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## 1. COMMUNITY SAFETY

**GOAL S-1. A safe community that is made aware of risks and prepared for emergencies.**

### **PUBLIC AWARENESS**

POLICY S1.1 Facilitate ongoing public education and awareness to prevent loss of life and property from impacts of natural and human-made disasters and to facilitate recovery when disasters occur. [NEW POLICY] [N1]

Program S1.1.1 ~~Expand~~~~initiate~~ public education programs that strongly encourage ~~encouraging that~~ each household in the City ~~is to be prepared to be self-sufficient, with enough stored water and food to support the entire household, -for at least 72 hours~~one week after a major earthquake, flood, terrorism event, pandemic or other major disaster. ~~Update and distribute the City's earthquake preparedness guide, "Living with Our Faults."~~ Also encourage businesses and other organizations to prepare for self-sufficiency. [Previous Program N-82] [N2]

Program S1.1.2 Continue to implement and fund the Emergency Services Volunteer program. ~~and~~ [NEW PROGRAM] [N3]

~~Program S1.1.1~~Program S1.1.3 Encourage residents and employees to participate in citywide emergency drills and other public education activities. [PTC] [NEW PROGRAM] [N4]

Program S1.1.4 Support an annual community public safety fair to educate and engage the public on preparedness, ~~allow them to meet City officials responsible for preparedness,~~ and offer the opportunity to buy emergency disaster kits and supplies. [NEW PROGRAM] [N5]

Program S1.1.5 Encourage local businesses to have business continuity and disaster recovery plans in place. [NEW PROGRAM] [N6]

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SAFETY ELEMENT

**COMMUNITY SAFETY**

POLICY S1.2      Support the Palo Alto Police Department and Office of Emergency Services efforts in public safety education and community outreach. Use education and crime prevention as integral parts of the practice of law enforcement. [PTC] [NEW POLICY] [N7]

~~*Program S1.1.2*~~ *Program S1.2.1*      *Develop accessible, attractive marketing materials to promote involvement in community crime safety programs. [NEW PROGRAM] [N8]*

POLICY S1.3      Deter criminal behavior in Palo Alto through a multidisciplinary approach that includes a safe built environment, effective social services, functional administrative processes and Police Department review of site plans for major development proposals. [NEW POLICY] [N9]

*Program S1.3.1*      *Coordinate with the Police Department, Human Relations Commission and local social service non-profits to develop a strategy for identifying, intercepting and assisting potential offenders before crimes occur. [NEW PROGRAM] [N10]*

*Program S1.3.2*      *Support programs such as the Department of Housing and Urban Development's Good Neighbor Next Door, which incentivizes home purchase for first responders with discounts. [NEW PROGRAM] [N11]*

POLICY S1.4      Support the use of valuable crime analytics, data and metrics that are widely available from national organizations to residents, local police departments and first responders. [NEW PROGRAM] [N12]

~~*Program S1.4.1*~~ ~~*Develop*~~ *Provide Make data available to maintain an accurate, up to date, and complete real-time local crime mapping function on the city's website to promote neighborhood safety. [NEW PROGRAM] [N13]*

POLICY S1.5      Encourage the development of community-based law enforcement and community safety strategies, including partnerships with school districts, private schools, businesses, transit agencies, nonprofit organizations, faith-based organizations, and community groups such as Emergency Services Volunteers. [PTC] [NEW POLICY] [N14]

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## SAFETY ELEMENT

Program S1.5.1 Promote neighborhood security by providing crime prevention information and training to residents, and continuing to fund resident involvement in neighborhood safety programs such as “Know Your Neighbor” grants. [NEW PROGRAM] [N15]

Program S1.5.2 ~~Continue working~~ Collaborate with the Palo Alto Unified School District, businesses, non-profits, private schools, local faith-based organizations ~~and the Palo Alto Library~~ to provide community safety education ~~in the classroom.~~ [PTC] [NEW PROGRAM] [N16]

Program S1.5.3 ~~Collaborate with~~ Encourage the Palo Alto Unified School District to ~~encourage the~~ develop secure school facilities, ~~projects~~ and collaborate on ~~programs for~~ disaster preparedness activities; emergency disaster planning, exercises and drills; and disaster recovery. [PTC] [NEW PROGRAM] [N17]

Program S1.5.4 Continue to support and encourage participation in ~~the~~ Police Department programs; ~~as an effective means of to~~ introducing youth to the importance and benefits of local law enforcement. [PTC] [NEW PROGRAM] [N18]

POLICY S1.6 Work with the Police Department to develop effective, transparent law enforcement strategies that protect the privacy and civil liberties of all residents- [NEW POLICY] [N19]

Program S1.6.1 Enhance police training for evolving ~~police~~ challenges, such as small- ~~and~~ large--scale human threats, interacting with individuals with mental illness, and non-lethal alternatives. [NEW PROGRAM] [N20]

Program S1.6.2 Support the Palo Alto Police Department in implementing and maintaining approved technologies for data gathering, surveillance, and recording interactions with the public. Incorporate best practices in use policies with special consideration in ensuring the programs protect the public's privacy rights and civil liberties, in accordance with current legislation. Ensure transparency by communicating new equipment implementation, usage, privacy considerations, and retention of data. [NEW PROGRAM] [N21]

**SAFETY ELEMENT**

POLICY S1.7 Regularly review the adequacy of law enforcement services and emergency services in the City. Plan and develop law enforcement infrastructure and technology according to overall need and City growth. [PTC] [NEW POLICY] [N22]

Program S1.7.1 ~~Periodically~~ Regularly monitor and review the level of public safety staffing required for efficient local service delivery. [PTC] [NEW PROGRAM] [N23]

~~Program S1.1.3~~ Program S1.7.2 Design the new Public Safety building to meet the needs of the public safety departments and be resilient against known threats and hazards. This includes remaining fully operational after a catastrophic (7.9 magnitude) earthquake, other natural disasters, moderate terrorist attack or crisis. ~~Complete the PS building on of the Police Department and the Office of Emergency Services and other crisis events.~~ [PTC] [NEW PROGRAM] [N24]

~~Program S1.1.4~~ Program S1.7.3 Provide community notifications in the event of emergency using the best available methods and explore new technologies for emergency public information and warnings. ~~Use the Santa Clara County Alert SCC emergency notification system to notify residents when needed.~~ [PTC] [Previous Program G-10] [N25]

POLICY S1.8 Monitor federal and State terrorism response planning to ensure that Palo Alto coordinates with relevant agencies and is well-prepared in the event of a terrorist act. [NEW POLICY] [N26]

Program S1.8.1 Update Palo Alto's 2001 Terrorism Response Plan. [NEW PROGRAM] [N27]

**Comment [CS1]:** Wording developed in consultation with OES.

**Comment [CS2]:** Program substantially revised based on feedback from OES staff.

**Comment [CS3]:** Moved this policy and program from former Haz Mat section in response to OES feedback

## 1.2. NATURAL HAZARDS

**GOAL S-2. Protection of Life, Ecosystems -and Property From Natural and Man-Made Hazards and Disasters, Including Earthquake, Landslide, Flooding, and Fire-**

### GENERAL SAFETY MEASURES

- POLICY S2.1 Focus efforts to reduce exposure to natural hazards ~~in~~ those areas of the City that have been identified as vulnerable to ~~where~~ the greatest risks, as shown on the maps in this Element exist. [Previous Policy N-49] [N28]
- POLICY S2.2 Implement public safety improvements, such as access roads and other infrastructure, in a manner that is sensitive to the environment. [Previous Policy N-50] [N29]

### EARTHQUAKES AND GEOLOGIC HAZARDS

- POLICY S2.3 Expand citizen awareness of seismic and geologic hazards through public education and preparedness. [PTC] [NEW POLICY] [N30]

*ContinueStrengthen the City's participation in regional earthquake awareness programs such as the "Annual Great Shake Out" and other relevant efforts to educate the public. [PTC] [NEW PROGRAM]*

*Strengthen earthquake preparedness activities with Palo Alto Unified School District. [PTC] [NEW PROGRAM]*

- POLICY S2.4 Minimize exposure of people and structures to geologic hazards, including slope stability, subsidence, and expansive soils, and to seismic hazards including groundshaking, fault rupture, liquefaction, and ~~landsliding~~landslides. [Previous Policy N-51] [N31]

*Program S2.4.1 Periodically review and update the City's Seismic Hazard Ordinance. [PTC] [NEW PROGRAM] [N32]*

- POLICY S2.5 Promote seismic rehabilitation and renovation of existing ~~older~~ buildings, particularly those whose loss would have the greatest

**SAFETY ELEMENT**

community impacts, using incentives as a way to ensure safe and structurally sound buildings. [PTC] [NEW POLICY] [N33]

~~Strictly enforce State Uniform Building Code Title 24 of the California Code of Regulations and locally adopted seismic safety restrictions requirements. [Previous Program N-69]~~

**Comment [JJ4]:** Recommended for deletion; says the City will follow/enforce State law.

Program S2.5.1 Continue to provide ~~appropriate~~ incentives for seismic retrofits of structures in the University Avenue/ Downtown area throughout the city, particularly those building types that would affect the most people in the event of an earthquake. [Previous Program N-70] [N34]

~~Allow development rights achieved through seismic upgrading of specified sites to be transferred to designated eligible receiver sites. [Previous Program N-71]~~

Program S2.5.2 Study the possibility of incorporating a sunset date into the program that allows transfer of development rights. [PTC] [NEW PROGRAM] [N35]

Program S2.5.3 Explore the use of Community Development Block Grants, ~~and~~ Palo Alto Housing Funds and other sources of funding to promote retrofitting of existing soft-story construction by owners of lower income and senior housing. [PTC] [NEW PROGRAM] [N36]

POLICY S2.6 Encourage property owners ~~and~~, business owners and the Palo Alto Unified School District to evaluate their vulnerability to earthquake hazards and take appropriate action to minimize their risk. [PTC] [NEW POLICY] [N37]

Program S2.6.1 ~~Revise the Zoning and Subdivision Ordinances to recognize seismic, geologic, and soil related hazards. As part of the construction permitting process for proposed new and redeveloped buildings in areas of identified hazard shown on Figure XX— particularly for structures identified as high risk that would affect the most people in a the even-seismic event—, require preparation-submittal to the City of a geotechnical/seismic report new and redeveloped buildings development and redevelopment in order that identifies specific risks and appropriate mitigation measures from an~~

**Comment [GG5]:** Moved per PTC

## SAFETY ELEMENT

~~engineering geologist that reviews geologic, soils, and engineering reports for developments in hazard areas. Establish appropriate fees to cover the cost of this review. [Previous Program N-73] [N38]~~

~~Program S2.2.1~~ Program S2.6.2 ~~Review and update, as appropriate, City code requirements for excavation, grading, and filling and construction to ensure that they conform to currently accepted and adopted standards. [Previous Program N-74] [N39]~~

Comment [GG6]: Moved per PTC

Program S2.6.3 ~~Utilize the results of Palo Alto's Seismic Hazards Identification Program and inventory of potentially seismically vulnerable buildings types to establish priorities and create incentives to encourage structural retrofits. [NEW PROGRAM] [N40]~~

~~Program S2.2.2~~ Inform homeowners, businesses and neighborhood groups of the potential benefits of traditional land-line telephones for communications redundancy in the event of an earthquake. [NEW PROGRAM]

Comment [GG7]: Moved per PTC

Comment [GG8]: PTC

## FLOOD HAZARD AND MITIGATIONS

POLICY S2.7 ~~Minimize exposure to flood hazards of proposed development in FEMA-designated Special Flood Hazard Areas by adequately reviewing proposed development in flood prone areas. [Previous Policy N-52] [N41]~~

Program S2.7.1 ~~Implement the flood mitigation requirements of FEMA relating to construction in Special Flood Hazard Areas as illustrated on the Flood Insurance Rate Maps. [Previous Program N-76] [N42]~~

Program S2.7.2 ~~Continue participating in FEMA's Community Rating System to reduce flood insurance for local residents and businesses and strive to improve Palo Alto's rating in order to lower the cost of flood insurance. [PTC] [NEW PROGRAM] [N43]~~

Program S2.7.3 ~~Partner with appropriate agencies to consider the issue of how expand flood zones may need to be expanded as appropriate a result of due to sea level rise, or of changes in creek channels, sheet flooding or storm drain overload -due~~



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**SAFETY ELEMENT**

to increased likelihood of extreme storm events caused by climate change. [PTC] [NEW PROGRAM]- [N44]

~~Program S2.7.4~~ Collaborate with the San Francisquito Creek Joint Powers Authority and the Santa Clara Valley Water District on environmentally-sensitive efforts to stabilize, restore, maintain and provide one percent (100-year) flood protection adjacent to San Francisquito ~~Creek~~, Creek. [PTC] [NEW PROGRAM] [N45]

~~Program S2.2.3~~ Work with the San Francisquito Creek Joint Powers Authority on efforts to replace the City-owned Newell Street Bridge and the San Francisquito Creek Joint Powers Authority-owned Chaucer Street Bridge. [NEW PROGRAM] [N46]

POLICY S2.8 Prevent new habitable basements as part of residential development in single-family residential neighborhoods within the flood hazard zone. [NEW POLICY] [N47]

~~Program S2.2.4~~Program S2.8.1 Keep basement restrictions up to date with changing flood hazard zones. [NEW PROGRAM] [N48]

~~Program S2.2.5~~Program S2.8.2 Study appropriate restrictions on underground construction in areas in which the current groundwater level is 14 feet or less to accommodate expected higher groundwater levels due to sea level rise and minimize consequent flooding of underground construction. [NEW PROGRAM] [N44]

~~POLICY S2.3~~POLICY S2.9 Monitor and respond to the risk of flooding caused by climate change-related changes to precipitation patterns, groundwater levels, sea level rise, tides, and storm surges. [PTC] [NEW POLICY] [N50]

~~Program S2.3.1~~Program S2.9.1 Implement shoreline development regulations to ensure that new development is protected from potential impacts of flooding resulting from sea level rise and significant storm events. Regulations may include new shoreline setback requirements, limits on lot line adjustments to avoid the creation of vulnerable shoreline lots, and/or triggers for relocation or removal of existing structures based on changing site conditions and other factors. [NEW PROGRAM] [N51]

## SAFETY ELEMENT

~~POLICY S2.10~~ Support regional efforts to improve bay levees. [NEW POLICY] [N52]

*Program S2.10.1 Work cooperatively with the Santa Clara Valley Water District and the San Francisquito Creek Joint Powers Authority to provide flood protection from high tide events on San Francisco Bay, taking into account the impacts of future sea level rise, to provide one percent (100-year) flood protection from tidal flooding, while being sensitive to preserving and protecting the natural environment. [PTC] [NEW PROGRAM] [N53]*

*Program S2.10.2 Work with regional, State, and federal agencies to determine if sea levels in the San Francisco Bay warrant additional adaptation strategies to address flooding hazards to existing or new development and infrastructure, including support for environmentally sensitive levees. [NEW PROGRAM] [N54]*

**Comment [GG9]:** Added per City Council. Senate Bill 379 identifies "map of levee protection zones" as necessary component of policy.

**Comment [GG10]:** EIR Mitigation Measure Moved to Safety Element flooding section

## FIRE PROTECTION AND AWARENESS

~~POLICY S2.4~~ POLICY S2.11 Minimize exposure to wildland and urban fire hazards through rapid emergency response, proactive code enforcement, public education programs, use of modern fire prevention measures, and adequate emergency management preparation. [Previous Policy N-53] [N55]

*Program S2.11.1 Regularly review and update the Fire Department's operations, training facilities, and programs to ensure consistency with current standards and Best Management Practices. [PTC] [NEW PROGRAM] [N56]*

*Program S2.11.2 Explore technological tools, such as cameras or remote sensors, to identify smoke or fires and initiate response as quickly as possible. [NEW PROGRAM] [N57]*

~~POLICY S2.5~~ POLICY S2.12 Require that the planning and design of development in areas exposed to wildland fire hazards minimizes the risks of wildfire and includes adequate provisions for vegetation management, emergency access, and firefighting. [NEW POLICY required by SB 1241] [N58]

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~~Program S2.5.1~~ Program S2.12.1 Regularly review and fund review and updates to the Palo Alto Foothills Fire Management Plan and the fire emergency evacuation provisions in the City's Emergency Management Plan to ensure consistency with current standards and Best Management Practices. [Previous Program N-77] [N59]

**Comment [CS11]:** Deleted per OES staff input clarifying current structure of relevant plans.

Program S2.12.2 Implement the Foothills Fire Management Plan to balance conservation of natural resources with reduction of fire hazards especially in open space areas. [PTC] [NEW PROGRAM] [N60]

Program S2.12.3 Minimize fire hazards by ~~implementing~~ maintaining low density zoning in wildland fire hazard areas. [Previous Program N-79] [N61]

~~Program S2.5.2~~ Program S2.12.4 Work collaboratively with other jurisdictions and agencies to reduce wildfire hazards in and around Palo Alto, with an emphasis on effective vegetation management and mutual aid agreements. [NEW PROGRAM] [N62]

Program S2.12.5 Consider implementation of CAL FIRE recommended programs in educating and involving the local community to diminish potential loss caused by wildfire and identify prevention measures to reduce those risks. [PTC] [NEW PROGRAM] [N63]

POLICY S2.13 Provide emergency fire and medical services consistent with the response time standards set forth in the Fire Department's annual budget, Public Safety Department's (Fire, Police, Office of Emergency Services) plan. [Previous Policy N-54] [N64]

Program S2.13.1 Evaluate measures ~~for consolidation of services with other jurisdictions~~ for optimal service delivery to improve efficiency; develop automatic or mutual aid agreements with other jurisdictions, including Stanford, to improve efficiencies. [Previous Program N-80] [N65]

~~Program S2.5.3~~ Program S2.13.2 Upgrade fire stations so that all remain fully functional following earthquakes. [NEW PROGRAM] [N66]

Program S2.13.3 ~~Continue to collaborate with~~ Review existing costs and contracts to develop a plan for the long term funding of the

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**SAFETY ELEMENT**

*fire department and appropriate staffing levels at all stations. ~~Stanford~~ [NEW PROGRAM] [N67]*

POLICY S2.14 Support Palo Alto Fire Department's efforts in public education and community outreach to prevent injury, loss of life, and damage to property from accidental fires. [PTC] [NEW POLICY] [N68]

~~Program S2.5.4~~ Program S2.14.1 Provide public education on fire safety, including *wildland and structural fire prevention, evacuation routes and guidelines for clearance of landscaping and other hazards around structures.* [Previous Program N-78] [N69]

POLICY S2.15 Monitor and respond to the risk of wild land fire hazards caused by climate change. [PTC] [NEW POLICY] [N70]

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## **2.3. HAZARDOUS WASTE MATERIALS HUMAN-CAUSED THREATS**

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### **GOAL S-3. An Environment Free of the Damaging Effects of Human-Caused Threats and Biological and Chemical Hazardous Materials.**

POLICY S3.1 Minimize the use of toxic and hazardous materials in Palo Alto. ~~Encourage~~ Promote the use of alternative materials and practices that are environmentally benign. [Previous Policy N-30] [N71]

Program S3.1.1 Continue City permitting procedures for commercial and industrial storage, use, and handling of hazardous materials and regulate the commercial use of hazardous materials that may present a risk of offsite health or safety effects. [Previous Program N-47] [N72]

~~Program S3.1.1~~ Program S3.1.2 Establish protocols to monitor the movement of hazardous materials on Palo Alto roadways and respond effectively to spills via established truck and construction routes. [NEW PROGRAM] [N73]

~~Program S3.1.2~~ Program S3.1.3 Work with non-profit organizations to provide information to all user groups about the public regarding pesticides and other commonly used hazardous materials, environmentally preferable alternatives, and safe

Comment [GG12]: PTC

**SAFETY ELEMENT**

*recycling and disposal ~~methods~~ practices to all user groups.  
[Previous Program N-46] [N74]*

*Program S3.1.4 Continue ~~sponsoring a~~ providing regular household hazardous waste collection events at the Palo Alto Regional Water Quality Control Plant and strive to make these programs more convenient and accessible to residents.  
[Previous Program ~~N-48~~] [N75]*

Comment [GG13]: PTC

*~~PROGRAM N-49: Study the relative costs, advantages, and disadvantages of joining the regional household hazardous waste program operated by the Santa Clara County Department of Environmental Health.~~*

Comment [GG14]: Study complete

*Program S3.1.5 Continue ~~the program that~~ allow s-small quantity generators to dispose of hazardous waste at cost. [Previous Program N-50] [N76]*

*~~Program S3.1.3~~Program S3.1.6 Continue to educate residents on the proper disposal of pharmaceutical and household hazardous waste. Encourage proper disposal of medications through pharmacies or drug take-back programs rather than flushing. [NEW PROGRAM] [N77]*

POLICY S3.2 Continue working with appropriate agencies to clean up hazardous waste sites and contaminated groundwater. [NEW POLICY] [N78]

~~POLICY S3.2~~POLICY S3.3 Support public agency policies, regulations, legislation, and programs that implement ~~the~~ Santa Clara County's Hazardous Waste Materials Management ~~Plan~~ Program. [Previous Policy N-32] [N79]

~~POLICY S3.3~~POLICY S3.4 Protect City authority for the approval or denial of proposed commercial hazardous waste treatment, storage, or disposal facilities in the City. Continue to support the concept of "fair share" agreements between counties in the siting of such facilities. [Previous Policy N-33] [N80]

POLICY S3.5 Decrease the risks associated with rail infrastructure in Palo Alto, including the movement of hazardous materials through the City and the dangers of passenger trains in a fully-developed, populated environment. [NEW POLICY] [N81]

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## SAFETY ELEMENT

Program S3.5.1 Work with the freight industry to monitor the contents of freight trains intersecting Palo Alto for potentially hazardous materials, and to establish accountability for accidents and spills. [NEW PROGRAM] [N82]

Program S3.5.2 Develop a campaign, in concert with Caltrain and the Palo Alto Unified School District, to educate students on the dangers of rail trespass and the benefits of suicide support services available in Palo Alto. [NEW PROGRAM] [N83]

POLICY S3.6 Recognizing that smoking and second-hand smoke affects air quality, including indoor air quality, the City supports efforts to reduce smoking and enforce smoking ban. [NEW POLICY] [N84]

POLICY S3.7 Monitor professional and medically-sound research and studies on electromagnetic fields (EMF) and share information with the Palo Alto community in order to alleviate public concern. [NEW POLICY] [N85]

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## 3.4. INFRASTRUCTURE

### GOAL S-4. Infrastructure that is prudently managed and maintained to protect public health, resident safety and the natural environment.

POLICY S4.1 Design Palo Alto's infrastructure system to protect the life and safety of residents, ensure resiliency in the face of disaster, and minimize economic loss. [NEW POLICY] [N86]

## WATER SUPPLY AND SAFETY

~~POLICY S3.4~~ POLICY S4.2 Maintain Secure a safe, clean, and reliable, long-term supply of water for Palo Alto, including enhancing our emergency storage and supply system. [Previous Policy N-19] [N87]

~~POLICY S3.5~~ POLICY S4.3 Maintain cost-effective citywide water conservation and efficiency programs for all customers, including low income customers, through a diverse portfolio of education, rebates, assistance programs, and building requirements. [Previous Program N-24] [PTC] [N88]

**Comment [CS15]:** Staff noted that the emergency well supply project has been completed.

**Comment [GG16]:** Moved per PTC

**SAFETY ELEMENT**

Program S4.3.1 *Educate customers on efficient water use (indoor and outdoor), tree care, and landscaping options. [NEW PROGRAM] [N89]*

~~POLICY S3.6~~ POLICY S4.4 *Encourage owners of existing residential and commercial property owners to conserve water by modeling best practices including replacing inefficient plumbing fixtures in buildings, installing drought tolerant landscape and harvesting rainwater. [NEW POLICY] [N90]*

~~POLICY S3.7~~ POLICY S4.5 *Plan for water scarcity due to climate change and increased demand due to population growth, by regulating groundwater use. [NEW POLICY] [N91]*

Program S4.5.1 *Prepare a groundwater management plan that will address groundwater supply and quality, including, as appropriate:*

- An approach to metering extracted groundwater.
- Methods to ensuring that uncontaminated, toxin-free groundwater is used in a manner that benefits the community, for example in irrigation of parks, street cleaning, and dust suppression.
- Procedures for recharging the local aquifer with extracted groundwater. [NEW PROGRAM] [N92]

~~*Regularly review the water rate structure to ensure that it covers fixed costs based on cost of service studies and encourages conservation and efficiency encourages efficiency and is competitive. [Previous program N 23]*~~

**Comment [GG17]:** City staff: Program is now outdated. Rates must be based on cost of service, per Proposition 26

**Comment [GG18]:** PTC

**Comment [JJ19]:** Moved from Goal N-2 regarding natural disasters per feedback from Public Works Department.

**DROUGHT**

POLICY S4.1 *Support the development a multi-faceted approach to ensure resilient supply and management of water in Palo Alto, during a significant periods of historic drought. [NEW POLICY] [N93]*

Program S4.1.1 *Study the supply and quality of local groundwater aquifers to better understand their utility as natural water storage and the potential of emergency water wells during severe drought. [NEW PROGRAM] [N94]*

Program S4.1.2 *Work with local public agencies to educate residents regarding the public health, fire and overall quality of life*

**Comment [L20]:** Deleted per feedback from Public Works Dept.

**SAFETY ELEMENT**

*risks associated with long-term drought. [NEW PROGRAM] [N95]*

*Program S4.1.3 Evaluate the development and implementation of a new set of development criteria and standards specific to water conservation in times of severe long-term drought. [NEW PROGRAM] [N96]*

**WASTEWATER TREATMENT**

~~POLICY S3.8~~ POLICY S4.2 Reduce the discharge of toxic materials into the City's sanitary sewer collection system by promoting the use of Best Management Practices and reducing ~~Reduce~~ pollutant levels in City wastewater discharges. [Previous Policy ~~N-25~~] [N97]

Comment [GG21]: PTC

~~Program S3.8.1~~ *Continue to educate residents on the proper disposal of pharmaceutical and household hazardous waste. [NEW PROGRAM]*

Comment [GG22]: PTC

~~Program S3.8.2~~ Program S4.2.1 *Work with commercial and industrial dischargers to identify and implement pollution prevention measures and Best Management Practices to eliminate or reduce the discharge of metals and other pollutants of concern ~~recover metals onsite rather than discharging them into the sanitary sewer system.~~ [Previous Program N-35] [N98]*

~~Program S3.8.3~~ Program S4.2.2 *Provide incentives to encourage commercial dischargers to consistently go beyond minimum requirements of the Clean Bay Business Program. [PTC] [NEW PROGRAM] [N99]*

~~POLICY S3.9~~ POLICY S4.3 Provide, maintain, and operate wastewater treatment facilities, including maintaining adequate capacity at the Regional Water Quality Control Plant located in Palo Alto, to accommodate projected economic and population growth. Ensure that the plant operates in compliance with applicable local, State, and ~~f~~ederal clean water, clean air, and health and safety regulatory requirements. [PTC] [NEW POLICY] [N100]

Program S4.3.1 *Implement approved recommendations based on the Long-Term Facilities Plan prepared for the Regional Water Quality Control Plant. [PTC] [NEW PROGRAM] [N101]*



**SAFETY ELEMENT**

~~Program S3.9.1~~ Program S4.3.2 *Develop a plan to address ongoing operations of the Regional Water Quality Control Plant taking potential sea level rise into account. [NEW PROGRAM] [N102]*

**RECYCLED WATER**

~~POLICY S3.10~~ POLICY S4.4 *Improve source control, and treatment, and distribution of recycled water, including reducing the salinity of recycled water, to maximize its use. [PTC] [NEW POLICY] [N103]*

~~Program S3.10.1~~ Program S4.4.1 *Expand existing recycled water infrastructure to serve a larger area. Develop a plan to install ~~Consider requiring that "purple pipe" added~~ whenever streets are opened for other infrastructure work. [NEW PROGRAM] [N104]*

Program S4.4.2 *Investigate ways to reuse non-traditional water sources including recycled, gray, black and stormwater. [NEW PROGRAM] [N105]*

~~POLICY S3.11~~ POLICY S4.5 *Promote the use of salt-tolerant native species and ~~Require separate irrigation systems that can accept~~ Implement incentives for the use of drought-tolerant landscaping and recycled water for landscape irrigation for larger developments. [PTC] [Previous Program N-26] [N106]*

**Comment [GG23]:** PTC

**STORMWATER MANAGEMENT**

POLICY S4.6 *Promote the capture and reuse of stormwater for irrigation and other purposes, and improved public safety. [NEW POLICY] [N107]*

Program S4.6.1 *Develop and implement a green stormwater infrastructure plan with the goal to treat and infiltrate stormwater. [NEW PROGRAM] [N108]*

~~Program S3.11.1~~ Program S4.6.2 *Mitigate flooding through improved surface permeability or paved areas, and storm-water capture and storage. [NEW PROGRAM] [N109]*

**Comment [GG24]:** City staff suggestion

**Comment [GG25]:** EIR Mitigation Measure

**SAFETY ELEMENT**

Limit the amount of impervious surface in new development or public improvement projects to reduce urban runoff into storm drains, creeks, and San Francisco Bay. [Previous Policy N-22]

*Program S3.11.2 Evaluate Promote the use of permeable paving materials that allow for natural percolation and site drainage through a Storm Water Rebate Program and other incentives. [Previous Program N-34]*

*Program S3.11.3 Promote landscape design that optimizes soil volume, porosity, structure, health, and configuration. [NEW PROGRAM]*

**POLICY S3.12** **POLICY S4.7** Improve storm drainage performance by constructing new system improvements where necessary and replacing undersized or otherwise inadequate lines with larger lines or parallel lines. [Previous Policy N-24] [N110]

*Program S3.12.1 Program S4.7.1 Establish a standardized process for evaluating the impacts of development on the storm drainage system, including point source discharge, base flow and peak flow. [Previous Program N-75] [N111]*

*Program S3.12.2 Program S4.7.2 Complete improvements to the storm drainage system consistent with the priorities outlined in the City's 1993 Storm Drainage Master Plan, provided that an appropriate funding mechanism is identified and approved by the City Council. [Previous Program N-36] [N112]*

**POLICY S3.13** Promote the inclusion of Low Impact Development (LID) measures such as rainwater harvesting and storm runoff infiltration in private developments and public improvement projects, when feasible, as required by the City's storm water discharge permit. [PTC] [NEW POLICY]

**POLICY S4.8** Maintain and improve implementation of the City's Integrated Pest Management Policy with periodic assessments of pesticide use and use of Best Management Practices to reduce pesticide applications and toxicity, and maximize non-chemical control. [PTC] [NEW POLICY] [N113]

*Program S3.13.1 Program S4.8.1 Continue promoting sustainable low impact landscaping practices. [PTC] [NEW PROGRAM]*

**Comment [PW26]:** These are in Natural Environment

**Comment [GG27]:** PTC

**Comment [PW28]:** Natural Environment

**Comment [PW29]:** Natural Environment

**SAFETY ELEMENT**

**POLICY S3.14** Reduce non-point source pollution. Reduce pollution in urban runoff from residential, commercial, industrial, municipal, and transportation land uses and activities. [Previous Policy N-21]

*Program S3.14.1* Work with regulatory agencies, environmental groups, affected businesses, and other stakeholders to identify economically viable Best Management Practices (BMPs) for reducing pollution. Participate in BMPs pilot studies to identify new pollution control measures. [Previous Program N-27]

*Program S3.14.2* Continue public education programs on water quality issues, including Best Management Practices (BMPs) for residents, businesses, contractors, and City employees. [Previous Program N-28]

*Program S3.14.3* Actively participate in programs such as the Santa Clara Valley Urban Runoff Pollution Prevention Program to improve the quality of storm water runoff. [Previous Program N-29]

*Program S3.14.4* Conduct regular street sweeping to collect trash and road surface pollutants before they enter stormwater minimize road surface pollutant runoff. [Previous Program N-30]

*Program S3.14.5* Evaluate spill response, cleanup, and follow up investigation procedures to reduce the impacts of toxic spills on water quality in the City's creeks and San Francisco Bay. [Previous Program N-31]

Manage stormwater runoff in compliance with the Municipal Regional Stormwater permit. [NEW PROGRAM]

*Program S3.14.6* Retain and utilize rainwater on site to the extent possible. Use native or simulated natural drainage systems for buffers and filtration to the extent possible. [NEW POLICY]

**Comment [JJ30]:** These are all about water quality/pollution prevention and have been moved to the Natural Environment Element.

**Comment [JJ31]:** Moved to Natural Environment Element, Goal N-4, Water Resources.

**SOLID WASTE**

**GOAL S-4. ~~Reduced Volumes of Solid Waste; Solid Waste Disposed in an Environmentally Safe, Efficient, Manner.~~**

~~POLICY S4.1~~ POLICY S4.9 ~~Reduce the amount of~~ ~~Eliminate~~ ~~Strive for 95% landfill~~ diversion by 2030, and ultimately zero waste, by enhancing policies and programs for waste reduction, recycling, composting and reuse. ~~Promote innovative ways to reduce the solid waste disposed in the City's landfill, such as by reducing the amount of waste generated and promoting the cost-effective reuse of materials that would otherwise be placed in a landfill.~~ [Previous Policy N-34] [N114]

~~Program S4.1.1~~ Program S4.9.1 *Encourage residential and commercial food waste reduction through incentives, educational outreach and programs.* [PTC] [NEW PROGRAM] [N115]

~~Program S4.1.2~~ Program S4.9.2 *To the extent allowed by law, use refuse rate structures that incentivize waste reduction* ~~Regularly review the landfill fee structure to ensure that it encourages a reduction in solid waste disposal.~~ [Previous Program N-51] [N116]

~~Program S4.1.3~~ Program S4.9.3 *Improve City composting practices and* ~~continue to promoting-promote~~ *the household-composting, including program. Consider extending composting to include food wastes.* [Previous Program N-52] [N117]

~~Program S4.9.4~~ *Continue to develop cost-effective source separation and improve recycling and composting programs for recyclable solid* ~~all waste materials for residential and commercial customers~~ *generators.* [Previous Program N-53] [N118]

~~Program S4.9.5~~ *Continue to develop long-term solid waste management programs that include environmentally sound disposal methods, composting and other organics processing alternatives, and environmentally responsible recycling programs* ~~such as the SMART Station®.~~ [Previous Program N-54] [N119]

~~Program S4.9.6~~ *Work with CalRecycle and the Department of Toxic Substances Control to develop a City-wide electronics and*

Comment [GG32]: PTC  
Comment [GG33]: EIR Mitigation measure  
Comment [GG34]: City staff: "Eliminate" is too inflexible. Suggest saying "strive for zero waste disposed in landfills."

Comment [GG35]: PTC  
Comment [GG36]: City staff: suggest deleting.

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digital hardware recycling program.[NEW PROGRAM]  
[N120]

POLICY S4.10 Reduce solid waste generation through increased salvage and reuse of building materials, including architecturally and historically significant materials. [Previous Policy N-35] [N121]

**Comment [GG37]:** EIR Mitigation Measure

Program S4.10.1 Periodically review and update the adopted Construction and Debris program. [PTC] [NEW PROGRAM] [N122]

Program S4.10.2 Educate Palo Alto residents and developers about available incentives to use environmental friendly deconstruction activities to minimize our carbon footprint, to save natural resources, as well as space in our landfills. [PTC] [NEW PROGRAM] [N123]

~~PROGRAM N 55: Maintain and expand the use of the Recycling Center at the City's refuse disposal area.~~

**Comment [GG38]:** PTC

POLICY S4.11 Support state and federal legislation encouraging the use of recyclable and recycled content goods.[Previous Policy N-38] [N124]

POLICY S4.12 Continue to implement the City's Environmentally Preferred Purchasing policy and programs to reduce waste, toxic product use, resource consumption and to maximize energy efficiency. [PTC] [NEW POLICY] [N125]

Program S4.12.1 Support efforts to enforce extended producer responsibility for solid waste to reduce waste produced from manufacturing, shipping, packaging and the entire life-cycle of the product. [NEW PROGRAM] [N126]

~~POLICY N 37: Ensure the environmentally sound disposal of solid waste.~~

**Comment [GG39]:** PTC

POLICY S4.13 Encourage the use of reusable, returnable, recyclable, and repairable goods, and discourage the use of single use plastic water bottles and extended polystyrene (Styrofoam). -through enforcement of the City's 2016 Plastic Foam Ordinance expansion and continued incentives, education, and responsible City purchasing policies through incentives, educational displays and activities, and City purchasing policies and practices. [Previous Policy N-36] [N127]

## TELECOMMUNICATIONS AND CYBERSECURITY

POLICY S4.14 Improve access to a range of secure, state-of-the-art telecommunications systems by all households, businesses and institutions in Palo Alto. [NEW POLICY] [N128]

*Program S4.14.1 Facilitate marketplace competition from multiple telecommunications providers to improve the overall quality of telecommunications service in Palo Alto. [NEW PROGRAM] [N129]*

*Program S4.14.2 Establish criteria for the installation of maximum security telecommunications technology in new local government and school large-scale commercial and business development projects. [NEW PROGRAM] [N130]*

POLICY S4.15 ~~Secure~~ Ensure that the City of Palo Alto's computer and digital infrastructure ~~are maintained~~ such that public data, records and utilities are ~~secure~~ protected from unauthorized external access and internal system failures. [NEW POLICY] [N131]

~~*Program S4.1.4*~~ *Program S4.15.1 Complete an inventory of the City's digital infrastructure to locate vulnerabilities and gaps in system redundancies and develop recommendations for improved cybersecurity. [NEW PROGRAM] [N132]*

~~*Program S4.1.5*~~ *Program S4.15.2 Establish an off-grid wi-fi network that will be available to public safety responders and Emergency Service Volunteers in the event of power interruption during an emergency or disaster. [NEW PROGRAM] [N133]*

## POWER

~~POLICY S4.2~~ POLICY S4.16 Support the development of an independent, redundant power grid in Palo Alto, in order to ensure energy resiliency in the event of natural disasters or other threats. [NEW POLICY] [N134]

~~*Program S4.2.1*~~ *Program S4.16.1 Identify solutions to add an additional power line to Palo Alto to ensure redundancy. [NEW PROGRAM] [N135]*

~~*Program S4.2.2*~~ *Program S4.16.2 Explore incentives to adopt emerging, residential off-grid capabilities and technologies, including*

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*back-up power sources vital in the event of natural disasters or other threats. [NEW PROGRAM] [N136]*

*~~Program S4.16.3~~ Continue citywide efforts to underground utility wires to limit injury, loss of life, and damage to property in the event of human-made or natural disasters. [PTC] [NEW PROGRAM] [N137]*

*~~Program S4.2.3~~ Program S4.16.4 Enhance the safety of City-owned natural gas pipeline operations. Work with customers, public safety officials, and industry leaders to ensure the safe delivery of natural gas throughout the service area. Provide safety information to all residents on City-owned natural gas distribution pipelines. [PTC] [NEW PROGRAM] [N138]*

*~~Program S4.2.4~~ Program S4.16.5 Provide off-grid and/or backup power sources for critical City facilities to ensure uninterrupted power during emergencies and disasters. [NEW PROGRAM] [N139]*

**Comment [L40]:** Moved from Goal N-5, Emergency Management, to N-4, Infrastructure, per feedback from OES.

**Comment [JJ41]:** Moved from Goal N-5, Emergency Management, to N-4, Infrastructure, per feedback from OES.

**4.5. EMERGENCY MANAGEMENT**

**GOAL S-5. A Coordinated Plan for Effective Emergency Preparedness and Response.**

POLICY S5.1 Follow the guidelines in the Emergency Operations Plan and continue towards implementing the four phases of National Incident Management Systems (NIMS): mitigation/prevention, preparedness, response, and recovery. [PTC] [NEW POLICY] [N140]

*Program S5.1.1 Regularly update and make publicly available the City of Palo Alto Emergency Operations Plan (EOP). [PTC] [NEW PROGRAM] [N141]*

*~~Program S4.2.5~~ ~~POLICY N-55: Minimize exposure to all hazards through emergency management planning.~~*

*Program S5.1.2 Participate in local and regional planning efforts to ~~comply with NIMS~~ mitigate, prepare for, respond to, and recover from emergencies. Regularly update and distribute the City*

**Comment [GG42]:** PTC

**SAFETY ELEMENT**

*of Palo Alto Emergency Management Plan, including the earthquake, flood, and fire emergency evacuation plans. Consult with the Palo Alto Unified School District in updating the Plan.* [Previous Program ~~N-81~~] [N142]

Comment [GG43]: PTC

*Program S5.1.3 Collaborate with the Palo Alto Unified School District to mitigate, prepare for, respond to, and recover from emergencies. [NEW PROGRAM] [N143]*

*Program S5.1.4 Implement the mitigation strategies and guidelines provided by the Local Hazard Mitigation Plan, including evolving hazards resulting from climate change. [PTC] [NEW PROGRAM] [N144]*

~~POLICY S5.2 Implement the guidelines provided in the Utilities Emergency Response Plan to ensure continuity of critical City utilities operations, including utilities, public safety, information technology, and others, after natural, technological, or human caused disasters. Follow these guidelines to develop similar response plans for all City Departments.~~ [PTC] [NEW PROGRAM/POLICY] [N145]

Comment [GG44]: Revised per OES staff

~~POLICY S4.3~~ POLICY S5.3 *Work with other government agencies, neighboring cities, local institutions, non-profit organizations, and private corporations with established emergency response functions to enhance the City's overall emergency response capabilities. [PTC] [NEW POLICY] [N146]*

*Program S5.3.1 Encourage multiagency coordination in case of incidents that cross disciplinary or jurisdictional boundaries or coordination that involves complex incident management scenarios. [PTC] [NEW POLICY] [N147]*

*Program S5.3.2 Explore the establishment of mutually-beneficial cooperative agreements between Palo Alto's police and fire departments and those of neighboring cities. [NEW PROGRAM] [N148]*