



**COUNTY OF NEVADA**  
**COMMUNITY DEVELOPMENT AGENCY**  
950 MAIDU AVENUE, SUITE 170, NEVADA CITY, CA 95959-8617  
( 530) 265 - 1222 FAX ( 530) 265 - 8794 [www.mynevadacounty.com](http://www.mynevadacounty.com)

Sean Powers, Agency Director

Agricultural Commissioner  
Works

Building

Environmental Health

Farm Advisor

Planning

Public

**NEVADA COUNTY**  
**COMMUNITY DEVELOPMENT AGENCY POLICY**  
**BUILDING DEPARTMENT**

<b>Subject:</b>	Off-Grid Solar Permitting	<b>Policy #:</b>	BD-CSC-20-02
<b>Original Policy:</b>	January 8 <sup>th</sup> , 2021	<b>Last Revised:</b>	January 8 <sup>th</sup> , 2021

- Index:**
1. Purpose
  2. Analysis
  3. Policy
  4. Policy Interpretation

**1. Purpose:**

The purpose of this policy is to provide clarification to staff and members of public related to the permitting various building types and uses that are off-grid and not connected to a commercial electrical utility power source.

**2. Analysis:**

The rural nature of the Nevada County community and geography result in the abundance of rural residences and accessory buildings. With this comes the need for flexible, cost-effective and accessible sources of power that can meet property owner needs. Off-grid electrical systems composed of solar panels, battery storage systems and generators provide a source of power that is equivalent to a commercial electrical service in accordance with the California Building Standards Codes and provides additional benefits:

- Power is supplied during commercial power outages caused by storm events and scheduled Public Service Power Shut-off (PSPS) events.
- Once the initial cost of the system is paid for there are no ongoing electrical costs other than regular system maintenance.
- Systems make it possible to develop sites in locations not served by commercial power sources.
- Current technology has been tested, listed, is reliable, and will last for the longevity of the structures with regular maintenance.

**3. Policy:**

All systems shall be designed to supply sufficient power based on the expected loads. All systems shall include solar panels, battery storage and provisions for connection to a generator. The below requirements specify requirements to each specific type of development:

### **Residential, Accessory Structures, and Minor Electrical Independent of High/Low Tunnel Greenhouses**

- Systems shall be designed to provide sufficient power for all expected loads which may include well and sprinkler pumps. Load calculations and other required information is needed to determine compliance as shown in the [Off-Grid Solar Handout](#).
- Systems shall provide 3 days of autonomy.
- Systems shall include a portable generator socket. A fixed generator controlled by an automatic transfer switch is optional as outlined in the [Off-Grid Solar Handout](#).

### **Commercial Sites/Structures**

- Systems shall be designed by an Electrical Engineer.
- Systems shall be designed to provide sufficient power for all expected loads which may include well, fire alarms, and sprinkler pumps. Load calculations and other required information is needed to determine compliance as shown in the [Off-Grid Solar Handout](#).
- Systems shall provide 3 days of autonomy.
- Systems shall include a fixed generator controlled by an automatic transfer switch.
- System shall be approved by the local fire district.

### **Well Pumps/Fire Sprinkler Pumps**

- Separate solar/gravity fed systems dedicated for use by wells are permitted
- System with a relay that disables all load except the fire sprinkler pump, smoke/carbon monoxide detectors, lights and general use receptacles to avoid designing a system that is oversized.
- Approval shall be obtained from the local fire district for commercial/industrial sites.

## **4. Policy Interpretation:**

The Director of Building and/or approved building department designee shall have the authority for the interpretation of this policy.

Policy Initiated By: Craig Griesbach, Director of Building

Approved: *Craig Griesbach*      Date: 1/4/2021

Craig Griesbach, Director of Building