

GROUND MOUNT SOLAR PERMIT PACKAGE

REFRIGERATOR

22.000KW DC MINI OFF GRID TIED PHOTOVOLTAIC SYSTEM

XXXXXXXXXXXXXXXXXXXX

PV SYSTEM SUMMARY:

SYSTEM SIZE (DC) : STC: 550 x 40 = 22.000kW DC
 : PTC: 515.6 x 40 = 20.6240kW DC
 SYSTEM SIZE (AC) : 66.000kW AC @ 480V
 MODULES : (40) ZNSHINE SOLAR: ZXM7-SHDB144-550
 INVERTER : SOLARK: 60K-3P-480V
 TILT : 20°
 AZIMUTH : 180°
 ATTACHMENT TYPE : UNIRAC GROUND MOUNT FIXED TILT SYSTEM
 GENERATOR : (1) GENERAC 36KW BACKUP GENERATOR
 BATTERY : (2) SOLARK: L3 HV-60KWH BATTERY

GENERAL GUIDELINES:

1. CONDUIT AND CONDUCTOR SPECIFICATIONS ARE BASED ON MINIMUM CODE REQUIREMENTS AND ARE NOT MEANT TO LIMIT UP-SIZING AS REQUIRED BY FIELD CONDITIONS.
2. ALL SOLAR ENERGY SYSTEM EQUIPMENT SHALL BE SCREENED TO THE MAXIMUM EXTENT POSSIBLE AND SHALL BE PAINTED A COLOR SIMILAR TO THE SURFACE UPON WHICH THEY ARE MOUNTED.
3. MODULES SHALL BE TESTED, LISTED AND IDENTIFIED WITH FIRE CLASSIFICATION IN ACCORDANCE WITH UL 2703. SMOKE AND CARBON MONOXIDE ALARMS ARE REQUIRED PER SECTION R314 AND 315 TO BE VERIFIED AND INSPECTED BY INSPECTOR IN THE FIELD.
4. DIG ALERT (811) TO BE CONTACTED AND COMPLIANCE WITH EXCAVATION SAFETY PRIOR TO ANY EXCAVATION TAKING PLACE.
5. PHOTOVOLTAIC SYSTEM GROUND WILL BE TIED INTO EXISTING GROUND AT MAIN SERVICE FROM DC DISCONNECT/INVERTER AS PER 2014 AC SEC 250.166(A).
6. SOLAR PHOTOVOLTAIC SYSTEM EQUIPMENT WILL BE INSTALLED IN ACCORDANCE WITH REQUIREMENTS OF ART. 690 OF THE 2014 AC.
7. UTILITY COMPANY WILL BE NOTIFIED PRIOR TO ACTIVATION OF THE SOLAR PV SYSTEM.
8. TERMINALS OF THE DISCONNECTING MEANS MAY BE ENERGIZED IN THE OPEN POSITION.
9. PHOTOVOLTAIC SYSTEM WILL COMPLY WITH 2022 CEC.
10. ELECTRICAL EQUIPMENT AND MATERIAL TO BE LISTED, LABELED, AND INSTALLED PER THE CEC, THE INSTALLATION STANDARDS/MANUFACTURER'S RECOMMENDATIONS AND IF REQUIRED A RECOGNIZED ELECTRICAL TESTING LABORATORY.

CODE INFORMATION

THE INSTALLATION OF SOLAR ARRAYS AND PHOTOVOLTAIC POWER SYSTEMS SHALL COMPLY WITH THE FOLLOWING CODES/REGULATIONS:

- 2022 CALIFORNIA BUILDING CODE
- 2022 CALIFORNIA FIRE CODE
- 2022 CALIFORNIA PLUMBING CODE
- 2022 CALIFORNIA MECHANICAL CODE
- 2022 CALIFORNIA ENERGY CODE
- 2022 CALIFORNIA RESIDENTIAL CODE
- 2022 CALIFORNIA ADMINISTRATIVE CODE
- 2022 CALIFORNIA ELECTRICAL CODE

AHJ : SAN DIEGO COUNTY

WIND SPEED : 110
 SNOW LOAD : 40
 EXPOSURE CATEGORY : C

AERIAL VIEW



VICINITY VIEW



SHEET INDEX

PV-1.0	COVER PAGE
PV-2.0	SITE PLAN
PV-3.0	STRUCTURAL
PV-4.0	ELECTRICAL 3LD
PV-4.1	WIRE CALCULATIONS
PV-5.0	BOM
PV-6.0	SIGNAGE
PV-6.1	PLACARD
PV-7.0+	SPECS+

DESIGN BY :



CONTRACTOR :

xxxx REFRIGERATOR

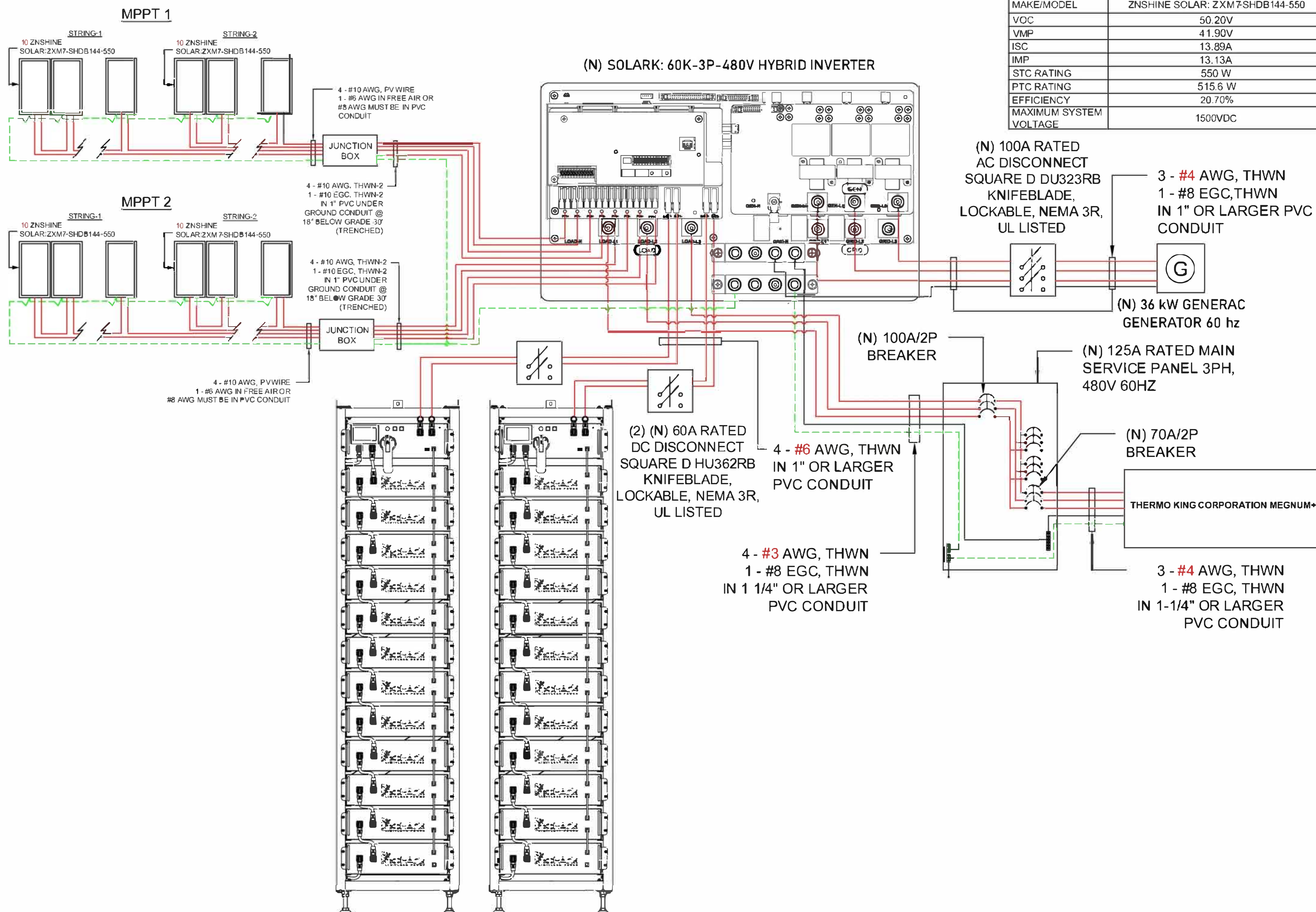
22.000KW DC PHOTOVOLTAIC SYSTEM

XXXXXXX

Rev	Description	Date
A	INITIAL DESIGN	xxxx
A.1	UPDATED DESIGN	xxxx

OPPORTUNITY	xxx REFR GERATOR N/A
PROJECT #	
DATE DRAWN	xxxx
DRAWN BY	xxxx
SHEET #	PV-1.0

TITLE
COVER PAGE



MODULE INFO	
MAKE/MODEL	ZNSHINE SOLAR: ZXM7-SHDB144-550
VOC	50.20V
VMP	41.90V
ISC	13.89A
IMP	13.13A
STC RATING	550 W
PTC RATING	515.6 W
EFFICIENCY	20.70%
MAXIMUM SYSTEM VOLTAGE	1500VDC

DESIGN BY :



CONTRACTOR :

xxx REFRIGERATOR

22.000KW DC PHOTOVOLTAIC SYSTEM

XXXXXXXXXX

Rev	Description	Date
A	INITIAL DESIGN	
A.1	UPDATED DESIGN	
OPPORTUNITY		Zxxx REFR GERATOR N/A
PROJECT #		
DATE DRAWN		xxxx
DRAWN BY		xxx
SHEET #		PV-4.0

TITLE
ELECTRICAL 3LD