

Date of Hearing: April 30, 2025

ASSEMBLY COMMITTEE ON UTILITIES AND ENERGY

Cottie Petrie-Norris, Chair

AB 615 (Davies) – As Amended April 22, 2025

SUBJECT: Power facilities: emergency response and action plans

SUMMARY: Requires that an application for an energy storage system provide an emergency response plan. Also, requires an application for siting a power facility to include a description of any transmission lines and an emergency response plan.

Specifically, **this bill:**

- 1) Requires an application for an energy storage system shall contain an emergency response plan. The plan must meet the following requirements:
 - a. Inclusion of an emergency response and action plan that incorporates impacts to the surrounding areas in the event of an emergency that would be conducted and coordinated with local emergency management agencies, unified program agencies, and local first response agencies.
 - b. Analysis and feedback from a local emergency management agency regarding whether the proposed facility requires supplemental first responder capabilities and meets National Fire Protection Association 855 Standard as it relates to setbacks.
- 2) The emergency response and action plan for energy storage shall be paid for by the applicant.
- 3) Requires an application for siting a power facility to include a description of any electric transmission lines. This description must include all of the following:
 - a. The estimated cost of the proposed electric transmission line.
 - b. Justification for the route, and a preliminary description of the effect of the proposed electric transmission line on the environment, ecology, and scenic, historic, and recreational values.
 - c. An emergency response and action plan that incorporates impacts to the surrounding areas in the event of an emergency, that would be conducted and coordinated with local emergency management agencies, unified program agencies, and local first response agencies.
- 4) The emergency response and action plan for a power facility shall be paid for by the applicant.

EXISTING LAW:

- 1) Requires the California Public Utilities Commission (CPUC) to direct electrical corporations to file applications for programs and investments to accelerate widespread deployment of distributed energy storage systems. (Public Utilities Code § 2838.2)
- 2) Requires the CEC to undertake various actions to support the state's clean energy and pollution reduction goals, including implementing the Long-Duration Energy Storage Program by providing financial incentives for projects to deploy innovative energy storage systems to the electrical grid for purposes of providing critical capacity and grid services. (Public Resources Code § 25640)
- 3) Establishes a Renewable Energy Resources Program administered by the Energy Commission and defines a "renewable electrical generation facility" as a facility that uses biomass, solar thermal, photovoltaic, wind, geothermal, fuel cells using renewable fuels, small hydroelectric generation of 30 megawatts or less, digester gas, municipal solid waste conversion, landfill gas, ocean wave, ocean thermal, or tidal current and sets certain requirements for these facilities. (Public Resource Code § 25741)
- 4) Establishes the California Energy Commission's (CEC) power plant permitting process including requiring a description of the design of the facility, geological and ecological information about the site and safety and reliability information for the proposed power plant, among other provisions. (Public Resources Code § 25520)
- 5) Establishes a certification of nonfossil-fueled power plants, energy storage facilities, and related facilities processes at the CEC that can be executed instead of local approval processes and to expedite permitting processes. (Public Resources Code § 25545)
- 6) Establishes the Warren-Alquist State Energy Resources Conservation and Development Act which created the CEC to manage energy-related issues, and charged the Energy Commission with the responsibility to adopt and maintain Energy Efficiency Standards for new buildings and gave the authority to site power plants. (Public Resources Code § 25000)
- 7) Requires that each battery energy storage facility located in the state have an emergency response plan that covers the premises of the battery energy storage facility and response procedures for an equipment malfunction or failure established in consultation with local emergency management agencies. It must include procedures that provide for the safety of the surrounding area and mechanisms for communication among other provisions. (Public Utilities Code § 761.3)
- 8) Requires the State Fire Marshal, before the next triennial edition of the California Building Standards Code adopted after January 1, 2025, to propose updates to the fire standards relating to requirements for lithium-based battery systems. (Health and Safety Code §13110.3)

FISCAL EFFECT: Unknown. This bill is keyed fiscal and will be referred to the Assembly Committee on Appropriations for its review.

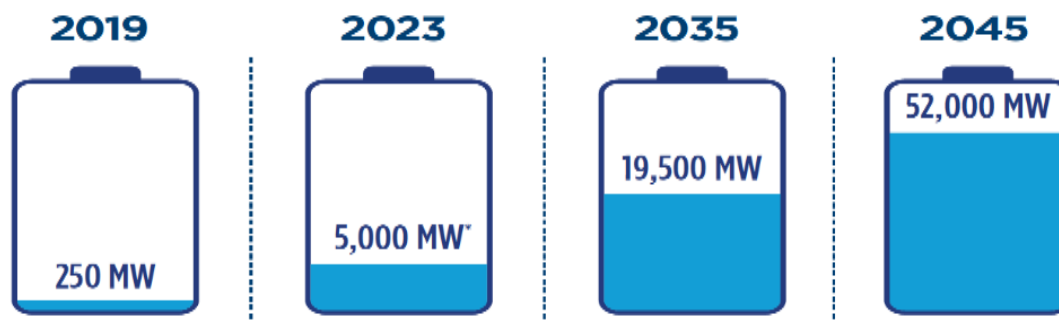
CONSUMER COST IMPACTS: Unknown.

BACKGROUND:

Energy Storage as a Tool to Reach Climate Goals – As California transitions to clean energy technologies, energy storage has become central to the state’s plans for grid resilience and resource adequacy. When supply is high and demand is low, excess energy can be stored for later use using batteries. When demand is high and supply is low, these batteries can discharge stored energy to the electric grid, shifting the daily peak load.¹ Due to its ability to discharge energy quickly when needed, energy storage can rapidly respond to changes on the electricity grid adding resiliency. Storage further enables the use of renewable energy technologies, like wind and solar, that experience “down-timing” during which energy cannot be produced. Storage can fill the gaps during down-times.²

Energy Storage in California – AB 2514 (Skinner, Chapter 469, Statutes of 2010) required the CPUC to open a proceeding to establish procurement targets for each investor-owned utility (IOU). It also required the governing board of each publicly owned utility (POU) to adopt energy storage system procurement targets and report their progress to the CEC. In 2013, the CPUC issued a decision in response to AB 2514 establishing the state’s first energy storage procurement target of 1,325 megawatts (MW) by 2020.³ This legislation was the first of its kind in the United States.

California’s growing battery storage capacity
captures the state’s abundant renewable resources



*Projected as of June 1, 2023 based on California ISO interconnection queue.

Figure 1: California’s Growing Battery Storage Capacity⁴

California is increasingly relying on energy storage technologies. In particular, lithium-ion stationary energy storage development in the state is accelerating rapidly. As shown in Figure 1, battery storage capacity has increased by nearly 20 times from 2019 to 2023, from 250 megawatts (MW) to 5,000 MW respectively. By 2045, capacity is projected to increase another

¹ Union of Concerned Scientists; “Energy Storage: How it Works and Its Role in an Equitable Clean Energy Future;” <https://www.ucsusa.org/resources/how-energy-storage-works>

² Ibid

³D. 13-10-040

⁴ Ibid

10 times to 52,000 MW, with lithium-ion batteries as the main type of storage.⁵ Although lithium-ion batteries are the most recognized form of energy storage, today's portfolio of storage technologies is fast changing.

Safety Incidents at the Moss Landing Harbor – There have been multiple safety incidents at separately owned battery energy storage facilities located at the Moss Landing Harbor location in Monterey County, one of the largest battery energy storage systems in the world.⁶

- On September 4, 2021, there was a safety incident at Vistra's Moss Landing Phase I facility that prompted an immediate shutoff. An investigation found that smoke from a failed bearing in an air-handling unit triggered a heat suppression system to improperly spray water on battery racks, causing damage and overheating.⁷
- The same facility, experienced a second safety incident on February 13, 2022, at its Phase II building. Vistra stated in a news release that there was early evidence that water hoses leaked and that batteries short circuited, creating smoke in the building.⁸
- On September 20, 2022, a battery fire ignited at a PG&E owned Tesla energy storage facility at Moss Landing.⁹ This led to a shelter-in-place advisory for the neighboring community, including a local recreational vehicle camp.
- On January 16, 2025, a fire started at the Vistra Battery Energy Storage Facility and soon engulfed the Phase 1 battery energy storage building. The massive fire and thermal runaway event burned for days, destroyed tens of thousands of lithium-ion batteries, and resulted in shelter-in place and evacuation orders.

Power Plant Licensing and Application for Certification – The CEC has the exclusive authority for licensing thermal power plants of 50 MW or larger, as well as related transmission lines, fuel supply lines, and other facilities. This would include, for example, any natural gas-fired, solar thermal, and geothermal plant that meets the 50 MW threshold, but would not include others, such as hydroelectric, solar photovoltaic, and onshore wind power.

A certificate issued by the CEC is in lieu of any permit, certificate, or similar document otherwise required by any state, local or regional agency, or federal agency to the extent permitted by federal law, and supersedes any applicable statute, ordinance, or regulation of any state, local, or regional agency, or federal agency to the extent permitted by federal law.

⁵CEC; “New Data Shows Growth in California’s Clean Electricity Portfolio and Battery Storage Capacity”; <https://www.energy.ca.gov/news/2023-05/new-data-shows-growth-californias-clean-electricity-portfolio-and-battery#:~:text=According%20to%20the%20California%20Independent,to%205%20million%20California%20homes>

⁶ Monterey Weekly, “Even after two shutdowns, Vistra’s Moss Landing battery plant expects to nearly double”; https://www.montereycountyweekly.com/news/local_news/even-after-two-shutdowns-vistra-s-moss-landing-battery-plant-expects-to-nearly-double/article_4fb66e0c-9a5b-11ec-a940-97fe3a9f84cb.html

⁷ Vistra Corp; “Vistra Announces Investigation Findings and Corrective Actions Related to Fall 2021 Incident at Moss Landing Energy Storage Facility”; <https://investor.vistracorp.com/news?item=217>

⁸ ETN News; “Vistra restarts Phase I and Phase II of Moss Landing Energy Storage Facility”; <https://etn.news/energy-storage/vistra-restarts-phase-i-and-phase-ii-of-moss-landing-energy-storage-facility>

⁹ CNBC, “Tesla Megapack Battery Caught Fire at PG&E Substation in California”; <https://www.cnbc.com/2022/09/20/tesla-megapack-battery-caught-fire-at-pge-substation-in-california.html>

The application for certification (AFC) process, a certified regulatory program under the California Environmental Quality Act (CEQA), results in environmental assessment documents that are “functionally equivalent” to an environmental impact report (EIR). After licensing, the CEC is required to monitor compliance of the facility with all applicable federal, state, and local laws, as well as any conditions of certification imposed by the CEC.

Small Power Plant Exemption – The Small Power Plant Exemption (SPPE) program allows CEC to exempt from its licensing authority thermal power plants that do not exceed 100 MW. The CEC’s review is pursuant to CEQA and California Code of Regulations, Title 20. The CEC can grant an exemption if it finds that the proposed facility would not create a substantial adverse impact on the environment or energy resources. As the lead agency under CEQA, the CEC prepares the appropriate CEQA document for the project (for example, a mitigated negative declaration or an EIR). If exemption is approved, the project developer is responsible for securing local, state, and federal permits to construct and operate the plant. Local and state agencies will consider the environmental document prepared by the CEC for any discretionary decisions subject to CEQA.

CEC’s Opt-In Certification Process – CEC oversees the permitting of clean and renewable energy facilities. The following types of facilities are eligible: solar photovoltaic or terrestrial wind electrical generating power plants generating 50 megawatts (MW) or greater; energy storage systems capable of storing 200 megawatt-hours (MWh) or more; stationary power plants 50 MW or greater using any source of thermal energy, excluding fossil or nuclear fuels; transmission lines associated with these generating and storage facilities; specified facilities that manufacture or assemble clean energy or storage technologies or related component; and hydrogen production facility (not derived from fossil fuel feedstock) and associated onsite storage and processing facilities. Under AB 205, the CEC is the lead CEQA agency for environmental review and permitting for any facility that elects to opt into the CEC’s jurisdiction.

National Fire Protection Association 855 Standard (NFPA) – The NFPA defines the design, construction, installation commissioning, operation, maintenance, and decommissioning of stationary energy storage systems. It provides minimum requirements for mitigating the hazards associated with energy storage systems.

COMMENTS:

- 1) *Author’s Statement.* According to the author: “California has become a global leader when it comes to our energy production and innovation. Our state provides our citizens with plenty of choice when it comes to getting their energy in their homes and communities. However, we must ensure that when we bring energy to a community in the form of a plant or facility, it is with the most abundance of safety measures taken. AB 615 is a common-sense measure to ensure that when a developer or manufacturer of an energy facility submits an application to operate a facility in our state, they include an emergency preparedness plan with the application. This will ensure the local community has all the knowledge and tools available to know how their communities will be protected in the worst-case scenario.”

- 2) *The Purpose of this Bill.* With recent safety and public health emergencies at the Moss Landing battery facility, there has been increased scrutiny over emergency procedures implemented at large scale storage facilities and power plants. This bill mandates that emergency response plans are made during the application process to site this energy infrastructure.
- 3) *Ensuring Appropriate Safety Mandates Apply to Appropriate Storage.* The authors mandate the use of NFPA 855 guidelines determine setbacks for energy storage systems. As technology for energy storage systems changes rapidly, it is important that mandates to follow NFPA 855 guidelines should only apply if the given technology is included. *Therefore, the Committee recommends including clarifying language that NFPA 855 guidelines should be followed as applicable.*
- 4) *Related Legislation.*

AB 303 (Addis) regulates battery energy storage siting process for storage facilities capable of storing 200 megawatts or more. These provisions include battery storage setback sensitive area requirements and removal of storage facilities from the AB 205 permitting process. Prohibits battery siting in environmentally sensitive areas and sensitive receptors. These areas include coastal zones and habitats for endangered species, hospitals or prisons. Status: Pending in the Assembly Committee on Utilities and Energy

AB 588 (Patel) Requires the State Fire Marshal to convene a lithium battery working group to identify those safety issues associated with lithium batteries and associated charging infrastructure. Status: Pending hearing in the Assembly Committee on Emergency Management

AB 696 (Ransom) Requires the California Environmental Protection Agency to convene a Lithium-Ion Car battery Advisory Group to review and advise the Legislature on policies on handling and disposing of lithium-ion vehicle batteries. Status: Referred to the Assembly Committee on Appropriations suspense file

AB 841 (Patel) requires the State Fire Marshal, in consultation with the Division of Occupational Safety and Health, to convene a working group to make recommendations regarding personal protective equipment used in responding to lithium-ion battery fires, and provide a report with recommendations to the Legislature by September 1, 2026. Status: Pending hearing on the hearing on the Assembly Committee on Appropriation after passing out of the Assembly Committee on Labor and Employment (7-0-0) and the Assembly Committee on Emergency Management (7-0-0)

AB 1285 (Ransom) requires the State Fire Marshal, in consultation with the Office of Emergency Services, to develop fire prevention, response, and recovery measures for utility grade lithium-ion battery storage facilities. Status: Pending hearing in the Assembly Committee on Appropriations

SB 283 (Laird) Requires the CPUC and the Office of the State Fire Marshal to review and consider the most recently published edition of the National Fire Protection Association 855: Standard for the Installation of Stationary Energy Storage Systems for incorporation into the next update of the California Building Standards Code adopted after July 1, 2026. Status: Pending hearing in Senate Local Government Committee

5) *Prior Legislation.*

SB 38 (Laird) requires each battery energy storage facility located in the state to have an emergency response plan and an evacuation plan that covers the premise of the battery energy storage facility. Status: Chapter 377, Statutes of 2023

SB 38 (Laird) requires each battery energy storage facility located in the state to have an emergency response plan and an evacuation plan that covers the premise of the battery energy storage facility. Status: Chapter 377, Statutes of 2023

SB 1383 (Hueso) requires the CPUC to implement and enforce standards for the maintenance and operation of electric storage facilities owned or contracted for by electrical corporations IOUs and requires the California Independent System Operator to maintain records of storage facility outages and provide those records to the CPUC on a daily basis. Status: Chapter 725, Statutes of 2022

SB 1383 (Hueso) requires the California Public Utilities Commission (CPUC) to implement and enforce standards for the maintenance and operation of electric storage facilities owned or contracted for by electrical corporations (IOUs) and requires the California Independent System Operator (CAISO) to maintain records of storage facility outages and provide those records to the CPUC on a daily basis. Status: Chapter 725, Statutes of 2022

SB 801 (Stern) required Southern California Edison to deploy 20 MW of energy storage in response to reliability needs. Additionally mandated the Los Angeles Department of Water and Power to identify 100 MW worth of energy storage procurement opportunities to address reliability concerns associated with the Aliso Canyon Natural Gas Storage Facility. Status: Chapter 814, Statutes of 2017.

AB 2514 (Skinner) requires the CPUC to determine appropriate targets, if any, for load serving entities to procure energy storage systems and requires load serving entities to meet any targets adopted by the CPUC by 2015 and 2020. Requires publicly owned utilities to set their own targets for the procurement of energy storage and meet those targets by 2016 and 2021. Status: Chapter 469, Statutes of 2010.

REGISTERED SUPPORT / OPPOSITION:

Support

City of Laguna Niguel
County of Orange

Support If Amended

City of San Juan Capistrano

Opposition

None on file.

Analysis Prepared by: Kristen Koenig / U. & E. / (916) 319-2083