



Requirements For Commercial Photovoltaic (PV) Systems

- Valuation to include labor and material before rebates
- Sub panels and/or service changes will require additional permits
- Specify if flush, tilt or ground mount system.
- Locate array on roof plan.
- Planning and Zoning approval required
- Building Permit may be required (provide 2 sets of drawings)
- Electrical Permit required (see below)
- Provide safe access for inspections
- Building Permit submittal may require engineering such as:
 - Original Engineered Stamped Details showing site specific attachment to existing structure (Roof, Wall, Trusses, Rafters, etc)
 - Engineered Foundation for Ground Mount Systems
 - Design Criteria (Wind, Exposure, Snow, etc.)
 - Fasteners (Type, Size, Length, etc.)
 - Installation Instructions
- **Final Structural inspection required (approved documents required on site)**
- **Electrical Permit submittal requires:**
 - Specifications for all components (i.e. rack/module mounting and installation requirements, listing information, etc.)
 - Module cut sheets (including description, weight, markings per NEC article 690.51) open circuit voltage, operating voltage, maximum system voltage, operating current, short circuit current, maximum power).
 - Combiner box (installation requirements)
 - Inverter cut sheets (including description, installation requirements, specification information, etc.)
 - 1-line diagram conforming to field installation (including number of modules per string and number of strings).
 - Electrical calculations: including but not limited to:
 - Voltages
 - Conductor sizing (according to insulation, temperature correction, Conduit fill correction, etc.)
 - Overcurrent protection (AC and DC)
 - Disconnect sizes and voltages
 - Type of conductors installed
 - Various wiring methods utilized
- **Underground Electrical Inspection required (when applicable)**
- **Rough Electrical (when installation is between 25%-50% completed to observe bonding & grounding, etc.)**
- **Final Electrical inspection required (approved documents on site)**