



**Beverly Hills City Council Liaison / Electrical Resilience Ad Hoc Committee will conduct a Regular Meeting, at the following time and place, and will address the agenda listed below:**

**CITY OF BEVERLY HILLS  
455 N. Rexford Drive  
Room 280A  
Beverly Hills, CA 90210**

**IN-PERSON / TELEPHONIC / VIDEO CONFERENCE MEETING**

**Beverly Hills Liaison Committee Meeting**  
<https://beverlyhills-org.zoom.us/my/committee>  
Meeting ID: 516 191 2424  
**Passcode: 90210**

**You can also dial in by phone:  
+1 669 900 9128 US  
+1 833 548 0282 (Toll-Free)**

**One tap mobile:  
+16699009128,,5161912424# US  
+18335480282,,5161912424# US (Toll-Free)**

**Wednesday, September 27, 2023  
3:00 PM**

***Please be advised that pre-entry metal detector screening requirements are now in place in City Hall. Members of the public are requested to plan visits accordingly.***

*In the interest of maintaining appropriate social distancing, members of the public can view this meeting through live webcast at [www.beverlyhills.org/live](http://www.beverlyhills.org/live) and on BH Channel 10 or Channel 35 on Spectrum Cable, and can participate in the teleconference/video conference by using the link above. Written comments may be emailed to [bhelectricresilience@beverlyhills.org](mailto:bhelectricresilience@beverlyhills.org) and will also be taken during the meeting when the topic is being reviewed by the Beverly Hills City Council Liaison / Electrical Resilience Ad Hoc Committee. Beverly Hills Liaison meetings will be in-person at City Hall.*

**AGENDA**

- 1) Resilience Problem, Solution Summary, and Goals
  - a. Facilitator will guide discussion based upon the summary and guidance of moving forward to identify key solutions for different community segments.
  
- 2) Resiliency Audit Program
  - a. Staff is seeking the Committee's recommendations on moving forward with incorporating a Resiliency Audit Program into the Committee's final plan.

- 3) Emergency Management Resilience
  - a. This item is for informational purposes only.
- 4) Director's Report
  - a. Director of Public Works Shana Epstein will provide an update, if any, and confirm next meeting dates (November 1 from 3:00 p.m. – 4:30 p.m.; January 24 from 3:00 p.m. – 5:00 p.m.).
- 5) Public Comment
  - a. Members of the public will be given the opportunity to directly address the Committee on any item listed on the agenda.
- 6) Adjournment

  
Huma Ahmed  
City Clerk

**Posted: September 22, 2023**



Pursuant to the Americans with Disabilities Act, the City of Beverly Hills will make reasonable efforts to accommodate persons with disabilities. If you require special assistance, please call (310) 285-1014 (voice) or (310) 285-6881 (TTY). Providing at least forty-eight (48) hours advance notice will help to ensure availability of services. City Hall, including Room 280A is wheelchair accessible.



**CITY OF BEVERLY HILLS**  
**PUBLIC WORKS DEPARTMENT**  
**MEMORANDUM**

**TO:** Mayor's Citywide Electrical Resilience (MCER)  
Ad Hoc Committee

**FROM:** Mariko Geronimo Aydin, Lumen Energy Strategy, LLC

**DATE:** September 27, 2023

**SUBJECT:** RESILIENCE PROBLEM, SOLUTION SUMMARY, AND GOALS

**ATTACHMENTS:** None

---

**INTRODUCTION**

This memo is in response to issues and questions raised in the August 30, 2023, Mayor's Citywide Electrical Resilience (MCER) Ad Hoc Committee ("Committee") kickoff meeting. In that meeting, the Committee identified a need to further articulate the City's resilience problems, goals, and potential solutions—with recognition that not all residents and businesses in the City have the same outage experiences, vulnerabilities, and resilience needs, and consequently that there is unlikely to be a one-size-fits-all solution.

This memo presents recommendations on defining five resilience planning areas to represent the range of resilience issues in the City, resource development strategies to address those issues, and integration with the City's Safety Element and emergency plans.

The Committee's Evaluation Criteria Matrix Ranking results, the City's electricity circuit characteristics and 2015–2019 outage patterns, and the City's Safety Element and emergency plan activities were considered in preparing these recommendations.

**DISCUSSION**

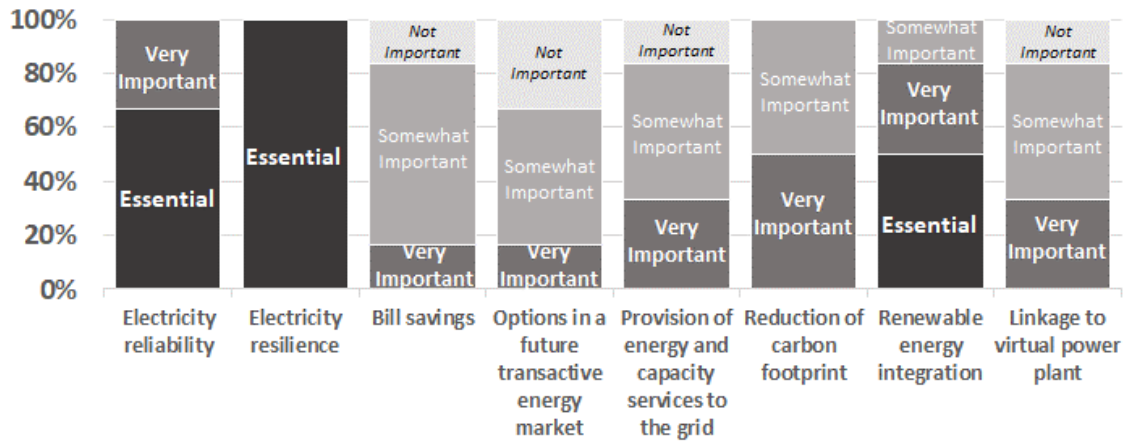
**Evaluation Criteria Matrix Ranking Results**

The August 30, 2023, Committee kickoff meeting included review of an Evaluation Criteria Matrix Ranking. In follow-up to that meeting each Committee member completed the matrix indicating Committee priorities. Results are shown in the figure below.

Electricity resilience and reliability are the highest priorities to the Committee, with renewable energy and reduction of carbon footprint also high priorities. Bill savings and various types of power sales to the broader grid are ranked lower.

Results confirm that clean energy development is clearly a priority for the City, but not at the expense of resilience and reliability. This indicates that non-renewable energy sources such as diesel backup generation could be an option, perhaps in emergency situations or for sites where residences and businesses are particularly vulnerable in an outage situation and where installation of solar and/or storage is not feasible.

### Evaluation Criteria Matrix Ranking Results Committee Priorities, as Share of Committee Members



Lower priority rankings on bill savings and power sales to the grid indicate that the City’s target resource sizes and configurations should be tailored to the level of outage mitigation needed. For example, this suggests that it would not be a priority for the City to target onsite solar + storage in a microgrid configuration at sites where 10-hour backup power is sufficient.

#### **Circuit Characteristics and 2015–2019 Outage Patterns**

To better understand the City’s outage patterns and problem areas a range of publicly available reports and data were reviewed, including SCE’s Annual Electricity Reliability Reports, the utility’s periodic Circuit Reliability Reviews presented to the City, detailed circuit-level outage data for the 5-year period 2015–2019 provided by SCE in its Wildfire Mitigation Plans, additional information on circuit characteristics provided as part of SCE’s Wildfire Mitigation Plans and its distributed energy resources planning studies.

Circuit locations and total daily circuit-outage hours for a subset of 35 circuits serving the City will be discussed during the meeting. During the 2015–2019 time period, the worst outages occurred in the Hills, even absent any actual Public Safety Power Shutoff (PSPS) events—and even for circuits that are not PSPS circuits. Most circuits are partially overhead, connect to the Beverly substation, and are located in an elevated wildfire risk area. Many customers experienced multiple multi-hour outages per year, with the longest outages being 1–1.5 days. Outages occur at any, and in all, times of the year with no discernable seasonal pattern, with some exceptions as the Committee has indicated SCE’s more recent work on the Playboy circuit revealed some water intrusion issues from rain and flooding.

In its quarterly Wildfire Mitigation Plan report for Q2 2023, SCE indicates that customers on the Hilton and Coldwater circuits have relatively higher vulnerability to both wildfires and PSPS due to customers including but not limited Critical Care, Disabled, Medical Baseline, Low Income, Limited English, Pregnant, and Children. This relatively high vulnerability is in comparison to other PSPS circuits in the City and compared to average vulnerabilities across all PSPS circuits in the SCE system. As of Q2 2023, SCE data indicates the Playboy circuit has the highest PSPS risk in the City (risk as a function of PSPS likelihood and consequence), driven by the relatively high number of customers on that circuit, and despite the circuit being largely undergrounded.

A few circuits, located partially or entirely in the Hills, apparently do not currently face PSPS risk but customers still may face the elevated risk of wildfires coming to these portions of the grid and to their properties. The Harratt circuit, for example, is not subject to PSPS because that line is 100% underground, but it is fully located in the Trousdale area and so both the line and its residential customers are still at an elevated risk for wildfire spread and damage.

The best-performing circuits in the 2015–2019 period is four circuits located in the Flats with no circuit portions in the Hills. It should be noted that most of the circuits in the Hills described above are connected to the Beverly substation in the downtown area and so have portions coming up through the Flats to the Hills. This means that, aside from the four relatively well-performing circuits, many customers in the Flats, such as those served by the Hilton circuit, suffer from the same relatively poor circuit performance as customers in the Hills (although they do not face the same wildfire risks).

Several circuits are clustered in the downtown area. Most are 100% underground and all connect to the nearby Beverly substation. Many customers experience a 1–2 multi-hour (1–4 hour) and/or 1 extended (10-20 hour) outage every other year.

Circuit performance in other parts of the city south of Santa Monica Boulevard is mixed. Customers experience relatively low, moderate, elevated, or high outages depending on the circuit and with no clear geographic pattern or relationship to building types. Most customers experience relatively low or moderate outages, similar to downtown customers: 1–2 multi-hour (1–4 hour) and/or 1 extended (10-20 hour) outage every other year.

### **Integration with Safety Element and Emergency Plans**

Building type presents both constraints and opportunities for resilience solutions. High-rise and many types of commercial buildings, for example, are typically not well suited for solar panels due to small rooftop or other space to host PV panels relative to the building's electricity demand levels—but they may be able to install a significant amount of energy storage. As shown in the City's Safety Element, buildings in the Flats and Hills are primarily single-family homes; commercial buildings are concentrated downtown and along major roadways, and homes south of Santa Monica Boulevard are a mix of multi-family homes and single-family homes.

Also shown in the City's Safety Element, fault lines run roughly East-West through the middle of the City. Areas along the northern (upper Hills), southern, and eastern perimeter of the city are in liquefaction zones, and many parts of the Hills are in landslide zones. In the event of a natural disaster, entire neighborhoods may need to evacuate or otherwise be displaced.

The City's emergency centers and other key facilities at the neighborhood level play a critical role in providing services and resources during emergencies. Securing power at sites that provide critical services to the community in the event of an emergency can also support community members who are vulnerable during less extreme outages. A comprehensive resilience strategy will integrate these two levels of resilience solutions, with the understanding that installation of solar, storage, or solar + storage on every home is not the goal and not realistic—nor would it be sufficient to ensure people have access to critical services in an emergency.

Examples from the State's Self-Generation Incentive program of mostly non-residential sites providing critical services include: police stations; fire stations; emergency response providers; emergency operations centers; 911 call centers; medical facilities including

hospitals, skilled nursing facilities, nursing homes, blood banks, health care facilities, dialysis centers and hospice facilities; public and private gas, electric, water, wastewater or flood control facilities; jails and prisons; cooling centers; homeless shelters; neighborhood grocery stores, corner stores, markets and supermarkets; independent living centers; and food banks.

Other types of facilities that provide critical services to consider include schools and colleges, and gas stations and electric vehicle chargers.

**Resilience Planning Areas**

A summary of the different parts of the City and their building types, circuit characteristics, and relative outage problem is shown in the table below. Also included are suggested goals and types of resilience onsite solutions for residents and businesses in each area. These onsite solutions would be supported by neighborhood-level solutions as discussed above.

<b>Planning Area</b>	<b>Building Types</b>	<b>Circuit Characteristics</b>	<b>Relative Outage Problem*</b>	<b>Goal</b>	<b>Onsite Solution**</b>
Downtown	Commercial	Most are 100% underground	Low/Moderate <i>Multi-hour</i>	Multi-hour outage mitigation	Storage/ backup power
South of Santa Monica Blvd.	Commercial	Each circuit serves a mix of customer types	Low–Elevated <i>Multi-hour, multiple per year</i>	Multi-hour outage mitigation	Storage/ backup power
	Single Fam				Storage/ backup power
	Multi Fam				Storage/ backup power
Flats Only (no PSPS)	Single Fam	Rel. low wildfire risk to/from circuits + circuits have performed well	Low	Moderate demand growth	Solar/ self-generation
Flats/Hills (PSPS circuits)	Single Fam	Even with no PSPS, worst-performing circuits in the City	Elevated/High <i>Multi-day, multi-hour, frequent</i>	Multi-day outage mitigation	Solar + storage in microgrid configuration
Flats/Hills (no PSPS)	Single Fam		Moderate/Elevated <i>Multi-day, multi-hour, frequent</i>		

\*Relative outage problems: Low, Moderate, Elevated, High

\*\*Also supported by neighborhood-level solutions

PSPS: Public Safety Power Shutoffs

## **RECOMMENDATION**

As guidance to the Committee's activities, I am recommending the following:

- Develop electricity resilience strategies considering five distinct resilience planning areas and target populations in the City:
  - Downtown: electricity customers served by primarily commercial circuits
  - South of Santa Monica Blvd.: electricity customers on circuits serving a mix of building types
  - Flats Only: electricity customers primarily in single-family homes served by circuits with relatively low wildfire and PSPS risk (compared to the Hills)
  - Flats/Hills PSPS circuits: electricity customers facing wildfire risk and on circuits currently designated as PSPS circuits. All of these circuits have portions or are entirely in the Hills; many also have portions running through the Flats.
  - Flats/Hills No PSPS: electricity customers facing elevated wildfire risk, but not at risk for PSPS.
- Develop electricity resilience strategies that integrate insights from the City's Safety Element and the City's emergency plans and procedures by considering how backup power, solar + storage installations, onsite microgrids, and other local electricity resources would perform and support community needs in the event of a natural disaster or other emergency situation.
- Consider the following resource strategies:
  - Storage and other backup power solutions for areas experiencing relatively moderate or elevated outages and needing improved year-round reliability
  - Continued solar and efficiency initiatives to moderate demand growth even in areas with relatively good circuit performance
  - Solar + storage onsite microgrid solutions in areas of elevated wildfire risk and relatively poor circuit performanceMobile emergency backup power and/or microgrid options at the neighborhood level to secure power at critical sites or clusters of critical sites during both outages and greater emergencies



**CITY OF BEVERLY HILLS**  
**PUBLIC WORKS DEPARTMENT**  
**MEMORANDUM**

**TO:** Mayor's Citywide Electrical Resilience (MCER)  
Ad Hoc Committee

**FROM:** Shana Epstein, Director of Public Works  
Audrey Wright, Management Analyst

**DATE:** September 27, 2023

**SUBJECT:** Resiliency Audit Program

**ATTACHMENTS:** None

---

**INTRODUCTION**

A resilient structure runs efficiently and is prepared to handle adverse impacts; it has the ability to withstand normal and unexpected environmental stresses and recover quickly from difficulties or moments of crisis such as power and communication outages, rain intrusion, and extreme heat or cold events. Resilience is the ability to withstand adversity and bounce back from difficult events.

A resiliency audit by a professional auditor can reveal risks in the event of electricity loss, as well as identify opportunities to mitigate the worst impacts of an electricity outage through identification of critical loads, threats to electricity service loss, and potential for installation or reconfiguration of resources to meet those critical loads during a power outage. Critical loads to residents include refrigeration; lighting during evening hours; well pumps; basic plug loads for a router; computer and cell phone; and cooling equipment (e.g., plug-in fans or HVAC).<sup>i</sup> Critical loads also include the essential equipment to persons with disabilities and medically vulnerable persons. Resiliency audits can give the City's residents and business owners the information they need to take steps to guard against threats and allow for the continued function of their critical equipment during an unexpected failure. The audits can also incorporate a traditional efficiency audit component, as energy efficiency is a strategy that can support resilience by creating value and reliability.

Expectations of 100% electricity service beyond critical loads in the event of an outage, and expectations of 100% electricity service under any and all outage situations, are ideal, but not realistic. However, a resiliency audit can provide a pathway to many benefits to residents and business owners of the City, including having essential power needs met, less energy use, a reduction in utility bills, and—if backup power systems can incorporate clean technologies such as solar and energy storage—fewer power plant emissions and less air pollution.

**DISCUSSION**

A resiliency audit analyzes the building as a system in light of its ability to withstand challenges such as natural disasters and unforeseen events. This type of audit analyzes such things as basic circuitry to critical loads, potential and options to add backup power or an on-site microgrid, plus traditional efficiency features such as appliance efficiency



ratings, insulation, electricity use, and the air duct system. Such a service is not intended to be a start-to-finish endeavor but will provide solid groundwork and a start toward creating resiliency and the ability to have critical power needs met in an emergency or during a power outage.

Energy efficiency remains an important component of these audits because it is a resiliency strategy that can result in decreasing backup generation needs and upfront capital costs through energy efficiency improvements such as weatherization, sealing windows and doors, use of programmable thermostats and switching to high-efficiency appliances.

An initial step is finding a qualified auditor with the sole intent of providing an unbiased assessment that can help residents and business owners better understand their risks and options as they navigate the private sector marketplace for energy solutions. A resiliency auditor is a professional who conducts a comprehensive assessment of a structure to identify areas of inefficiency and recommend strategies to improve the comfort and sustainability of the structure, save energy and suggest alternate means of electricity production.

### **Resiliency Auditor**

A resiliency auditor is recommended to have the following qualifications:

- Be a certified electrician with significant experience in wiring homes and other building types;
- Be familiar with the relevant City building codes and standards;
- Have sufficient experience with installing solar and energy storage in homes and buildings;
- Be familiar with the latest distributed clean energy resource technologies, including, but not limited to, the latest commercially-available technology advancements in solar photovoltaic panels, inverters, grid-forming equipment and controllers, lithium-ion stationary energy storage, and electric vehicle home charging stations;
- Be a trusted resource and/or provide appropriate legal assurances that any personally sensitive or commercially sensitive details in their inspection notes will be kept confidential and secure (or not included in notes at all);
- Be an impartial auditor, not be employed by a solar or battery developer or installer, or otherwise have any conflict of interest in advising members of the community in what their energy investment options are.

### **Resiliency Audit Outcomes**

Results are an integral part of auditing process. What is the City's desired outcome of a resiliency audit program? The goal is improved performance and efficiency in structures, whether residential or business, along with a reduced impact from failures and emergencies. The outcome of a resiliency audit is to provide concrete, actionable recommendations that enable individuals to make improvements to resist damage from severe weather and to recover more quickly with less cost and harm should damage occur.<sup>ii</sup> It is critical to know the susceptibility of a structure to onsite electricity failures, such as the age and condition of the wiring, the location and exposure of circuit boxes, the frequency and severity of grid disruptions, and the reliability and quality of the utility service is a critical factor. It is also critical to know the proper capacity of a potential power source while ensuring it is safe. The proper location, enclosure, ventilation, and wiring of batteries is critical to ensuring optimal operation and protection from environmental

hazards. A qualified resiliency auditor should be able to analyze a structure and provide a guided pathway toward improvement.

The objective of a resiliency audit is to provide individuals with areas of resiliency improvements and/or potential risks, along with suggested mitigation and remediation measures. The audit could involve either on-site inspection or a web-based questionnaire (questions categorized by building system and operation) for the individual to complete and the auditor to analyze and make recommendations. Following a resiliency audit with a qualified auditor, individuals will have a greater understanding of the various options to make structures more resilient and knowledge to make a more informed decision on incorporating methods to create and/or store backup power, which in turn allows individuals to develop resiliency and draw fewer resources from utility providers. Decreased electricity demand may help lower the instances of electricity grid failures during extreme weather and other outage events. Potential mitigation/remediation measures are:

- Heat and cooling system: Includes draft-proofing, upgrading/maintaining the air duct system to guard against extreme heat and cold.
- Indoor temperature regulation: Proper insulation can help keep homes warm during winter and cool during summer, reducing energy consumption, energy loss and costs.<sup>iii</sup>
- Upgrade old appliances with high-efficiency units.
- Backup Power: A generator or charged energy storage resource to supply power during an outage.
- Solar + Battery Storage: Solar cells produce electricity in the sunshine. Batteries store power from the grid or solar array. Pairing solar with battery storage increases resiliency in the event of a power outage. Adding solar can reduce electric bills and increase the value of property.
- Battery Storage and Grid Services: Grid-connected, with or without a solar system, can provide backup power and opportunities to reduce utility bills by absorbing power when electricity rates are low, and selling power when rates or utility incentive payments are high.

Appropriate mitigation measures will vary depending on use and size of the structure, feasibility and desire. Below is a review of other cities' programs that could provide insight into the best approach for Beverly Hills.

### **Other Municipal Programs**

The City of Santa Monica offers single-family residents an online tool to assist in the development of individualized energy upgrade plans. Through the City's Office of Sustainability and the Environment and Southern California Edison Emerging Technologies Program, Xerohome.com is the city portal, allowing residents access to a web-based platform that uses predictive modeling and data science to deliver customized home energy insights.<sup>iv</sup> A self-serve, no-cost tool, it incorporates home characteristics to provide personalized recommendations on solar, insulation, windows, lighting and water heaters and preliminary recommendations are available as an energy upgrade plan. If homeowners wish to move forward with additional customization and a home energy audit at a cost of \$750, they would be supported from decision making, to finding a contractor in their region, to installing the upgrade – all from within the XeroHome™ tool interface.<sup>v</sup> The initial audit and upgrade plan is free and will assist users in decision making. Santa Monica also offers a free, individualized solar service to get residents and businesses

started. An online step-by-step guide as well as a link to solar rebates and incentives is provided. By accessing a link on the city's website, those interested can get access to solar experts that provide unbiased technical advice and assist in the process.<sup>vi</sup>

The City of Thousand Oaks, in conjunction with Ventura County, provided access to various programs – a Home Energy Consultation; direct links to Rebates and Incentives (heat pump water heaters, washing machines, windows, battery energy storage, insulation, solar); Renewable Energy and Efficiency Financing information; Cool California information (links to rebates offered by local utilities, state programs and private institutions); and Weatherization tips (via ca-vc.org), among others. An on-site home energy evaluation with an emPower Energy (partnering with the Statewide Energy Upgrade California program) Coach is available for qualifying homeowners of single-family detached homes. The Energy Coach conducts a walk-through to help homeowners identify factors in their home affecting health, comfort and energy efficiency and helps the homeowner prioritize potential projects and connect them to rebates, financing and local contractors.<sup>vii</sup> The program was paid for by a variety of funding sources, including rate payer funds.

The City of Burbank's Home Improvement Program offers residents and multi-family property owners access to no-cost energy improvements. Funded by Burbank Water and Power and the Southern California Gas Company with support from California utility customers and administered by SoCalGas under the auspices of the California Public Utilities Commission<sup>viii</sup>, the program – conducted by *Synergy*, BWP's authorized contractor – recommends efficiency improvements such as attic insulation, duct sealing, high-efficiency toilets and air sealing services, to name a few, after an in-home visit.<sup>ix</sup>

The City of Denver has a taxpayer-supported program, which serves businesses and residents, under its Office of Climate Action, Sustainability and Resiliency (CASR). The Climate Protection Fund, approved by ballot measure, is funded by a .25% sales tax and dedicated to climate action. Of proceeds raised, 10% (roughly \$40 million annually) is dedicated to Adaptation and Resiliency from 2021 through 2025. CASR will utilize the funds in six allowable use categories, one of which is increased investments in solar power, battery storage and other renewable energy technology through distributed energy resources to support grid functionality and also enable homes, buildings and critical public facilities to stay powered through grid outages. The second is upgrades to the energy efficiency of homes, offices and industry to reduce their carbon footprint, utility bills and indoor air pollution through solar, storage and other renewable energy technologies to potentially reduce or eliminate electricity bills.<sup>x</sup> This program is targeted at under-served communities and those most vulnerable to climate change.

## **Funding**

Depending upon the method recommended by the Committee (in-home audit or web-based questionnaire for professional audit and the provision of potential resiliency upgrades), various funding methods may be considered. Federal and State grant opportunities, utility company grants, a community-supported program and City funding are options to consider. State and Federal funding and utility company grant opportunities can be researched to determine City eligibility. A community-supported program may be realized by incorporating a new, small-scale tax. Another option is for the City to support the program using General Funds and/or by incorporating the cost into future year budgets.

## **NEXT STEPS**

If the Committee would like to move forward with a Resiliency Audit Program, planning and implementation are next steps. Below are initial thoughts; upon further contemplation, updates, additions and deletions can be made. Staff is seeking the Committee's input.

- Program purpose and objective: To help residents and/or businesses become more resilient by helping the community be less affected by adverse conditions, recover quickly, become energy efficient and reduce dependence on Southern California Edison (SCE),
- Target Population: Beverly Hills residents and/or businesses; identify key stakeholders and their perceived resiliency issues.
- Outreach: Provide resiliency and energy related outreach. Begin with community surveys aimed at uncovering areas of interest.
- Decipher Standard Audit Protocol: To include specified building systems/components – windows, roof, HVAC unit/air duct system, doors, ventilation system, SCE usage, etc.
- Define program outcomes in conjunction with the overall Committee recommendation.
- Decipher funding sources: State, Federal and utility programs/incentives; General Fund; Tax.
- Hire qualified personnel or contract hire.
- Monitor: To manage contractor or personnel (Scheduling, Conducting, Documenting, Reporting to City each audit including Evaluation/Feedback Sheet for resident completion).
- Advertise/Promote: City publications and eNotices, BH Courier/Weekly, Commission Meetings, The Backbone, City TV Channel.

## **RECOMMENDATION**

Staff is seeking the Committee's recommendations on moving forward with incorporating a Resiliency Audit Program into the Committee's final plan.

---

<sup>i</sup> Gorman, Will, Galen Barbose, JP Carvallo, Sunhee Baik, Chandler Miller, Philip White, and Marlana Praprost. 2022. "Evaluating the capabilities of behind-the-meter solar-plus-storage for providing backup power during long-duration power interruptions." Lawrence Berkeley National Laboratory and National Renewable Energy Laboratory, Contract No. DE AC02 05CH11231, September 2022. <https://emp.lbl.gov/publications/evaluating-capabilities-behind-meter>.

<sup>ii</sup> [Multifamily Housing Resiliency Audits Tom Chase.docx \(newecology.org\)](#)

<sup>iii</sup> <https://www.resilientdesign.org/fundamentals-of-resilient-design-backup-power-for-homes/>

<sup>iv</sup> [XeroHome](#)

<sup>v</sup> [XeroHome](#)

<sup>vi</sup> [santamonica.gov - How to Go Solar](#)

<sup>vii</sup> [https://www.toaks.org/departments/public-works/sustainability/energy/energy-programs-home#:~:text=No%2DCost%20Home%20Energy%20Consultation&text=emPower%20works%20with%20the%20Statewide,\(805\)%20654%2D3834](https://www.toaks.org/departments/public-works/sustainability/energy/energy-programs-home#:~:text=No%2DCost%20Home%20Energy%20Consultation&text=emPower%20works%20with%20the%20Statewide,(805)%20654%2D3834)

<sup>viii</sup> <https://www.socalgas.com/save-money-and-energy/assistance-programs/authorized-contractors>

<sup>ix</sup> [Home Improvement Program \(burbankwaterandpower.com\)](#)

<sup>x</sup> [cpf\\_fiveyearplan\\_final.pdf \(denvergov.org\)](#)



**CITY OF BEVERLY HILLS**  
**PUBLIC WORKS DEPARTMENT**  
**MEMORANDUM**

**TO:** Mayor's Citywide Electrical Resilience (MCER)  
Ad Hoc Committee

**FROM:** Meena Janmohamed, Emergency Management Manager

**DATE:** September 27, 2023

**SUBJECT:** Emergency Management Resilience

**ATTACHMENTS:** None

---

The City has two dedicated resilience centers located at Roxbury and La Cienega Parks. These centers may be activated for a variety of reasons, including, but not limited to, use for cooling/warming center operations, comfort centers, shelters, and/or temporary evacuation points. The City generally activates cooling centers (beyond normal operating hours) during extreme heat events where there may be multiple days of 90+ degree weather. In the event of a cooling/warming center activation, this information is shared via social media, the City's webpage, and often through Nixle/Everbridge communications. These centers aim to provide a respite for community members from the extreme weather, especially if they may be experiencing power troubles in their home as a result of the weather.

While residents are encouraged to come to cooling/warming centers/comfort station/shelters/etc., as self-contained as possible, OEM has stockpiled supplies such as portable cell phone charging towers, extra charging cords, and more to provide as resources to residents in the event these spaces are activated. However, residents are encouraged to come with their own chargers, water, snacks, etc., whenever possible when visiting one of these service centers. Residents with medical and/or other needs are encouraged to bring their medications if they intend to stay at the center for an extended period of time.

As an additional reminder to residents with medical needs, the SCE medical baseline program is an assistance program for residential customers who have special energy needs due to qualifying medical conditions. It is based solely on medical conditions and there is no income requirement. Similarly, the City has a program for residents with disabilities and access or functional needs. Residents who may need additional assistance (difficulty evacuating, dependent on medical equipment, etc.) can sign up to be added to the City's Emergency Evacuation Assistance Registry. For more information, call OEM at 310-285-1021.

In terms of the City's overall power planning response, the City has an internal Power Plan that identifies the specific roles/responsibilities/ and actions to be taken by each City department before/during/after a power disruption event. Each City department has a key role in preparing for and supporting the community in the event of a power outage.

Meeting Date: September 27, 2023

These roles and responsibilities include alerting the public when there is the opportunity for advance notice (i.e., rotating outages, PSPS events, etc.), monitoring street lighting and traffic signals, monitoring reservoir levels and system pressures, monitoring public parking garages, and more.



**CITY OF BEVERLY HILLS**  
**PUBLIC WORKS DEPARTMENT**  
**MEMORANDUM**

**TO:** Mayor's Citywide Electrical Resilience (MCER)  
Ad Hoc Committee

**FROM:** Shana Epstein, Director of Public Works  
Audrey Wright, Management Analyst

**DATE:** September 27, 2023

**SUBJECT:** Director's Report

**ATTACHMENTS:** None

---

**INTRODUCTION**

Public Works Director Shana Epstein will provide a report, if any, and confirm next meeting dates (November 1 from 3:00 p.m. – 4:30 p.m.; January 24 from 3:00 p.m. – 5:00 p.m.).



**CITY OF BEVERLY HILLS**  
**PUBLIC WORKS DEPARTMENT**  
**MEMORANDUM**

**TO:** Mayor's Citywide Electrical Resilience (MCER)  
Ad Hoc Committee

**FROM:** Shana Epstein, Director of Public Works  
Audrey Wright, Management Analyst

**DATE:** September 27, 2023

**SUBJECT:** Public Comment

**ATTACHMENTS:** None

---

**INTRODUCTION**

Members of the public will be given the opportunity to directly address the Committee on any item listed on the agenda.