

He. Chipbs/4372/Survey-Base/4372 Survey Basedwg Layout: V-3 TOPO 40 SCALE Plotted: 3/31/2023 10:04 AM Last Saved 3/31/2023 9:52 AM Last Saved By: Matt Arsenau

![](_page_20_Figure_0.jpeg)

![](_page_21_Figure_0.jpeg)

![](_page_22_Picture_2.jpeg)

LOCATION MAP SCALE: 1" = 1500' - 0"

## TOTAL SYSTEM SUMMARY:

TOTAL DC SYSTEM SIZE: TOTAL AC SYSTEM SIZE:

MODULE MANUFACTURER: (QTY) MODULE TYPE 1: (QTY) MODULE TYPE 2:

MODULE TILT: MODULE AZIMUTH:

INVERTER MANUFACTURER: (QTY) INVERTER TYPE:

4,366.440 kWDC 3,500.000 kWAC

HANHWA (2,112) Q.PEAK DUO XL-G11 585W (5,352) Q.PEAK DUO XL-G11S 585W

30° 180°

CPS (28) SCH125KTL-US 125KW

## SCOPE OF WORK SUMMARY

GROUND MOUNT PV ARRAY: • INSTALL SOLAR MODULES AND RACKING SYSTEM ON GROUND LEVEL.

INSTALL INVERTERS AND ELECTRICAL DISTRIBUTION EQUIPMENT.
 INTERCONNECT AT NEW UTILITY SERVICE

24

![](_page_22_Picture_17.jpeg)

![](_page_22_Picture_18.jpeg)

![](_page_22_Picture_20.jpeg)

ENGINEERED BY:

![](_page_22_Picture_22.jpeg)

111 RIVER STREET, SUITE 1110 HOBOKEN, NEW JERSEY 07030

![](_page_22_Picture_25.jpeg)

# DRAWING INDEX

		/	/	/	/
GENER	AL				
G001	TITLE SHEET				
ELECT	RICAL				
E001	ELECTRICAL NOTES & SYMBOLS LIST				
E100	OVERALL ELECTRICAL PLAN				
E110	ELECTRICAL PLAN – EQUIPMENT AREA				
E200	DC ELECTRICAL PLAN				
E201	STRING WIRING DETAILS				
E300	ONE LINE DIAGRAM – SYSTEM A				
E301	ONE LINE DIAGRAM – SYSTEM B				
E310	SCHEDULES & CALCULATIONS				
E311	SCHEDULES & CALCULATIONS				
E410	GROUNDING DETAILS				
E411	FENCE GROUNDING DETAILS				
E420	ELECTRICAL DETAILS				
E500	LABELS & SIGNAGE				
E600	EQUIPMENT DATA SHEETS				
STRUC	TURAL				
S100	STRUCTURAL PAD DETAILS				
S200	STRUCTURAL RACK DETAILS				

LEGEND:	
UPDATED DRAWING ISSUED	
UNCHANGED, PREVIOUSLY ISSUED DRAWING STILL CURRENT	Ο
DRAWING REMOVED FROM SET	X

	PM ENG CHK	SK MeB RI	SK MeB RI	SK MeB RI	SK MeB RI
	REVISION DESCRIPTION	PERMIT SET 90%	INCEPTUAL DESIGN (REV 1)	CONCEPTUAL DESIGN	LAYOUT REVISION
	DATE	01/31/2024	12/07/2023 CO	10/20/2023	10/11/2023
			111 RIVER STREET, HOBOKEN, NJ	WWW.PUREPOWER.COM RICHARD A. IVINS	RI LICENSE No. 10105
U TOTAL	ENGINEER	No 10105		REGISTERED	PROFESSIONAL ENGINEER
		EDP RENEWABLES	100 PARK AVENUE, 241H FLOOR New York ny 10017	WWW.EDPR.COM	
	DEVELOPER				Kenewables
	PAGE SIZE	36" × 24"			04/59.02
	DC SYSTEM SIZE: 4,366.44 kW	AC SYSTEM SIZE: 3,500.00 kW	MUDULE IYPE: HANWHA Q.PEAK 585W	ORIENTATION: 30° TILT, 180° AZIMUTH	
	PROJECT SOLAR GROUND MOUNT SYSTEM			24/3 VICIORY HIGHWAY,	COVENTRY, RI 02816
		dra G	.win	G ≠ D1	¥

RAWING TITLE

TITLE SHEET

![](_page_23_Figure_0.jpeg)

TYPICAL TABLE S 2 MODULES HIGH 24 MODULES WI PORTRAIT ORIEN FIXED TILT RACKNG. SEE MANUFACTURER DRAWINGS FOR ADDITIONAL DETAILS 3'-0"(MIN) /- 10FT SETBACK FROM RETENTION BASIN (TYPICAL) REFER TO CIVIL PLANS. / RETENTION BASIN (TYPICAL) REFER TO CIVIL PLANS. \_\_\_\_\_\_ \_\_\_\_\_ - \_\_\_\_ - \_\_\_\_ - \_\_\_\_ - \_\_\_\_ - \_\_\_\_ - Câ 

\_\_\_\_\_

EQUIPMENT PAD SYUSTEM A WITH SOLAR -TRANSFORMER, SOLAR AC COMBINERS, INVERTERS, & GROUNDING TRANSFORMER.

PROPOSED 20' WIDE SITE ACCESS ROAD.  $\frown$  REFER TO CIVIL PLANS.

COMMUNICATIONS CONDUIT IN DUCTBANK TO MV DAS MV CONDUIT IN DUCTBANK TO RISER POLE

> EQUIPMENT PAD SYUSTEM B WITH SOLAR TRANSFORMER, SOLAR AC COMBINERS, INVERTERS, & GROUNDING TRANSFORMER.

15FT OFFSET FROM FENCE (MINIMUM) ----

![](_page_23_Picture_13.jpeg)

 $1 \underbrace{\text{ELECTRICAL PLAN}}_{\text{SCALE: 1" = 80'}}$ 

<u>SIZE</u> GH VIDE	* RACKING DIMENSIONS SHOWN ARE TYPICAL FO SUN ANGLE AND DIMENSIONS MAY VARY WHERE	)R FLAT GRADE. SLOPES EXIST.	ENG CHK MeB RI MeB RI MeB RI MeB RI
			DATEREVISION DESCRIPTIONPM0/2024PERMIT SET 90%SK7/2023CONCEPTUAL DESIGN (REV 1)SK0/2023CONCEPTUAL DESIGN (REV 1)SK1/2023LAYOUT REVISIONSK
	RACKING DETAIL   SCALE: NONE		CINEER No REGISTERED PROFESSIONAL ENGINE PROFESSIONAL ENGINE PROFESSIONAL ENGINE RECITIONE RECORDE RECITIONE REC
		10FT SETBACK FROM RETENTION BASIN (TYPICAL) REFER TO CIVIL PLANS.	EDP RENEWABLES 100 PARK AVENUE, 24TH FLOOR NEW YORK, NY 10017 WWW.EDPR.COM
		PROPOSED VEHICLE TURNAROUND REFER TO CIVIL PLANS.	SYSTEM SIZE: 4,366.44 kW SYSTEM SIZE: 3,500.00 kW DULE TYPE: HANWHA Q.PEAK 585W DULE TYPE: HANWHA Q.PEAK 585W DULE QUANTITY: 7464 IENTATION: 30° TILT, 180° AZIMUTH 04759.02
		DRAWING TITLE	PROJECT SOLAR GROUND MOUNT SYSTEM AC MOO COW 2473 VICTORY HIGHWAY, COVENTRY, RI 02816
		ELECTRICAL PLAN	E100

![](_page_24_Figure_0.jpeg)

6\_\_\_\_

 $\sim$ 

9\_\_\_

4—

1) ONE LINE DIAGRAM – SYSTEM A scale: none

<ul> <li>DRAWING NOTES:</li> <li>1. CONTRACTOR SHALL FIELD-VERIFY INTERCONNECTION MEANS/METHODS PRIOR TO INSTALLATION. COORDINATED SHUTDOWN MAY BE REQUIRED.</li> <li>2. ALL GROUND BARS AND LUGS SHALL BE DUAL RATED AL/CU.</li> <li>3. UNLESS OTHERWISE NOTED EQUIPMENT IS PERMITTED TO BE 80% OR 100% RATED.</li> <li>4. PVC SCH80 REQUIRED WHERE PVC IS SPECIFIED. PVC SCH40 IS PERMITTED FOR UNDERGROUND STRAIGHT RUNS ONLY.</li> <li>5. SET NEW ELECTRONIC-TRIP BREAKERS TO THE SETTINGS BELOW, UNLESS OTHERWISE NOTED IN POWER STUDY. "NOMINAL TRIP" REFERS TO BREAKER TRIP RATING INDICATED ON ONELINE. SETTINGS BELOW ARE NOT FOR COORDINATION PURPOSES.</li> <li>L = 100% OF NOMINAL TRIP (EXACT) MINIMUM TIME DELAY</li> <li>S = 125% OF NOMINAL TRIP (OR NEXT HIGHER) MINIMUM TIME DELAY</li> <li>I = MINIMUM VALUE GREATER THAN NOMINAL TRIP</li> <li>G = 20% OF NOMINAL TRIP (OR NEXT HIGHER) 0.5 SEC TIME DELAY</li> </ul>	PROJECT SOLAR GROUND MOUNT SYSTEM MOO COW 2473 VICTORY HIGHWAY,
ONE LINE DIAGRAM	F 300
- SYSIEM A	

IEEE 1547. 2. THE DER SHALL NOT CONNECT OR RETURN TO SERVICE FOLLOWING A TRIP UNTIL DETECTING 5 MINUTES OF HEALTHY UTILITY VOLTAGE AND FREQUENCY AS DEFINED IN ESB7560 TABLE 7.8.3-1. 3. RELAY WILL TRIP THE CUSTOMER RECLOSER ON LOSS OF DC POWER, HARDWARE FAULT AND PROGRAM FAULT UNDER 2 SECONDS.

#### SOLAR AC SWITCHBOARD B 600Y/347V, 3ø, 4W 2500A, 65KAIC NEMA 3R

ANSI ELEMENT

# 27

27

59

59

81U-1

81U-2

810-1

810-2

51

51G

79

79

79

79

74

NOTE:

Pickup

1.26V

0.71V

1.58V

1.72V

56.50

58.50

62.00

61.20

2.87A

0.42A

1.36V

1.51V

59.50

60.50

162.23A USED FOR 50/51 ELEMENTS

CT RATIO FACTOR = 100

1. DER MUST CHECK FOR HEALTHY VOLTAGE AND

FREQUENCY FOR 5 MINUTES BEFORE INTERCONNECTING PER

Real

6335.6V

3599.7V

7919.5V

8639.4V

56.5Hz

58.5Hz

62Hz

61.2Hz

324.4A

42A

6839.5V

7559.5V

59.5Hz

60.5Hz

	-														
(	175A 3P	(	175A 3P	(	175A 3P (	175A (	175A ()	175A 3P	175A 3P (	175A 3P (	175A 3P (	175A 3P (	175A 3P	175A 3P (	175A 3P <b>(</b>
	INV	'ERT	ER B2		INVERT	TER B4	INVERT	ER B6	INVERT	ER B8	INVERT	ER B10	INVERT	ER B12	INVERT
INVER	TER B1		INV	ERT	ER B3	INVERT	ER B5	INVERT	ER B7	INVERT	ER B9	INVERT	ER B11	INVERTE	ER B13

SEL-651R

1.95

1.05

1.95

0.11

0.11

299.95

0.11

299.95

300.00

300.00

300.00

300.00

1.90

Level

88.0%

50.0%

110.0%

120.0%

94.3%

97.5%

103.4%

102.0%

200.0%

25.9%

95.0%

105.0%

99.2%

100.8%

Delay (sec)\* | Total Clear Time (sec) | Curve

2.00

1.10

2.00

0.16

0.16

300.00

0.16

300.00

300.05

300.05

300.05

300.05

1.95

7199.5V USED FOR 27/59 ELEMENTS

LEA RATIO FACTOR = 5000

U1,TD=2

U1,TD=1.1

Description

Slow UV

Fast UV

Slow OV

Fast OV

Fast UF

Slow UF

Fast OF

Slow OF

Time Phase OC

Timed Ground Overcurrent

Minimum Voltage Value

Maximum Voltage Value

Minimum Frequency Value

Maximum Frequency Value

Relay Alarm

SYSTEM SUMMARY – SYSTEM B							
DC SYSTEM SIZE	2,204.280 KW						
AC SYSTEM SIZE	1,750.000 KW						
(QTY) MODULE TYPE	(3768) Q.PEAK DUO XL-G11S.3 585W						
INVERTER	CPS SCH125KTL-US						
INVERTER QTY	14						
UTILITY	NATIONAL GRID – RI						

24

INVERTER UL1741-SA Compliant								
ANSI ELEMENT #	Pickup	Real	Level		Total Clear Time (sec)	Curve	Description	
27	305.36	305.36V	88.0%		2.00		Slow UV	
27	173.50	173.5V	50.0%		1.10		Fast UV	
59	381.70	381.7V	110.0%		2.00		Slow OV	
59	416.40	416.4V	120.0%		0.16		Fast OV	
81U-1	56.50	56.5Hz	94.3%		0.16		Fast UF	
81U-2	58.50	58.5Hz	97.5%		300.00		Slow UF	
810-1	62.00	62Hz	103.4%		0.16		Fast OF	
810-2	61.20	61.2Hz	102.0%		300.00		Slow OF	
79	329.65V	329.6V	95.0%	300.00	300.05		Minimum Voltage Value	
79	364.35V	364.3V	105.0%	300.00	300.05		Maximum Voltage Value	
79	59.50	59.5Hz	99.2%	300.00	300.05		Minimum Frequency Value	
79	60.50	60.5Hz	100.8%	300.00	300.05		Maximum Frequency Value	
PF Set Point		1.00					Power Factor Control	
Var Control		OFF					Reactive Power Control	
Ramp Rate		2%/1 sec					dkw / dt	
Freq Control		OFF					Speed Control	
Factory Settings (Voltage is measured between phase & neutral)								

![](_page_25_Figure_7.jpeg)