



Bear Valley
Electric Service, Inc.
A Subsidiary of American States Water Company

Public Safety Power Shutoff Community Briefing

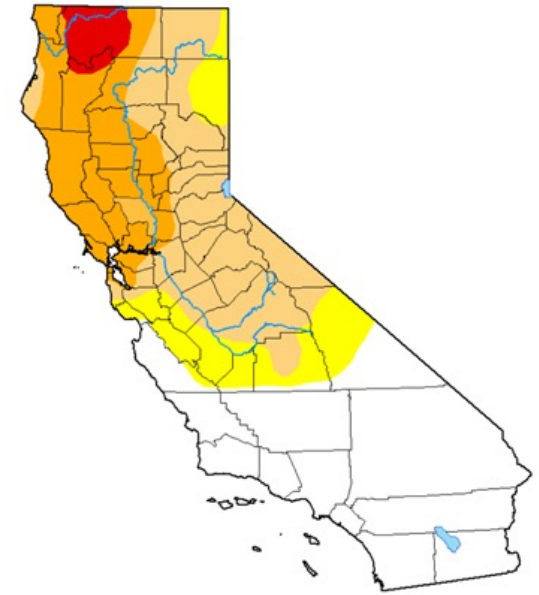
Bear Valley Electric Service, Inc.

June 2021

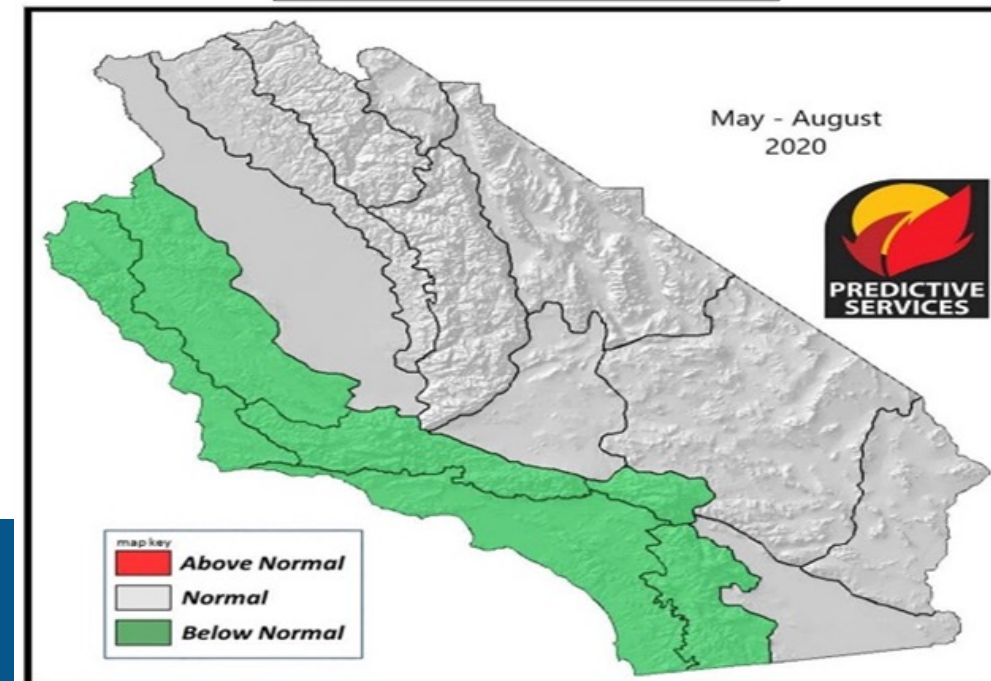
Paul Marconi, Bear Valley Electric Service, Inc. President and Treasurer

2021 Fire Season Outlook

- Drought Conditions in California: San Bernardino county currently under drought conditions as well as other parts of California are experiencing significant drought conditions currently.
- Fire Potential Index (FPI): Elevated FPI conditions are likely to develop throughout the summer months. We are already seeing dry days.
- Live Fuel Moistures: Live fuel moistures are lowering from their annual peak, with continued seasonal declines expected through the summer.
- Significant Fire Potential: Forecasts predict “Significant Fire Potential” to be higher than normal through the season.
- Fire Season: Based on weather outlook, we are clearly in the fire season. BVES does not expect weather that would drive potential PSPS events until September 2021.



Significant Fire Potential



Key PSPS Policy Points

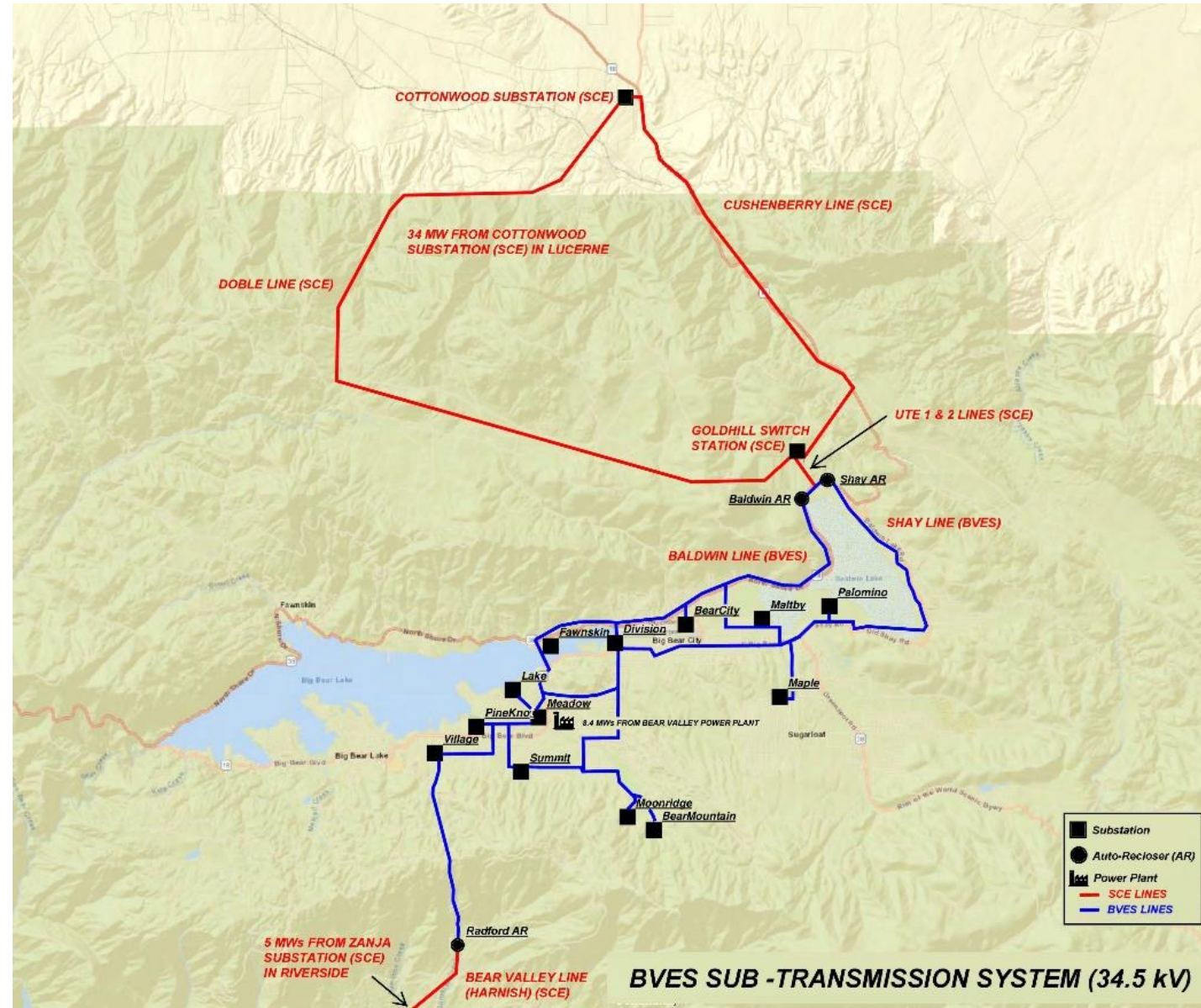
- The purpose of public safety power shutoffs (PSPS) is to promote public safety by decreasing the risk of utility-infrastructure as a source of wildfire ignitions.
- PSPS is deployed as a **measure of last resort**.
- Utilities must justify why PSPS was deployed over other possible measures or actions.
- Deploying PSPS requires a coordinated effort across multiple state and local jurisdictions and agencies.
- Consequences of PSPS should be treated in a similar manner as any other emergency that may result in loss of power, such as earthquakes, floods or non-utility caused fire events.

PSPS Susceptibility

- The BVES, Inc. service area is susceptible to several conditions in which PSPS will have a direct impact to its customers. These are:
 - Extreme fire threat weather and conditions that warrant implementation of PSPS on BVES, Inc. system.
 - SCE directs PSPS on its lines leading to a partial or complete loss of the SCE supply lines into BVES, Inc.
 - Combination of the above.

SCE PSPS Impact

- Procedures developed to minimize impact
- Close coordination with SCE at all levels established
- Worst case may result in rolling blackouts



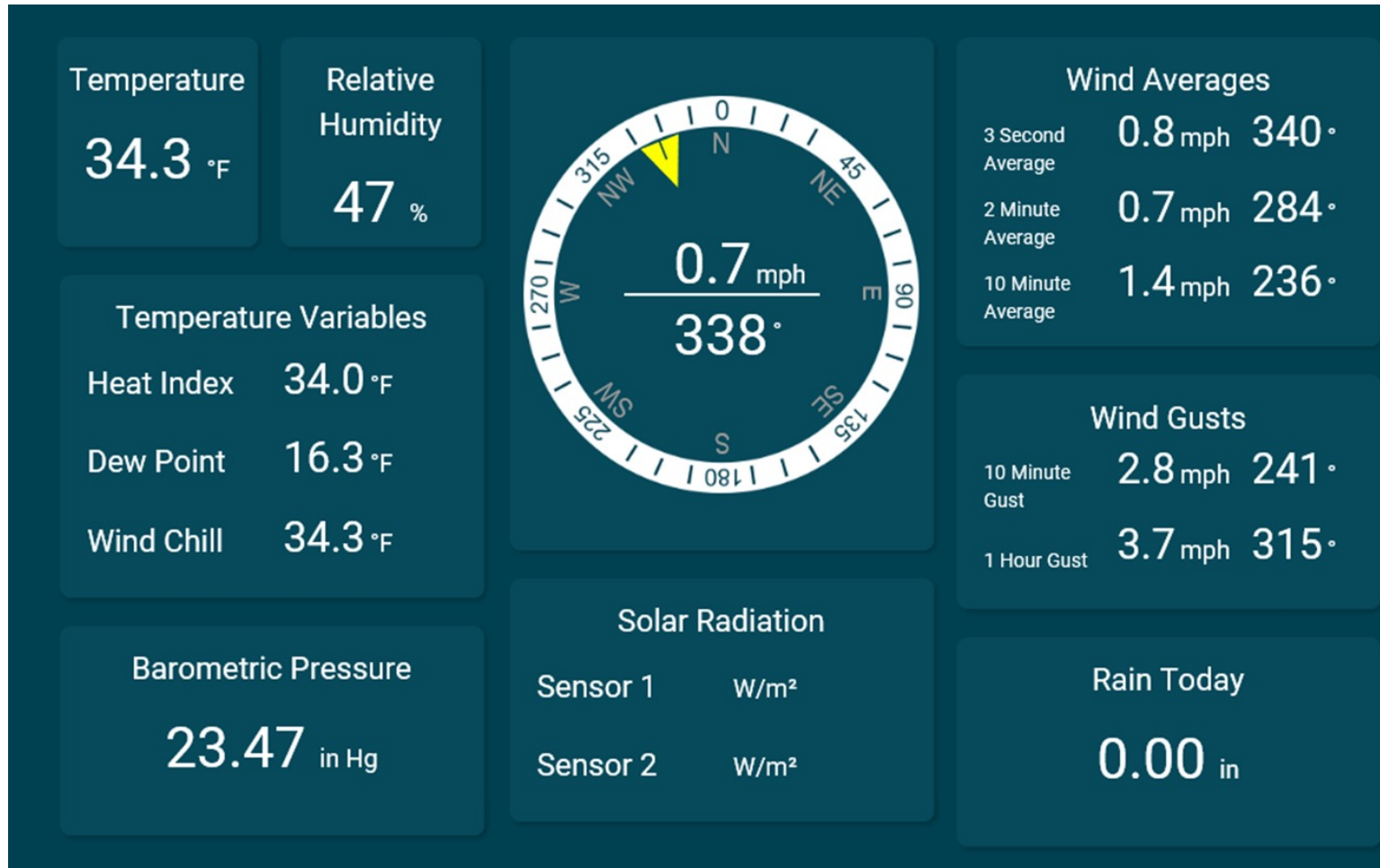
Critical Weather Monitoring



- Critical information to wildfire mitigation decision making is **weather (forecasted and actual)**, system line-up, and available resources.
- Weather information is provided by:
 - Monitoring external weather forecasts.
 - Reviewing dedicated meteorologist reports.
 - Monitoring 19 Orion Weather Stations installed at strategic locations.
 - Stations include sensors for temperature, relative humidity, digital barometers, ultrasonic wind direction and speed, and impact rain.
 - Provide accurate real-time service area-specific information via a network.



Sample Weather Station Output



- Accessible on any internet connected device including mobile devices.
- Weather historian collects data for use in forecasting.

Wildfire Mitigation Operational Practices

- Daily National Fire Danger Rating System (NFDRS) and local forecast used to establish fire threat and set operational protocols to provide proper operational focus from reliability to fire prevention.

Operations Pre-Planned Action	Green	Yellow	Brown	Orange	Red
Auto-Reclosers and Protective Switches with Reclosing Capability	Automatic	Automatic	Manual (Non-Automatic)		
Patrol following circuit or feeder outage	No	No	Yes		
Fuse TripSavers	Automatic	Automatic	Manual (Non-Automatic)		
Radford Line Use	May be energized	May be energized	De-energize ⁵	De-energize	De-energize
Deploy Wildfire Risk Team(s) to “high risk” areas	No	No	Yes, if forecasted sustained wind or 3-second wind gusts expected to exceed 55 or actual sustained wind or 3-second wind gusts exceed 45 mph and expected to increase.		
Forward to Field Operations updated list of medical baseline customers and impacts access and functional needs population	No	No	Yes, if forecasted sustained wind or 3-second wind gusts expected to exceed 55 or actual sustained wind or 3-second wind gusts exceed 45 mph and expected to increase.		
Activate EOC	No	No	Yes, if forecasted sustained wind or 3-second wind gusts expected to exceed 55 or actual sustained wind or 3-second wind gusts exceed 45 mph and expected to increase.		
Prepare Bear Valley Power Plant for sustained operations.	No	No	Yes, if forecasted sustained wind or 3-second wind gusts expected to exceed 55 or actual sustained wind or 3-second wind gusts exceed 45 mph and expected to increase.		
Conduct switching operations to minimize impact of potential PSPS activity	No	No	Yes, if forecasted sustained wind or 3-second wind gusts expected to exceed 55 or actual sustained wind or 3-second wind gusts exceed 45 mph and expected to increase.		
Activate first responder, local government and agency, customer and community, and stakeholders PSPS communications plan	No	No	Yes, if forecasted sustained wind or 3-second wind gusts expected to exceed 55 or actual sustained wind or 3-second wind gusts exceed 45 mph and expected to increase.		
Activate Community Resource Centers	No	No	Yes, if forecasted sustained wind or 3-second wind gusts expected to exceed 55 or actual sustained wind or 3-second wind gusts exceed 45 mph and expected to increase.		
Public Safety Power Shutoff	No	No	Yes, if actual sustained wind or 3-second wind gusts exceed 55 mph.		

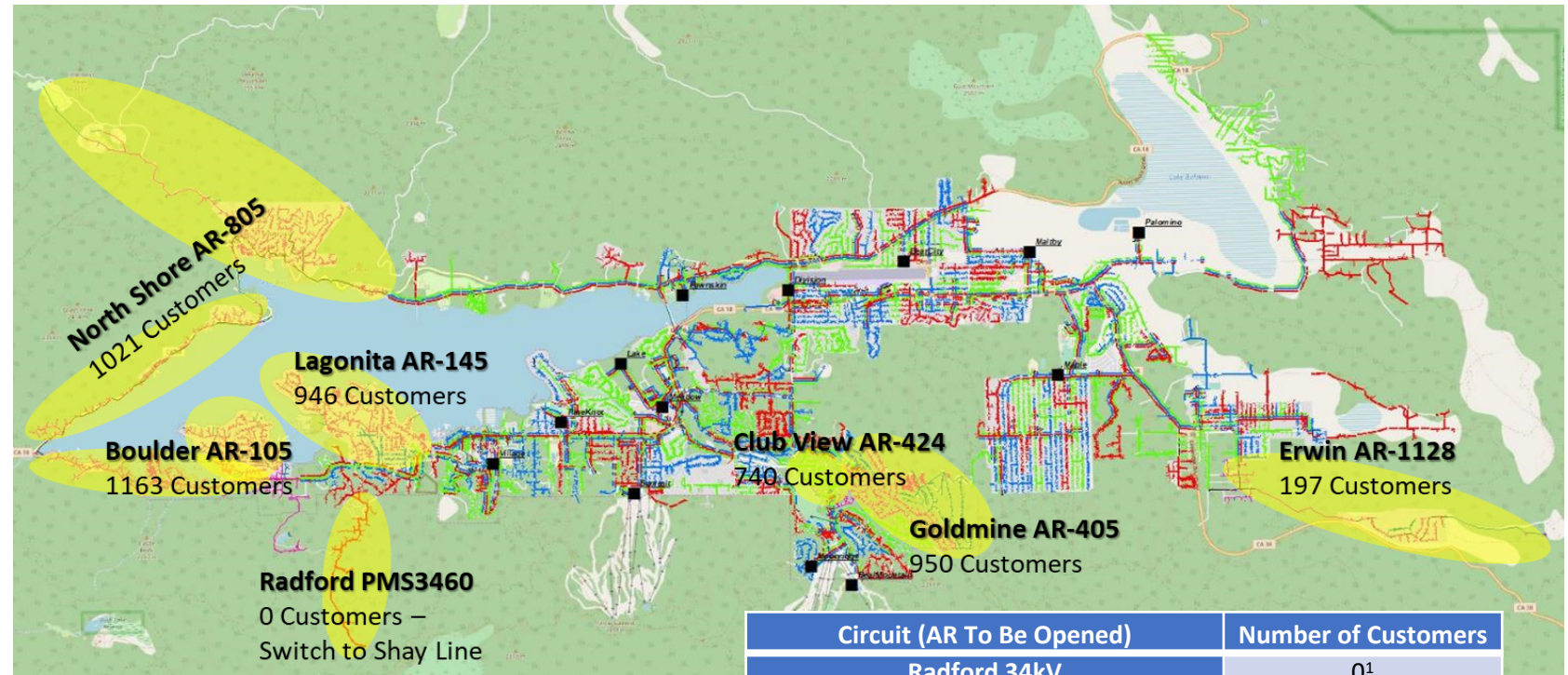
Public Safety Power Shutoff (PSPS)

BVES, Inc. puts public safety at the forefront of operational practices and may de-energize certain portions of the grid as a measure of last resort in high-risk areas when extreme fire conditions present imminent danger to public safety.

- BVES, Inc. has identified 7 high-risk areas potentially affecting up to about 20% of its customers
 - Depending on conditions some or all of these areas may be affected
 - Localized weather conditions will be considered
- PSPS is intended to reduce fire risk in high-risk areas (“at risk” areas) as a **measure of last resort**
 - Outages are not something we take lightly
 - Utilized when extreme fire conditions present imminent danger to public safety
 - Very high dry winds combined with dry fuel conditions is the principal trigger
- BVES, Inc. will make every effort to notify customers and local government ahead of time, especially medical baseline customers and access and functional needs populations
- Power restoration will occur after conditions have improved to non-threat conditions and safety checks have been performed

Minimizing Impact

- BVES has identified areas within its Tiers 2 & 3 High Fire Threat Districts that may be selectively de-energized as a measure of last resort to minimize the impact to only the areas at risk.
- This is be done by identifying specific switches to electrically isolate these areas.



Circuit (AR To Be Opened)	Number of Customers
Radford 34kV	0 ¹
North Shore 4kV (Open AR) 805)	1,021
Erwin 4 kV (Open AR 1128)	197
Boulder 4kV (Open AR 105)	1,063
Lagonita 4kV (Open AR 145)	946
Club View 4kV (Open AR 424)	740
Goldmine 4kV (Open AR 405)	950

¹When this line is de-energized, the load is shifted to the Shay 34kV line.

PSPS Considerations

BVES determines whether a PSPS event is necessary by considering the information listed below:

- Weather conditions
- Vegetation conditions and
- NFDRS (fuel dryness)
- Field observations and flying/falling debris
- Information from first responders
- Meteorology, including 10 years of history, 99th and 95th percentile winds
- Expected duration of conditions
- Location of any existing fires
- Wildfire activity in other parts of the state affecting resource availability
- Information on temporary construction

Extreme Fire Threat Conditions

Extreme fire threat weather and conditions outside of the BVES service area, in which Southern California Edison (SCE) directs PSPS on SCE-owned and/or operated power lines leading a partial or complete loss of the three SCE supply lines into the BVES service area.

Note that it is very possible that the extreme fire threat weather and conditions causing SCE to de-energize its supply lines to BVES may not exist in the BVES service area.

Extreme Fire Threat Conditions Within BVES Service Area

Extreme fire threat conditions in the BVES service area are rare but could warrant a potential PSPS event.

PSPS Timeline

- **Preparatory Phase:** Conducted annually well before extreme fire threat conditions are expected or when lessons learned or other conditions warrant updating plans, training, and/or outreach.
- **Warning Phase:** Starts 4-7 days prior to forecasted extreme fire threat weather and conditions. Mainly involves preparing to conduct PSPS when it is warranted and notifying local government, agencies, partner organizations, and customers. This phase includes various levels of notification at:
 - 4-7 days ahead,
 - 4 days ahead, 2-3 days ahead
 - 1-2 days ahead, and
 - 1-4 hours ahead (de-energization imminent)
- **Implementation Phase:** Involves de-energizing “at-risk” circuits due to verified actual extreme fire threat weather and conditions and/or responding to SCE directed PSPS of SCE supply lines to BVES, Inc. service area.
- **Restoration Phase:** Involves restoring power to de-energized circuits following verification that actual extreme fire threat weather and conditions have subsided and/or restoring SCE supply lines when they are re-energized.
- **Reporting and Lessons Learned Phase:** Documenting and reporting to CPUC Safety Enforcement Division required information on the PSPS event and capturing lessons learned to ensure future PSPS events benefit from an understanding of what worked and what did not work in previous PSPS events.

Partner Agency PSPS Notification

Recognizing that local governments may need to implement their own emergency plans, BVES, Inc. will make every attempt to provide advance notice to our government partners such as, County of San Bernardino, City of Big Bear Lake, Big Bear Fire Department and other first responders.

- Notice provided early and prior to executing general notifications.
- Notice to Bear Valley Mountain Mutual Aid Association and its large membership.
- Notifications:
 - All notifications will be sent to contacts provided by the agency using email, phone call and/or text as requested
 - Crews will monitor the situation in the field and be available to respond to City and County emergency personnel, including requests to restore service in response to emergency situations

Customer Assistance

- **PSPS Notifications:**

- Notifications may occur via email, TextPower (two-way texting), telephone calls, Interactive Voice Response (IVR) proactive calling system, website and social media in advance of and during PSPS events.
- Local media will also be provided press releases on conditions.

- **Community Resource Center (CRC):**

- Will be activated during a PSPS event.
- Consists of generators, tables, chairs, heaters, surge protectors, portable batteries, first aid kits, blankets, flash lights, non-perishable food and water, charging stations, and restrooms.
- PSPS information representatives.

- **During a PSPS event, BVES, Inc. provides:**

- Enhanced Customer Service Representative coverage
- Continuous Line Crews in the affected areas
- Emergency Operations Center activated to continuously assess conditions
- Frequent customer notifications on status of conditions

Customer Service

- 24 hour contact information: 1-800-808-2837
- Customer Service Representatives are available from 8am-5pm, M-F by phone at 1-800-808-2837 and by email at customerservice@bvesinc.com
- Info on www.BVESInc.com and on BVES, Inc.'s Facebook @BearValleyElectricServiceInc



Questions?