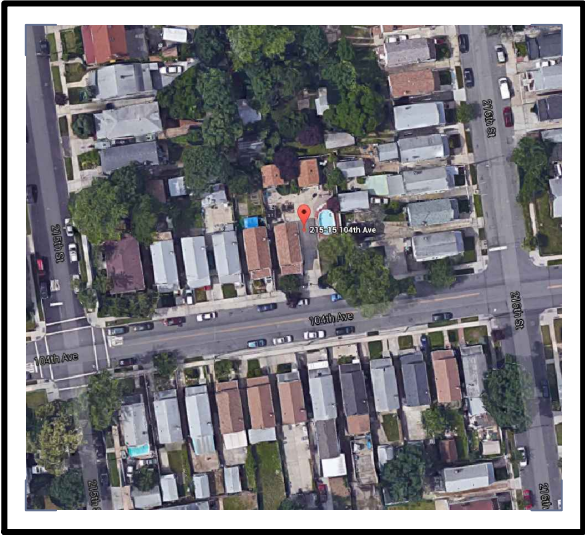
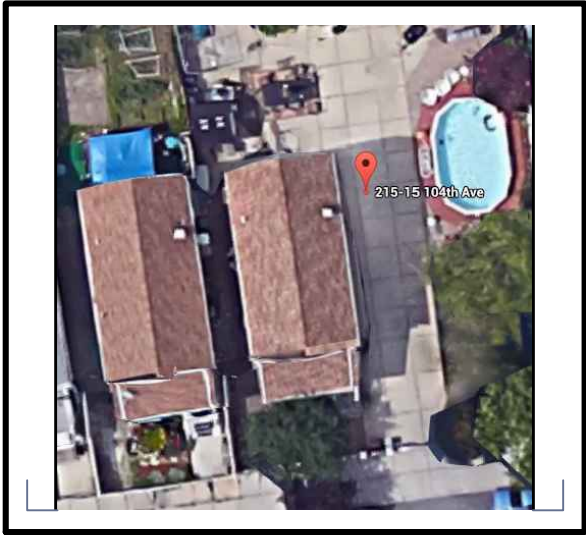


INSTALLATION OF NEW ROOF MOUNTED
4.68kW PV SYSTEM
215-15 104TH AVE
QUEENS VILLAGE, NY 11429

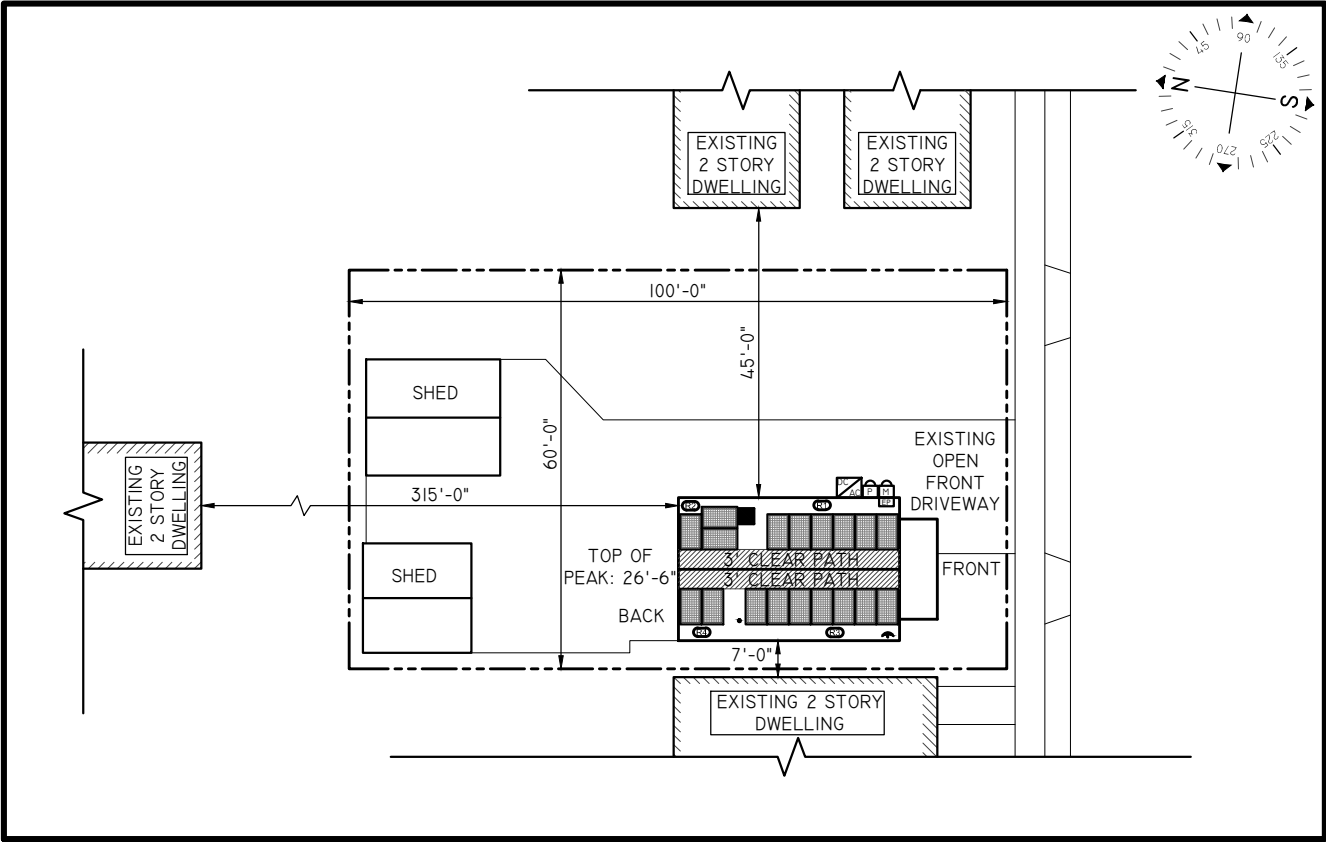


VICINITY MAP
SCALE: NTS



SATELLITE VIEW
SCALE: NTS

LOT DIAGRAM
SCALE: 1"=500'



GENERAL NOTES

1. THE INSTALLATION CONTRACTOR IS RESPONSIBLE FOR INSTALLING ALL EQUIPMENT AND FOLLOWING ALL DIRECTIONS AND INSTRUCTIONS CONTAINED IN THE DRAWING PACKAGE AND INFORMATION RECEIVED FROM TRINITY.
2. THE INSTALLATION CONTRACTOR IS RESPONSIBLE FOR INSTALLING ALL EQUIPMENT AND FOLLOWING ALL DIRECTIONS AND INSTRUCTION CONTAINED IN THE COMPLETE MANUAL.
3. THE INSTALLATION CONTRACTOR IS RESPONSIBLE FOR READING AND UNDERSTANDING ALL DRAWINGS, COMPONENT AND INVERTER MANUALS PRIOR TO INSTALLATION. THE INSTALLATION CONTRACTOR IS ALSO REQUIRED TO HAVE ALL COMPONENT SWITCHES IN THE OFF POSITION AND FUSES REMOVED PRIOR TO THE INSTALLATION OF ALL FUSES BEARING SYSTEM COMPONENTS.
4. ONCE THE PHOTOVOLTAIC MODULES ARE MOUNTED, THE INSTALLATION CONTRACTOR SHOULD HAVE A MINIMUM OF ONE ELECTRICIAN WHO HAS ATTENDED A SOLAR PHOTOVOLTAIC INSTALLATION COURSE ON SITE.
5. FOR SAFETY, IT IS RECOMMENDED BY THE MANUFACTURE THAT THE INSTALLATION CREW ALWAYS HAVE A MINIMUM OF TWO PERSONS WORKING TOGETHER AND THAT EACH OF THE INSTALLATION CREW MEMBERS BE TRAINED IN FIRST AID AND CPR.
6. THIS SOLAR PHOTOVOLTAIC SYSTEM IS TO BE INSTALLED FOLLOWING THE CONVENTIONS OF THE NATIONAL ELECTRIC CODE. ANY LOCAL CODE WHICH MAY SUPERSEDE THE NEC SHALL GOVERN.
7. ALL SYSTEM COMPONENTS TO BE INSTALLED WITH THIS SYSTEM ARE TO BE "UL" LISTED. ALL EQUIPMENT WILL BE NEMA 3R OUTDOOR RATED UNLESS INDOORS.

GENERAL NOTES CONTINUED

8. THE DC VOLTAGE FROM THE PANELS IS ALWAYS PRESENT AT THE DC DISCONNECT ENCLOSURE AND THE DC TERMINALS OF THE INVERTER DURING DAYLIGHT HOURS. ALL PERSONS WORKING ON OR INVOLVED WITH THE PHOTOVOLTAIC SYSTEM ARE WARNED THAT THE SOLAR MODULES ARE ENERGIZED WHENEVER THEY ARE EXPOSED TO LIGHT.
9. ALL PORTIONS OF THIS SOLAR PHOTOVOLTAIC SYSTEM SHALL BE MARKED CLEARLY IN ACCORDANCE WITH THE NATIONAL ELECTRIC CODE ARTICLE 690.
10. PRIOR TO THE INSTALLATION OF THIS PHOTOVOLTAIC SYSTEM, THE INSTALLATION CONTRACTOR SHALL ATTEND A PRE-INSTALLATION MEETING FOR THE REVIEW OF THE INSTALLATION PROCEDURES, SCHEDULES, SAFETY AND COORDINATION.
11. PRIOR TO THE SYSTEM START UP THE INSTALLATION CONTRACTOR SHALL ASSIST IN PERFORMING ALL INITIAL HARDWARE CHECKS AND DC WIRING CONDUCTIVITY CHECKS.
12. FOR THE PROPER MAINTENANCE AND ISOLATION OF THE INVERTS REFER TO THE ISOLATION PROCEDURES IN THE OPERATION MANUAL.
13. THE LOCATION OF PROPOSED ELECTRIC AND TELEPHONE UTILITIES ARE SUBJECT TO FINAL APPROVAL OF THE APPROPRIATE UTILITY COMPANIES AND OWNERS.
14. ALL MATERIALS, WORKMANSHIP AND CONSTRUCTION FOR THE SITE IMPROVEMENTS SHOWN HEREIN SHALL BE IN ACCORDANCE WITH:
 - A) CURRENT PREVAILING MUNICIPAL AND/OR COUNTY SPECIFICATIONS, STANDARDS AND REQUIREMENTS

GENERAL NOTES CONTINUED

14. B) CURRENT PREVAILING UTILITY COMPANY SPECIFICATIONS, STANDARDS, AND REQUIREMENTS
15. THIS SET OF PLANS HAVE BEEN PREPARED FOR THE PURPOSE OF MUNICIPAL AND AGENCY REVIEW AND APPROVAL. THIS SET OF PLANS SHALL NOT BE UTILIZED AS CONSTRUCTION DRAWINGS UNTIL REVISED TO INDICATE "ISSUED FOR CONSTRUCTION".
16. ALL INFORMATION SHOWN MUST BE CERTIFIED PRIOR TO USE FOR CONSTRUCTION ACTIVITIES.

NOTES

1. PV INSTALLATION TO COMPLY WITH ARTICLE 690 OF THE NEC.
2. PV INSTALLATION TO COMPLY WITH NYSEDA REQUIREMENTS.
3. PV INSTALLATION TO COMPLY WITH NEW YORK STAT STANDARDIZED INTERCONNECTION REQUIREMENTS.

2008 NOTES

1. PV INSTALLATION TO COMPLY WITH NYC ELECTRIC CODE 2011.

PLAN NOTES

1. SCOPE OF WORK IS SOLEY FOR THE INSTALLATION OF THE SOLAR ELECTRONIC GENERATING SYSTEM. ALL OTHER WORK IS NOT TO BE RELIED UPON AS BEING APPROVED AND/OR PERMITTED BY THE DOB

SPECIAL INSPECTIONS:

- STRUCTURAL
- STABILITY
- FIRE STOP
- PROGRESS INSPECTIONS:
- ENERGY CODE COMPLIANCE
- FINAL INSPECTION
- VISUAL AIR SEALING

TENANT SAFETY NOTES

1. CONSTRUCTION WORK WILL BE CONFINED TO THE ROOF / OUTSIDE & WILL NOT CREATE DUST, DIRT OR OTHER INCONVENIENCES TO NEIGHBORING PROPERTIES OR APARTMENT UNITS WITHIN THE BUILDING.
2. CONSTRUCTION WORK WILL NOT BLOCK HALLWAYS OR MEANS OF EGRESS FOR NEIGHBORING PROPERTIES OR TENANTS OF THE BUILDING.
3. CONSTRUCTION WORK WILL NOT INVOLVE INTERRUPTION OF HEATING, WATER OR ELECTRIC SERVICES TO NEIGHBORING PROPERTIES OR TENANTS OF THE BUILDING.
4. CONSTRUCTION WORK WILL BE CONFINED TO NORMAL WORKING HOURS, 8AM - 5PM MONDAY THRU FRIDAY EXCEPT LEGAL HOLIDAYS.

TENANT PROTECTION PLAN

SPECIAL PRECAUTION SHALL BE TAKEN BY THE CONTRACTOR SO THAT EQUIPMENT ON THIS APPLICATION AND ITS INSTALLATION WILL NOT AFFECT THE FOLLOWING:

- A. TENANT EGRESS TO AND FROM THE BUILDING.
- B. FIRE SAFETY, OR CREATE A FIRE HAZARD.
- C. STRUCTURAL SAFETY OF THE BUILDING
- D. ACCUMULATION OF DUST. THE CONTRACTOR SHALL LEAVE THE WORK SITE BROOM CLEAN EACH DAY. IN THE EVENT THAT ASBESTOS IS FOUND ON THE JOBSITE, ITS REMOVAL SHALL TAKE PLACE IN ACCORDANCE WITH ALL APPLICABLE REGULATIONS OF O.S.H.A SECTION 1901.1, INCLUDING STAT AND FEDERAL DUMPING GROUNDS
- E. THERE SHALL BE NO CREATION OF NOISE OUTSIDE THE NORMAL HOURS OF 8AM TO 5PM MONDAY THRU FRIDAY EXCEPT LEGAL HOLIDAYS

ABBREVIATIONS

AMP	AMPERE
AC	ALTERNATING CURRENT
AL	ALUMINUM
AF	AMP. FRAME
AFF	ABOVE FINISHED FLOOR
AFG	ABOVE FINISHED GRADE
AWG	AMERICAN WIRE GAUGE
C	CONDUIT (GENERIC TERM OF RACEWAY, PROVIDE AS SPECIFIED)
CB	COMBINER BOX
CKT	CIRCUIT
CT	CURRENT TRANSFORMER
CU	COPPER
DC	DIRECT CURRENT
DISC	DISCONNECT SWITCH
DWG	DRAWING
EC	ELECTRICAL SYSTEM INSTALLER
EMT	ELECTRICAL METALLIC TUBING
FS	FUSIBLE SWITCH
FU	FUSE
GND	GROUND
GFI	GROUND FAULT INTERRUPTER
HZ	FREQUENCY (CYCLES PER SECOND)

ABBREVIATIONS CONTINUED

JB	JUNCTION BOX
KCMIL	THOUSAND CIRCULAR MILS
kVA	KILO-VOLT AMPERE
kW	KILO-WATT
KWH	KILO-WATT HOUR
L	LINE
MCB	MAIN CIRCUIT BREAKER
MDP	MAIN DISTRIBUTION PANEL
MLO	MAIN LUG ONLY
MTD	MOUNTED
MTG	MOUNTING
N	NEUTRAL
NEC	NATIONAL ELECTRICAL CODE
NIC	NOT IN CONTRACT
NO #	NUMBER
NTS	NOT TO SCALE
OCP	OVER CURRENT PROTECTION
P	POLE
PB	PULL BOX
PH Ø	PHASE
PVC	POLY-VINYL CHLORIDE CONDUIT
PWR	POWER
QTY	QUANTITY
RGS	RIGID GALVANIZED STEEL
SN	SOLID NEUTRAL

ABBREVIATIONS CONTINUED

JSWBD	SWITCHBOARD
TYP	TYPICAL
U.O.I.	UNLESS OTHERWISE INDICATED
WP	WEATHERPROOF
XFMR	TRANSFORMER
+72	MOUNT 72 INCHES TO BOTTOM OF ABOVE FINISHED FLOOR OR GRADE

DRAWING INDEX

T- 001.00 - COVER SHEET
S- 001.00 - ROOF LAYOUT
S- 002.00 - ELEVATION DRAWING
S- 003.00 - ELEVATION DRAWING
S- 004.00 - ELEVATION DRAWING
E- 001.00 - ELECTRICAL 3-LINE DRAWING

DEPARTMENT OF BUILDING NOTES

NYC FC504 EXEMPT - PITCH GREATER THAN 5/12
BC 109.3.3
RCNY 5000-01 (H) (IA6) IIA6)
28-116.2.4.2 AND DIRECTIVE 14 OF 1975
RCNY 101-10

PLAN NOTES

1. SCOPE OF WORK IS SOLEY FOR THE INSTALLATION OF THE SOLAR ELECTRONIC GENERATING SYSTEM. ALL OTHER WORK IS NOT TO BE RELIED UPON AS BEING APPROVED AND/OR PERMITTED BY THE DOB

* THE WORK PROPOSED IN THIS APPLICATION IS EXEMPT FROM THE ENERGY CONSERVATION CONSTRUCTION CODE OF NEW YORK CITY
* TO THE BEST OF MY KNOWLEDGE, BELIEF AND PROFESSIONAL JUDGEMENT, THESE PLANS AND SPECIFICATIONS ARE IN COMPLIANCE WITH THE ENERGY CONSERVATION CONSTRUCTION CODE OF NEW YORK CITY 2010

Engineer / License Holder:

Issued / Revisions

NO.	DESCRIPTION	DATE
P1	ISSUED TO TOWNSHIP FOR PERMIT	7/15/2015

Project Title:

SHAKUR, TARAMANIE
TRINITY ACCT #: 2015-53431

Project Address:

215-15 104TH AVE
QUEENS VILLAGE, NY 11429

Drawing Title:

COVER SHEET

Drawing Information

DRAWING DATE:	7/15/2015
DRAWN BY:	KJN
REVISED BY:	

System Information:

TOTAL SYSTEM SIZE:	4.68kW
TOTAL MODULE COUNT:	18
MODULES USED:	TRINA 260
MODULE SPEC #:	TSM-260 PD05.08
UTILITY COMPANY:	CON EDISON
UTILITY ACCT #:	266440090800027
UTILITY METER #:	2781231
DEAL TYPE:	SUNNOVA

DWG No:

T-001.00
PAGE: 1 OF 5



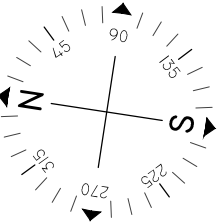
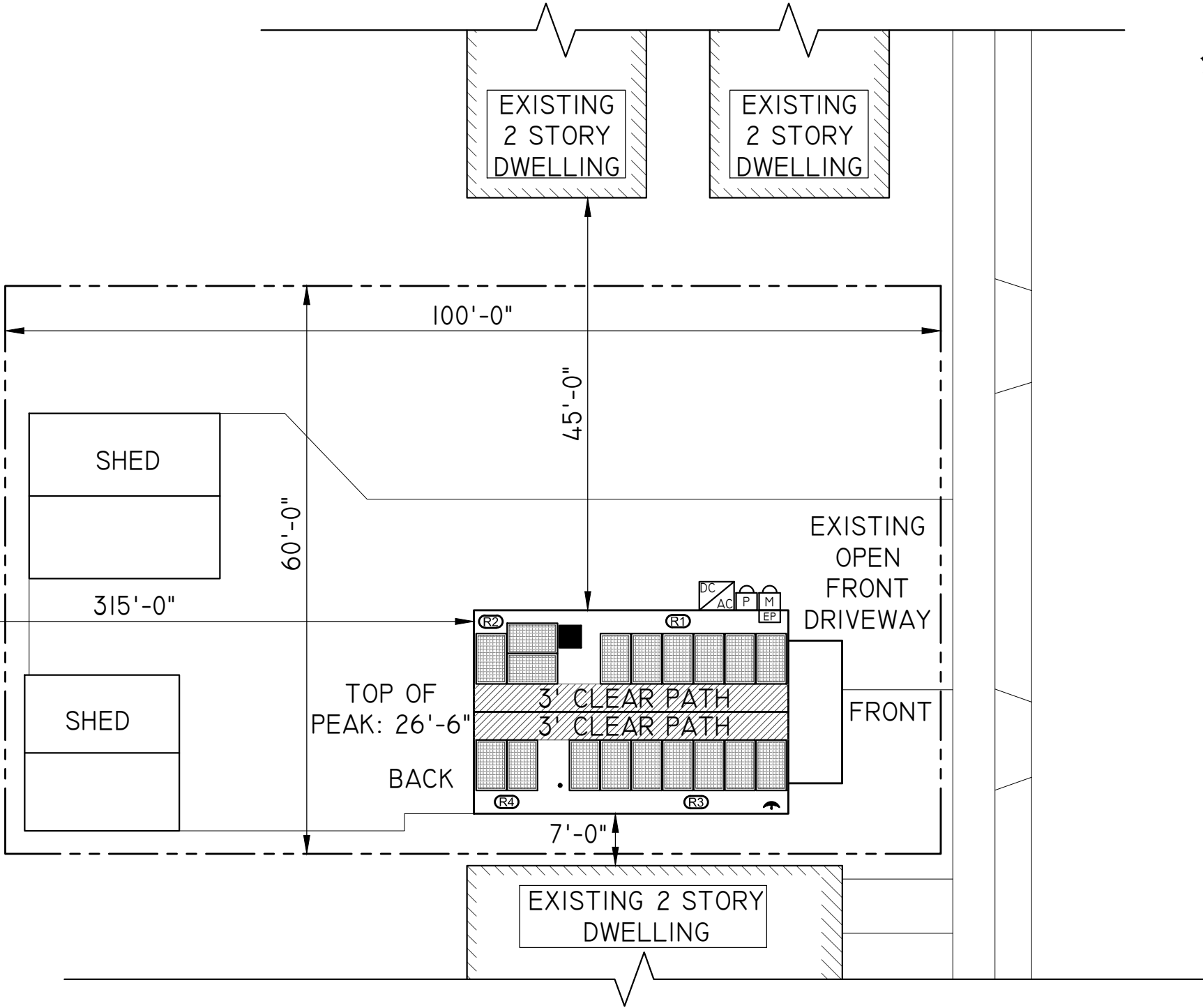
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NYC DEPT OF BUILDING APPROVAL STAMP

SIZE OF EXISTING RAFTER: 2" x 4"
RAFTER SPACING: 20" o.c.
ROOF PITCH R1: 38° (ASPHALT SHINGLE)
ROOF PITCH R2: 38° (ASPHALT SHINGLE)
ROOF PITCH R3: 38° (ASPHALT SHINGLE)
ROOF PITCH R4: 38° (ASPHALT SHINGLE)
ADDITIONAL SUPPORT PROVIDED: YES
THE EXISTING ROOF RAFTERS AT THIS RESIDENCE WITH AN ADDITIONAL STRUCTURAL UPGRADE CAN ADEQUATELY SUPPORT THE PROPOSED SOLAR PV PANEL ASSEMBLY (5 LBS. PSF) AND THE SNOW LOADS (14 LBS. PSF) . IN ADDITION, THE 3" STAINLESS STEEL LAG SCREWS INSTALLED AT 4' o.c. MEET THE UPLIFT REQUIREMENTS OF 4 SCREW MINIMUM PER ASSEMBLY, 6 SCREWS ARE PROVIDED. THIS INSTALLATION MEETS THE REQUIREMENTS OF THE RESIDENTIAL CODE OF NEW YORK STATE AND HAS BEEN FOUND TO BE ACCEPTABLE BY MY OFFICE.

RICHARD GORDON, P.E.












NOTES:

- 1.) ALL EQUIPMENT SHALL BE INSTALLED IN ACCORDANCE WITH THE MANUFACTURER'S INSTALLATION INSTRUCTIONS.
- 2.) ALL OUTDOOR EQUIPMENT SHALL BE RAIN TIGHT WITH MINIMUM NEMA 3R RATING.
- 3.) ALL LOCATIONS ARE APPROXIMATE AND REQUIRE FIELD VERIFICATION.
- 4.) ROOFTOP SOLAR INSTALLATION ONLY PV ARRAY WILL NOT EXTEND BEYOND THE EXISTING BUILDING ENVELOPE

PLAN NOTES

1. SCOPE OF WORK IS SOLEY FOR THE INSTALLATION OF THE SOLAR ELECTRONIC GENERATING SYSTEM. ALL OTHER WORK IS NOT TO BE RELIED UPON AS BEING APPROVED AND/OR PERMITTED BY THE DOB

ARRAY SCHEDULE		SYMBOL LEGEND				PLUMBING SCHEDULE	EQUIPMENT SCHEDULE		NYC DEPT OF BUILDING APPROVAL STAMP
<u>1</u> ARRAY ORIENTATION = 81° MODULE PITCH = 38°		INDICATES ROOF DESIGNATION . REFER TO ARRAY SCHEDULE FOR MORE INFORMATION		INDICATES NEW UTILITY DISCONNECT TO BE INSTALLED OUTSIDE		NEW END CLIP, TYPICAL (REFER TO THE UNIRAC CODE-COMPLIANT INSTALLATION MANUAL SECTION 3.2.5 FOR SPECS AND DETAILS)	QTY	SPEC #	
<u>2</u> ARRAY ORIENTATION = 81° MODULE PITCH = 38°		INDICATES EXISTING METER LOCATION		INDICATES NEW PV SOLAR MODULE. RED MODULES INDICATE PANELS THAT USE MICRO INVERTERS. REFER TO EQUIPMENT SCHEDULE FOR SPECS.		NEW MID CLIP, TYPICAL (REFER TO THE UNIRAC CODE-COMPLIANT INSTALLATION MANUAL SECTION 3.2.5 FOR SPECS AND DETAILS)	18	TRINA 260 (TSM-260 PD05.08)	
<u>3</u> ARRAY ORIENTATION = 261° MODULE PITCH = 38°		INDICATES EXISTING ELECTRICAL PANEL LOCATION: IN BASEMENT		INDICATES NEW PRODUCTION METER TO BE INSTALLED OUTSIDE.	---	NEW UNIRAC RAIL, TYPICAL (REFER TO THE UNIRAC CODE-COMPLIANT INSTALLATION MANUAL FOR SPECS AND DETAILS)	1	SE3800A-US	
<u>4</u> ARRAY ORIENTATION = 261° MODULE PITCH = 38°	A	INDICATES PLUMBING DESIGNATION. REFER TO PLUMBING SCHEDULE FOR DETAILS		INDICATES NEW INVERTER TO BE INSTALLED OUTSIDE. REFER TO EQUIPMENT SCHEDULE FOR SPECS.	●	NEW MOUNTING FOOT/ ATTACHMENT POINTS, TYPICAL (REFER TO ENGINEERING LETTER FOR SPACING AND DETAILS)			

Engineer / License Holder:

Issued / Revisions

NO.	DESCRIPTION	DATE
P1	ISSUED TO TOWNSHIP FOR PERMIT	7/15/2015

Project Title:

SHAKUR, TARAMANIE
TRINITY ACCT #: 2015-53431

Project Address:

215-15 104TH AVE
QUEENS VILLAGE, NY 11429

Drawing Title:

ROOF LAYOUT

Drawing Information

DRAWING DATE:	7/15/2015
DRAWN BY:	KJN
REVISED BY:	

System Information:

TOTAL SYSTEM SIZE:	4.68kW
TOTAL MODULE COUNT:	18
MODULES USED:	TRINA 260
MODULE SPEC #:	TSM-260 PD05.08
UTILITY COMPANY:	CON EDISON
UTILITY ACCT #:	266440090800027
UTILITY METER #:	2781231
DEAL TYPE:	SUNNOVA

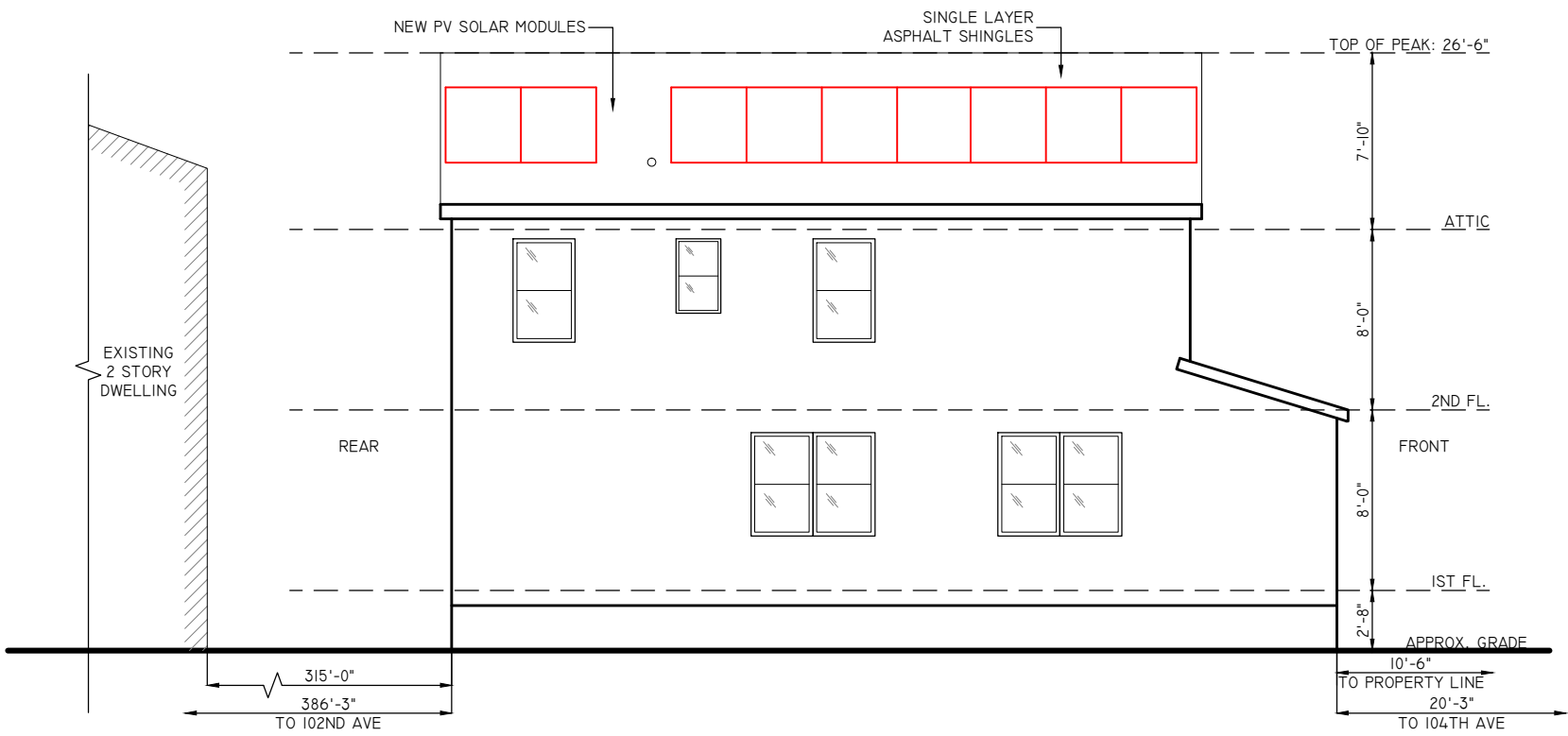
DWG No.

S-001.00

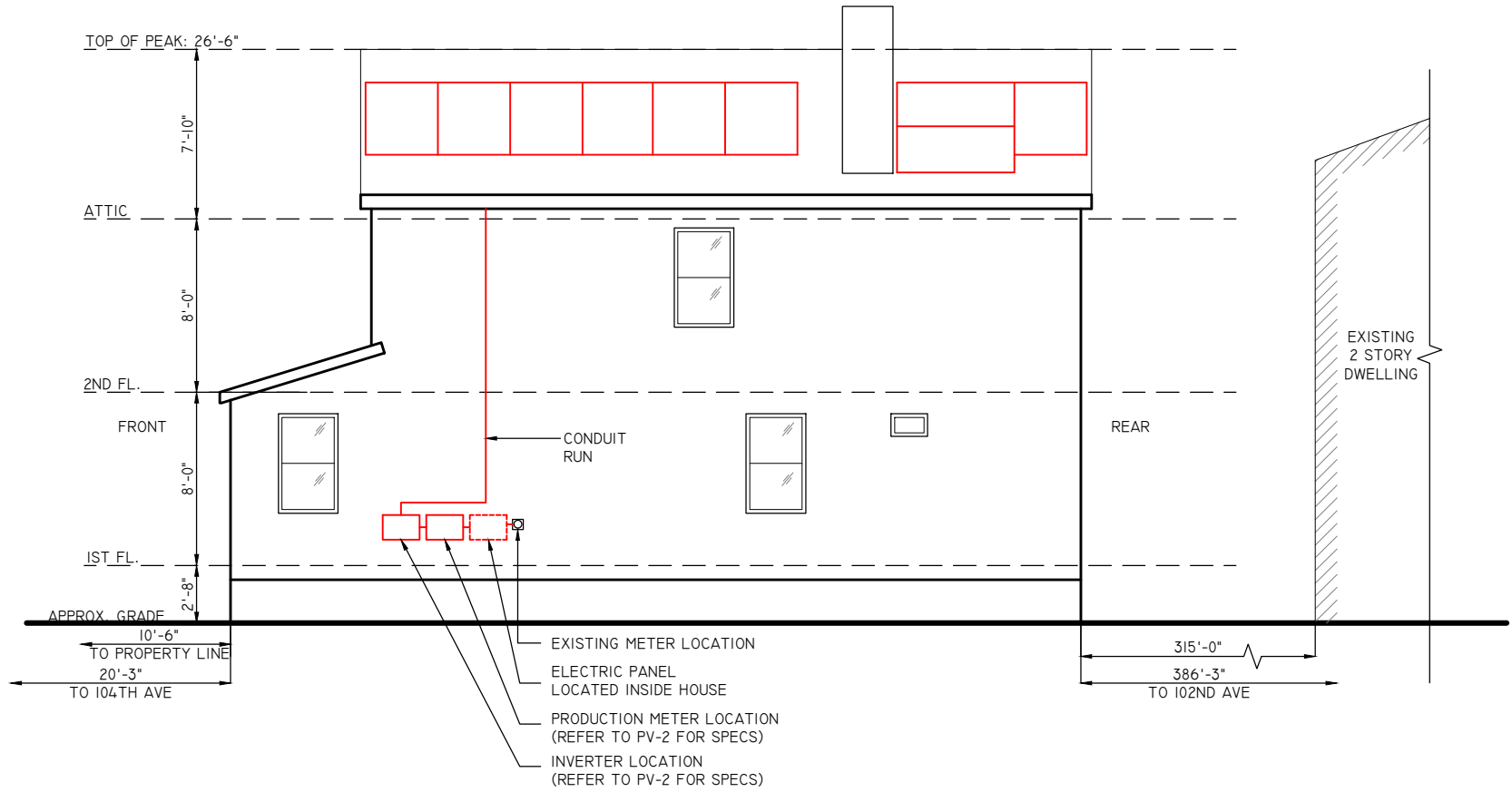
PAGE: 2 OF 5

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NYC DEPT OF BUILDING APPROVAL STAMP



 WEST ELEVATION
SCALE: 1/8"=1'-0"



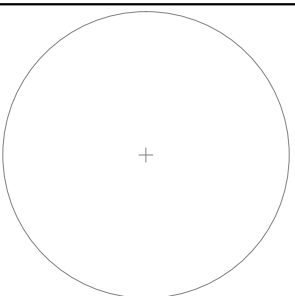
 EAST ELEVATION
SCALE: 1/8"=1'-0"

PLAN NOTES

1. SCOPE OF WORK IS SOLEY FOR THE INSTALLATION OF THE SOLAR ELECTRONIC GENERATING SYSTEM. ALL OTHER WORK IS NOT TO BE RELIED UPON AS BEING APPROVED AND/OR PERMITTED BY THE DOB

NYC DEPT OF BUILDING APPROVAL STAMP

Engineer / License Holder:



Issued / Revisions		
P1	ISSUED TO TOWNSHIP FOR PERMIT	7/15/2015
NO.	DESCRIPTION	DATE

Project Title:

SHAKUR, TARAMANIE
TRINITY ACCT #: 2015-53431

Project Address:

215-15 104TH AVE
QUEENS VILLAGE, NY 11429

Drawing Title:

ELEVATION DRAWING


Drawing Information	
DRAWING DATE:	7/15/2015
DRAWN BY:	KJN
REVISED BY:	

System Information:	
TOTAL SYSTEM SIZE:	4.68kW
TOTAL MODULE COUNT:	18
MODULES USED:	TRINA 260
MODULE SPEC #:	TSM-260 PD05.08
UTILITY COMPANY:	CON EDISON
UTILITY ACCT #:	266440090800027
UTILITY METER #:	2781231
DEAL TYPE:	SUNNOVA

DWG No.

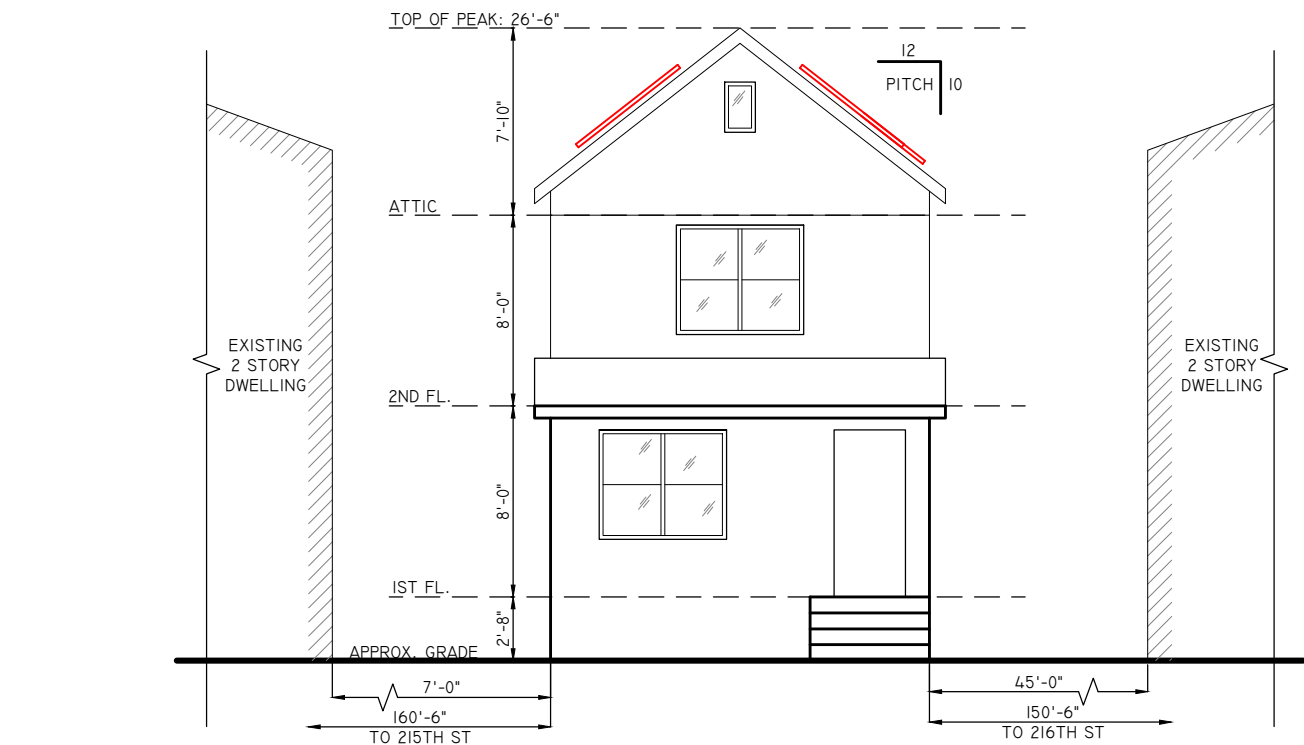
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PAGE: 3 OF 5

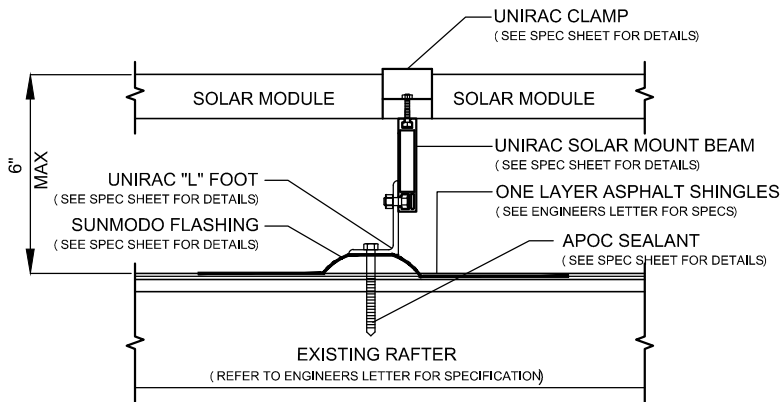


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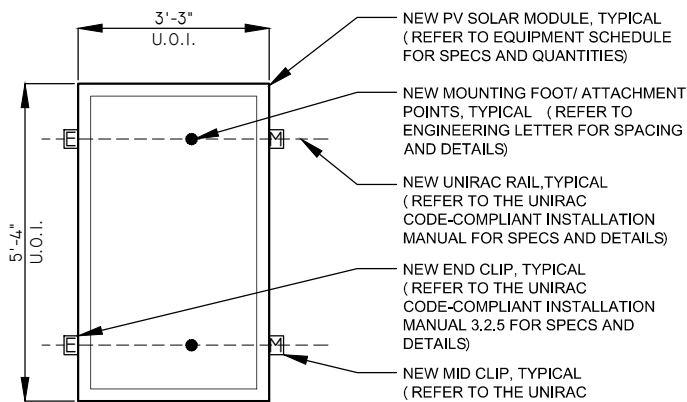
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SOUTH ELEVATION
SCALE: 1/8"=1'-0"



PV MODULE ATTACHMENT ON ASPHALT SHINGLE ROOF
SCALE: NOT TO SCALE



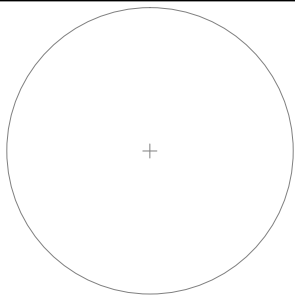
ATTACHMENT & CLIP DETAIL
SCALE: NOT TO SCALE

- NEW PV SOLAR MODULE, TYPICAL
(REFER TO EQUIPMENT SCHEDULE FOR SPECS AND QUANTITIES)
- NEW MOUNTING FOOT/ ATTACHMENT POINTS, TYPICAL (REFER TO ENGINEERING LETTER FOR SPACING AND DETAILS)
- NEW UNIRAC RAIL, TYPICAL
(REFER TO THE UNIRAC CODE-COMPLIANT INSTALLATION MANUAL FOR SPECS AND DETAILS)
- NEW END CLIP, TYPICAL
(REFER TO THE UNIRAC CODE-COMPLIANT INSTALLATION MANUAL 3.2.5 FOR SPECS AND DETAILS)
- NEW MID CLIP, TYPICAL
(REFER TO THE UNIRAC CODE-COMPLIANT INSTALLATION MANUAL 3.2.5 FOR SPECS AND DETAILS)
- NOTE : REFER TO MODULE SPECS FOR ACTUAL MODULE DIMENSIONS

- PLAN NOTES**
- SCOPE OF WORK IS SOLEY FOR THE INSTALLATION OF THE SOLAR ELECTRONIC GENERATING SYSTEM. ALL OTHER WORK IS NOT TO BE RELIED UPON AS BEING APPROVED AND/OR PERMITTED BY THE DOB

NYC DEPT OF BUILDING APPROVAL STAMP

Engineer / License Holder:



Issued / Revisions

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P1	ISSUED TO TOWNSHIP FOR PERMIT	7/15/2015

Project Title:

SHAKUR, TARAMANIE
TRINITY ACCT #: 2015-53431

Project Address:

215-15 104TH AVE
QUEENS VILLAGE, NY 11429

Drawing Title:

ELEVATION DRAWING

Drawing Information

DRAWING DATE:	7/15/2015
DRAWN BY:	KJN
REVISED BY:	

System Information:

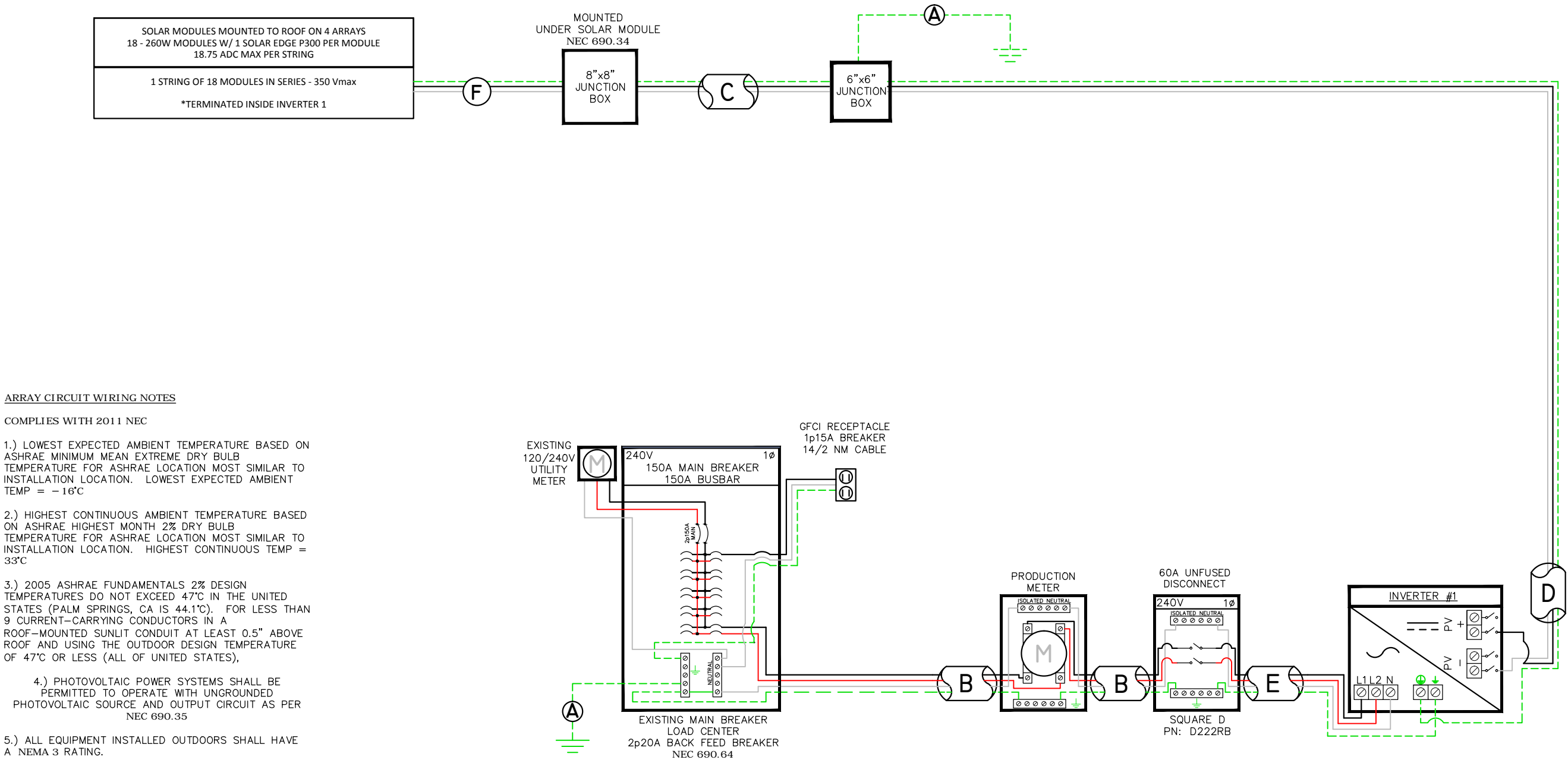
TOTAL SYSTEM SIZE:	4.68kW
TOTAL MODULE COUNT:	18
MODULES USED:	TRINA 260
MODULE SPEC #:	TSM-260 PD05.08
UTILITY COMPANY:	CON EDISON
UTILITY ACCT #:	266440090800027
UTILITY METER #:	2781231
DEAL TYPE:	SUNNOVA

DWG No.

S-003.00
PAGE: 4 OF 5



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ARRAY CIRCUIT WIRING NOTES

COMPLIES WITH 2011 NEC

1.) LOWEST EXPECTED AMBIENT TEMPERATURE BASED ON ASHRAE MINIMUM MEAN EXTREME DRY BULB TEMPERATURE FOR ASHRAE LOCATION MOST SIMILAR TO INSTALLATION LOCATION. LOWEST EXPECTED AMBIENT TEMP = -16°C

2.) HIGHEST CONTINUOUS AMBIENT TEMPERATURE BASED ON ASHRAE HIGHEST MONTH 2% DRY BULB TEMPERATURE FOR ASHRAE LOCATION MOST SIMILAR TO INSTALLATION LOCATION. HIGHEST CONTINUOUS TEMP = 33°C

3.) 2005 ASHRAE FUNDAMENTALS 2% DESIGN TEMPERATURES DO NOT EXCEED 47°C IN THE UNITED STATES (PALM SPRINGS, CA IS 44.1°C). FOR LESS THAN 9 CURRENT-CARRYING CONDUCTORS IN A ROOF-MOUNTED SUNLIT CONDUIT AT LEAST 0.5" ABOVE ROOF AND USING THE OUTDOOR DESIGN TEMPERATURE OF 47°C OR LESS (ALL OF UNITED STATES),

4.) PHOTOVOLTAIC POWER SYSTEMS SHALL BE PERMITTED TO OPERATE WITH UNGROUNDED PHOTOVOLTAIC SOURCE AND OUTPUT CIRCUIT AS PER NEC 690.35

5.) ALL EQUIPMENT INSTALLED OUTDOORS SHALL HAVE A NEMA 3 RATING.

CALCULATIONS FOR CURRENT CARRYING

CONDUCTORS
REQUIRED CONDUCTOR AMPACITY PER STRING
[NEC 690.8(B)(1)]: (15.00*1.25)1 = 18.75A

AWG #10, DERATED AMPACITY
AMBIENT TEMP: 55°C, TEMP DERATING FACTOR: .76
RACEWAY DERATING = 2 CCC: 1.00
(40*.76)1.00 = 30.40A

30.40A ≥ 18.75A, THEREFORE WIRE SIZE IS VALID

TOTAL AC REQUIRED CONDUCTOR AMPACITY
16.00A*1.25 = 20.00A

AWG #10, DERATED AMPACITY
AMBIENT TEMP: 30°C, TEMP DERATING: 1.0
RACEWAY DERATING ≤ 3 CCC: N/A
40A*1.0 = 40A

40A ≥ 20.00A, THEREFORE AC WIRE SIZE IS VALID

CALCULATION FOR PV OVERCURRENT PROTECTION

TOTAL INVERTER CURRENT: 16.00A
16.00A*1.25 = 20.00A
--> 20A OVERCURRENT PROTECTION IS VALID

PV MODULE SPECIFICATIONS	
TRINA 260 (TSM-260 PD05.08)	
Imp	8.5
Vmp	30.6
Voc	38.2
Isc	9

INVERTER #1 - SE3800A-US			
DC		AC	
Imp	13	Pout	3800
Vmp	350	Iout	16
Voc	500	Imax	20
Isc	15	Vnom	240

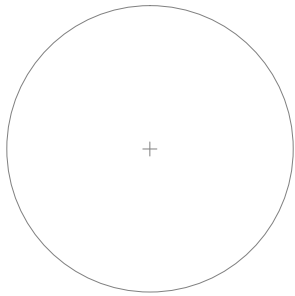
A	#6 THWN-2 GEC TO EXISTING GROUND ROD
B	3/4" EMT W/ 3-#10 THWN-2, 1-#10 THWN-2 GROUND
C	3/4" EMT W/ 2-#10 THWN-2, 1-#8 THWN-2 GROUND
D	3/4" EMT W/ 2-#10 THWN-2, 1-#8 THWN-2 GROUND
E	3/4" EMT W/ 3-#10 THWN-2, 1-#10 THWN-2 GROUND
F	#12 PV WIRE W/ #8 BARE COPPER BOND TO MODULES AND RAILS

PLAN NOTES

- SCOPE OF WORK IS SOLEY FOR THE INSTALLATION OF THE SOLAR ELECTRONIC GENERATING SYSTEM. ALL OTHER WORK IS NOT TO BE RELIED UPON AS BEING APPROVED AND/OR PERMITTED BY THE DOB

NYC DEPT OF BUILDING APPROVAL STAMP

Engineer / License Holder:



Issued / Revisions

NO.	DESCRIPTION	DATE
P1	ISSUED TO TOWNSHIP FOR PERMIT	7/15/2015

Project Title:

SHAKUR, TARAMANIE
TRINITY ACCT #: 2015-53431

Project Address:

215-15 104TH AVE
QUEENS VILLAGE, NY 11429

Drawing Title:

ELECTRICAL 3-LINE
DRAWING

Drawing Information

DRAWING DATE: 7/15/2015
DRAWN BY: KJN
REVISED BY:

System Information:

TOTAL SYSTEM SIZE: 4.68kW
TOTAL MODULE COUNT: 18
MODULES USED: TRINA 260
MODULE SPEC #: TSM-260 PD05.08
UTILITY COMPANY: CON EDISON
UTILITY ACCT #: 266440090800027
UTILITY METER #: 2781231
DEAL TYPE: SUNNOVA

DWG No.

E-001.00

PAGE: 5 OF 5



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