

Stories of a Resilient SLO Event Q&A

Q: what do you predict will be the predicted climate change effects in our area? Continued extreme heat and flooding? Anything else?

A: The City's Vulnerability Assessment, which will provide an in-depth analysis of what climate impacts will affect SLO, is currently underway. To provide a brief summary here, SLO will experience an increase in annual average temperature as well an increase in the number of extreme heat days and heat wave events. Related to an increase in temperature, the City will experience more severe long-term droughts in the future as well increased wildfire and grassland fire risk, particularly in multi-year drought periods. SLO is also projected to experience a slight increase in annual precipitation as well as an increase in the size of large storm events. The severity and timing of these climate impacts in the future will depend on global greenhouse gas emissions trends through the year 2100, with more severe impacts occurring if emissions continue to rise. If you are interested in learning more about projected climate impacts on the central coast, in general, the [CA Fourth Climate Change Assessment Central Coast Regional Report](#) is a great resource.

Q: What are some strategies to protect vulnerable community members and seniors without air conditioning during extreme heat?

A: There are a number of strategies to protect vulnerable populations during extreme heat events. These strategies depend largely on the geographic context and demographic considerations. The City is currently soliciting feedback from the public to help develop these strategies for extreme heat that are appropriate for SLO. In general, some strategies for protecting vulnerable populations during extreme heat, particularly those without air conditioning include providing conveniently located cooling centers (i.e., churches, community centers) for residents during heat waves, providing education and training to households on how to properly keep your home cool during heat waves in the absence of air conditioning, city programs focused on weatherization and retrofitting homes with air conditioning, and ensuring social safety nets of family and friends to check in on those households without air conditioning.

Q: Does large-scale native tree- and bush-planting have a role in SLO's climate/environmental resilience initiatives?

A: The City is currently soliciting feedback from the public to help develop resilience strategies. Currently, there is not a defined set of appropriate strategies for SLO. In general, native tree and bush planting, if implemented correctly, can help reduce the urban heat island effect by providing shading and increasing evapotranspiration to cool urban areas. Evapotranspiration is the process by which water is transferred from the land to the atmosphere by evaporation from the soil and other surfaces and by transpiration from plants. Increasing urban vegetation also has a host of co-benefits including carbon sequestration and beautification of the landscape.

Q: What kinds of early emergency warning systems exist and where are improvements needed?

A: The City utilizes County functions for early emergency warning systems and emergency warning systems. The type of system used is based on many factors including the severity and location of the emergency, the number of people impacted, and how much time is available. The County Sheriff's Office manages the Reverse 911 system and the County Office of Emergency Services (OES) has the ability to activate the Early Alert System (EAS) and the pre-existing sirens that were installed due to the presence of the Diablo Canyon Nuclear Power Plant. For more details on the current systems in place, I recommend going to <https://www.prepareslo.org/en/alert-and-notification-systems.aspx>.

These systems can be utilized for City of San Luis Obispo citizens during emergency events as requested by the on-scene incident commander of the emergency or Emergency Services Director if the Emergency Operations Center has been activated.

City staff is aware that the County is exploring the utilization of a new alerting system that will similarly be available by request to local agencies within the County. We understand that this new system has the ability to target certain areas, similar to reverse 911, but with a greater reach.

Additionally, we always recommend that all residents register their cell phones for the reverse 911 system as it requires self-registration for all non-landline phones. Community members can do this at http://www.slosheriff.org/reverse_911.php.

Q: How are we addressing the needs of homeless population in our city that restore their basic needs and human dignity?

A: Support for the unhoused is an ongoing challenge in California, on the Central Coast, and in the City of SLO. The County of San Luis Obispo is the lead social service agency responsible for providing the public health resources necessary to address these challenges. The City works with the County, other cities, and non-profit partners to help provide solutions. For example, the City is one of the largest funding sources for the Homeless Services Center on 40 Prado Road. The City also provides over \$100,000 annually in "Grants-in-Aid" for non-profit, social service providers and homeless services have been the top priority for the last several years. The City funds a Community Action Team that includes a social worker from Transitions Mental Health Association to help connect the unhoused with available services. At the same time, the City works to address the impacts of homeless by removing over 70 tons of refuse from 135 illegal camps over the past year, and by working to remove the unhoused from locations that are unsafe for camping, such as in storm drains that are subject to inundation from flood waters. There were 482 unhoused community members counted in the City during the last Point In Time count. As we think about resilience, safety and equity, we know that climate change will result in more people experiencing homelessness. Recently, the City began the recruitment for a new resource – Homelessness Response Manager –

who will lead the City's efforts and engage with the County and the region on solutions. Preparing for increases in homelessness and for the potential of many more people to become displaced due to the changing climate will be discussed in the City's Safety Element update and plans for a resilient future.

Q: Are all new building permits requiring solar panels? If not, why not?

A: The 2019 California Energy Code requires all new low-rise residential buildings to include solar photovoltaic panels and requires non-residential, high-rise residential, and hotel buildings to be "solar ready". In July 2020, the City of SLO adopted local amendments to the California Energy Code that require the additional step of installing solar panels on the entire Solar Zone of a nonresidential, high-rise residential, or hotel building.

Q: If people would like to serve on a working group in collaboration with the Roundtable, how can folks apply?

A: The working groups will be open to any interested community member. Registration information for these virtual meetings will be posted on the website's "Get Involved" tab. Subscribe to project websites to receive be notified when registration is available.

Q: Is the North Atlantic Conveyance getting weaker?

A: "The behavior of ocean currents is probably one of the least understood aspects of climate change. The Atlantic Meridional Overturning Circulation (AMOC), or "conveyor belt" of currents in the Atlantic, includes the Gulf Stream, which keeps Great Britain relatively mild during the winter, unlike the nearby Scandinavian countries. Many climate models and physical oceanographic measurements indicate that the deeper branches of the (AMOC) and the Gulf Stream have slowed in recent years. The melting of the Greenland ice sheet is expected to further contribute to this trend. Most climate models predict that southern England could be snow-free by the 2040s; however, others indicate that the United Kingdom may become much colder if Gulf Stream is interrupted." – John Lindsey

Q: What about methyl clathrate debris on the ocean floor?

A: "I got to spend two summers back in the late 1970s in Alaska gold mining and became awfully familiar with permafrost. We would build an underground freezer for our food; it was hard as a rock! Due to Arctic amplification, which has seen this region warm at roughly twice the rate as the entire globe, the land-based permafrost is melting, resulting in methane discharge. Similarly, warmer ocean currents could be destabilizing the submarine methane hydrate or clathrate deposits. Remember, methane is about 60 and 80 times more potent as a greenhouse gas than carbon dioxide." – John Lindsey

Q: Are efforts being made to work on more efficient and safer long-distance transmission of electricity to address an increase in demand and mitigate some of the risks associated with high winds and wildfire?

A: “The North American Electric Reliability Corporation (NERC) is a not-for-profit international regulatory authority whose mission is to assure the effective and efficient reduction of risks to the reliability and security of the grid. NERC develops and enforces Reliability Standards; annually assesses seasonal and long-term reliability; monitors the bulk power system through system awareness; and educates, trains, and certifies industry personnel. And, for more information on how PG&E is taking action to reduce wildfire risk on our electric system, please visit our Community Wildfire Safety Program.”
– John Lindsey

Q: What does the right-most green bar in that graph represent? (from the presentation)

A: “Inches of precipitation over 24 hours” – John Lindsey