

Solar Panel Terminology

- **Azimuth:** The direction that your roof faces (in the context of solar). The azimuth is measured in degrees, representing the angle between your roof and true north.
- **Building-integrated photovoltaic (BIPV):** Solar panels that can be integrated with a building's roof tiles, rather than mounted on top of the roof. Also known as a **solar shingle**.
- **Inverter**: Component of a solar panel system that converts the electricity generated by solar panels into a format that can be used to power your home.
- **Kilowatt-hour (kWh):** Standard unit for electricity. In 2014, the average U.S. home used 911 kWh per month.
- Off grid: Completely disconnected from the electricity grid, with no access to utility-generated electricity. Homes that go off grid need to generate all of their electricity on-site.
- Photovoltaic (PV): A type of device that generates electricity directly from sunlight. Solar panels are photovoltaic devices.
- Power rating: Represents the theoretical power output of a solar panel in ideal conditions. While power rating is a good indicator of quality, most solar panels don't experience ideal conditions for more than a few moments.
- **Solar panel efficiency:** Represents how well a solar panel converts sunlight into electricity. Most solar panels have 14 to 16 percent efficiency; higherficiency panels are rated just above 20 percent.
- **Solar-plus-storage:** Industry term referring to a solar energy system that also includes a battery to store excess energy. Informally referred to as **solar batteries.**
- **Temperature coefficient:** Represents how well a solar panel can perform in high-heat conditions. As with all electronics, high heat can negatively affect solar panel performance.