CHAPTER 6: SAFETY ELEMENT

INTRODUCTION

Section 65302(g) of the California Government Code requires that the General Plan include a Safety Element for the protection of the community from any unreasonable risks associated with the effects of seismically induced surface rupture, ground shaking, ground failure, tsunami, seiche, and dam failure; slope instability leading to mudslides and landslides; subsidence and other geologic hazards known to the legislative body; flooding, and wildland and urban fire.

The Safety Element is the primary vehicle for relating local safety planning to County land use decisions. The Safety Element aims at reducing death, injuries, property damage, and the economic and social dislocation resulting from natural hazards, thereby improving the quality of life within the County.

Within Tuolumne County, the interface of the natural and manmade environments create potential safety hazards, including wildland fires and flooding. This element, while focusing on fire, flooding, and geologic hazards, also addresses other public safety issues relevant to Tuolumne County, including: emergency services, crime and hazardous waste.

Another vehicle for addressing public safety is the Tuolumne County Multi-Jurisdiction Hazard Mitigation Plan (LHMP). Both the State of California and the U.S. Congress made the development of a LHMP a specific eligibility requirement for any local government applying for mitigation grant funding for natural hazards. Communities with an adopted plan will therefore become "pre-positioned" and more apt to receive any available mitigation funds. In an effort to sustain local commitment to hazard mitigation, Tuolumne County prepared a LHMP that was adopted by the Board of Supervisors on October 19, 2004. During 2012, Tuolumne County updated the LHMP. On December 4, 2012, the Board of Supervisors adopted the 2013 Tuolumne County Multi-Jurisdictional Hazard Mitigation Plan pursuant to Resolution 74a-12. The LHMP recommends specific actions to combat or accommodate the forces of nature and protect the County's residents from hazard losses associated with earthquakes, flooding, landslides and sinkholes, volcanoes, wildfire, extreme weather and hazardous materials. Besides the County of Tuolumne, other jurisdictions participating in the LHMP hazard mitigation planning and approval process include the City of Sonora, Groveland Community Services District, Twain Harte Community Services District, Tuolumne Utilities District, Jamestown Sanitary District, Columbia Fire Protection District, Mi-Wuk Sugar Pine Fire Protection District, Belleview Elementary School District, Big Oak Flat - Groveland Unified School District, Columbia Union School District, Curtis Creek School District, Jamestown Elementary School District, Sonora Elementary School District, Sonora Union High School District, Summerville Elementary School District, Summerville Union High School District, Twain Harte Long Barn School District and the Tuolumne Band of Me-Wuk Indians.

GOALS, POLICIES AND IMPLEMENTATION PROGRAMS

GEOLOGIC HAZARDS

Geologic hazards in Tuolumne County are associated with potential seismic activity along the Foothills fault zone and associated ground shaking. Hazardous situations could also result from development on unstable slopes within the County. Development on erosive soils, without proper environmental protection could result in significant soil loss, siltation of water bodies and visual impacts.

A regional appraisal to evaluate potential seismic and geologic hazards in the western part of Tuolumne County is presented on the General Plan's Geotechnical Interpretive Maps. The maps, which show the

approximate boundaries of various hazard and resource zones (such as fault rupture zones, erosive soil areas, limestone deposits, etc.) are referenced in the Geologic Hazards Report. The Report further addresses seismic hazards including: ground rupture, ground shaking, ground failure and seiches; as well as geologic hazards such as: landslides, unstable slopes, erosive soils, and subsidence and differential settlement.

GOAL 6.A Avoid the exposure of people and improvements to unreasonable risks of damage or injury by directing development away from areas with known seismic and geologic hazards.

Policies

6.A.1 Reduce exposure to risk in hazardous areas, and enable recreational and agricultural opportunities to be maintained or provided by designating hazardous areas, such as areas immediate to capable faults, as open space, agricultural or recreational.

Implementation Programs

6.A.a Land Use Designations for Fault Areas

Designate areas within 100 feet of capable faults as Open Space (O), Agriculture (AG) or Parks and Recreation (R/P) on the General Plan land use maps, and zone these areas for open space preservation, agriculture or recreation. For lands owned by a public agency, such as the Bureau of Land Management, the designation of Public (P) is also compatible within 100 feet of a capable fault area.

GOAL 6.B Map areas determined to be potentially seismically active or otherwise hazardous and regulate development within the affected areas.

Policies

- 6.B.1 Apply zoning and other land use controls to regulate, and in some instances prohibit development in known hazardous areas capable of seismic activity.
- 6.B.2 Limit the extent of development in seismically hazardous areas in such a way as to be commensurate both with the degree of hazard involved and with the public costs which would be incurred if emergency or remedial actions became necessary.
- 6.B.3 Use the General Plan's Geotechnical Interpretive Maps, which show the approximate boundaries of various hazard and resource zones (such as fault zones, erosive soil areas, limestone deposits, etc.) as a basis for future planning.

Implementation Programs

6.B.a Address Hazards in Disaster Plans

Review contingency plans for major disasters and emergencies to verify that the potential for damage and destruction due to earthquakes and geologically induced dam failure with accompanying flooding continues to be addressed.

6.B.b Update the Geological/Geotechnical Maps

Update the Geotechnical Interpretive Maps on a periodic basis to reflect new geologic and seismologic information. This should be undertaken by a geologist or engineering geologist under contract to the County of Tuolumne.

6.B.c Make Maps Available to the Public

Increase public awareness of geoseismic hazards, their location, and their severity. This can be accomplished by making the Geotechnical Interpretive Maps readily available to the public. Copies of the maps will be placed in the Community Development Department and the public library.

6.B.d Have Technical Reports Prepared During Project Review

Establish a program for geologic, seismic, and geotechnical engineering reports required for proposed developments to be reviewed by a technically qualified consultant under contract to the County of Tuolumne. These reports will be required as part of the application review process when a potential hazard exists, and funded by the developers paying for study of their respective projects.

GOAL 6.C Incorporate criteria into the design for dams and other important structures possibly affected by capable fault zones that provide an acceptable level of safety.

Policies

- 6.C.1 Require developers of dams and critical-use and high occupancy structures within 100 feet of capable fault zones to submit plans to the County of Tuolumne demonstrating that the proposed design and construction can accommodate the expected fault offset of the design earthquake and can continue to function. The capable fault zones are defined along presently identified capable faults on the Geotechnical Interpretive Maps.
- 6.C.2 Apply special requirements to critical use and high occupancy structures proposed within 100 feet of capable fault zones. These requirements should:
 - a. Require special geologic and seismic studies to accurately locate all capable fault traces.
 - b. Establish requirements for existing critical use and high occupancy structures within the capable fault zones and initiate a special building inspection program whose purpose is to locate existing critical-use and high occupancy structures within 100 feet of the capable fault zones and to evaluate the safety of such structures under expected seismic conditions.

Implementation Programs

6.C.a Establish Requirements for Building in Capable Fault Zones

Establish and adopt requirements and procedures that apply to structures proposed for human occupancy which are to be located within 100 feet of a capable fault zone.

6.C.b Inspect Critical-use Structures

Investigate a special building inspection program for critical-use and high occupancy buildings to evaluate existing structures located within 100 feet of the capable fault zones for safety under probable earthquake accelerations.

6.C.c Hazardous Structures Mitigation Program

Develop a hazardous structures mitigation program and enforcement regulations for critical-use and high occupancy buildings located within 100 feet of a capable fault zone.

GOAL 6.D Ascertain that existing or proposed structures, particularly critical-use and high occupancy structures, can withstand the ground motion of the design earthquake without catastrophic failure or loss of critical services.

Policies

- 6.D.1 Review plans for existing and proposed structures to see that they are designed and built in accordance with the California Building Code standards for Seismic Category D.
- 6.D.2 Require that critical-use and high occupancy structures be designed and built to retain their structural integrity when subjected to probable ground accelerations generated by the design earthquake.
- 6.D.3 Require development plans to show that important facilities, such as utilities and access roads, for critical-use and high occupancy structures are adequately designed and constructed to withstand the design earthquake.
- 6.D.4 Periodically inspect existing critical-use and high occupancy buildings within the County to identify and require correction of potential hazards in the event of a major earthquake.

Implementation Programs

6.D.a Maintain Seismic Response Criteria in Development Regulations

Continue to implement requirements and procedures found in the California Building Code that apply to structures proposed for human occupancy in accordance with the standards for Seismic Category D.

6.D.b Require Technical Studies for Important Structures

Consider requiring seismic, geologic, and geotechnical engineering studies to evaluate the probable ground shaking conditions in areas where critical-use and high occupancy structures are proposed.

6.D.c Review Plans for Earthquake Standards

Prior to approval of proposed critical-use and high occupancy facilities, require that the plans demonstrate that the proposed building can withstand, without collapse, the probable ground acceleration generated by the design earthquake. Require development plans to show that critical facilities, such as utilities and access roads, for critical-use and high occupancy structures are adequately designed and constructed to withstand the design earthquake. Also require plans to show that, in the event of the failure of these structures, potential hazards created by the loss of utilities, roads, etc. have been identified and mitigated.

6.D.d Establish Mitigation Program for Hazardous Structures

Develop a hazardous structures mitigation program and enforcement regulations for critical-use and high occupancy buildings. This shall include a database of the identified critical-use and high occupancy buildings existing in the County that do not meet modern standards for earthquake safety, and are, therefore, considered "hazardous". Descriptions of the buildings shall be included along with possible hazard mitigation measures.

GOAL 6.E Monitor development to see that construction in landslide or unstable slope areas is accomplished safely, and that development does not create unsafe slopes.

Policies

- 6.E.1 Prior to urban development in landslide or unstable slope areas, require engineering studies to be undertaken in order to determine the extent of the slope instability and require appropriate measures to be undertaken to promote safety.
- 6.E.2 Confirm that the stability of any slope, which can be altered by grading operations and improper drainage conditions, is not adversely affected during grading and construction activities.

Implementation Programs

6.E.a Mandate Engineering Studies for Development in Unstable Areas

Require detailed engineering studies in unstable slope or landslide areas delineated on the Geotechnical Interpretive Maps, prior to approval of urban development. Also, require detailed engineering investigations prior to urban development in areas where unstable slopes have been identified even if they are not shown on the Geotechnical Interpretive Maps. The studies should identify the extent of instability or potential for landsliding, and recommend design alterations, considerations or other features which could reduce the potential hazards to an acceptable level. The feasible recommendations from the study(s) shall be required as part of the project approval process.

6.E.b Consider the Effects of Grading on Slope Stability

Apply Title 12 of the Tuolumne County Ordinance Code, the Grading Ordinance, to address the impacts of earth-disturbing development activities on any slope, whether or not it is shown as potentially unstable on the geotechnical maps. The grading ordinance should include standards limiting fill slopes to 2:1 unless a registered civil engineer or certified engineering geologist can demonstrate that the fill slope will be stable and not prone to erosion.

GOAL 6.F Reduce the potential for erosion and sedimentation from earthmoving and construction activities.

Policies

6.F.1 Mandate erosion control measures for all grading operations.

Implementation Programs

6.F.a Consider the Effects of Grading on Erosion Potential

Apply Title 12 of the Tuolumne County Ordinance Code, the Grading Ordinance, in order to protect soil stability and natural topography and to prevent soil erosion and creation of unstable slopes. Areas identified as having erosive soils, either by the Geotechnical Interpretive Maps or by other means, shall receive special consideration related to the erosive potential of grading and earthmoving activities.

GOAL 6.G Avoid the exposure of people and structures to potential substantial adverse effects, including the risk of loss, injury or death involving earthquake faults, strong seismic ground shaking, seismic-related ground failure, landslides and other natural disasters.

Policies

- 6.G.1 Increase Tuolumne County's capabilities to mitigate the effects of natural hazards.
- 6.G.2 Enhance existing or design new County policies that will reduce the potential damaging effects of hazards without hindering other community goals.
- 6.G.3 Protect Tuolumne County's most vulnerable populations, buildings and critical facilities through the implementation of cost-effective and technically feasible mitigation projects.
- 6.G.4 Protect public health, safety and welfare by increasing the public awareness of existing hazards and by fostering both individual and public responsibility in mitigating risks due to those hazards.
- 6.G.5 Enhance the County's capability to conduct hazard risk assessments, demonstrate funding needs, and track mitigation activities throughout the County.
- 6.G.6 Ensure that all new construction is completed in a way most resistant to loss or damage from natural disasters.
- 6.G.7 Encourage participation in a cooperative mutual aid and emergency response plan between districts of similar functions to provide assistance at time of a natural disaster.
- 6.G.8 Ensure that all vital/critical facilities are protected from the effects of natural hazards to the maximum extent feasible.

Implementation Programs

6.G.a Public Information

Increase the level of knowledge and awareness for Tuolumne County residents on the hazards that routinely threaten the area. Educate property owners on the affordable, individual mitigation and preparedness measures that can be taken before the next hazard event. Public information will be provided through various media including radio and televised broadcasts, internet, publications and conditions attached to County issued entitlements.

6.G.b Seek Funding for Hazard Mitigation Programs

Maximize the use of available hazard mitigation grant programs to protect the County's most vulnerable populations and structures.

6.G.c Review of Development Applications by CDD and EDD

Provide that land development applications which would permit structures in areas subject to natural hazards to be reviewed by the Community Development Department (CDD) and Engineering Development Division (EDD) of the Department of Public Works for identification of measures necessary to mitigate natural hazards.

6.G.d Implement the 2013 Tuolumne County Multi-Jurisdictional Hazard Mitigation Plan

Implement the 2013 Tuolumne County Multi-Jurisdictional Hazard Mitigation Plan, adopted on December 4, 2012 pursuant to Tuolumne County Resolution 74a-12, to protect life, safety and property by reducing the potential for future damages and economic losses that result from geologic hazards.

6.G. e Review and Update Tuolumne County's General Plan and Ordinance Code

Continue to revise or update the County's General Plan and Ordinance Code as new federal and state laws regarding geologic hazards and requirements are enacted.

6.G.f Organize Response to Natural Disasters

Organize response between the Tuolumne County Office of Emergency Services, the Tuolumne County Fire Department, Cal Fire, U.S. Forest Service, the County Sheriff, and other public and private agencies to respond to a natural disaster efficiently.

6.G.g Site Vital/Critical Facilities Protected From Natural Hazards

Site vital/critical facilities where they are protected from natural hazards such as fault zones, flooding and inundation areas.

Responsibility for Programs: Administration of the Implementation Programs identified in this section is the shared responsibility of the County Administrator's Office, the Office of Emergency Services and the Community Resources Agency, with the Community Resources Agency serving as the primary administrator.

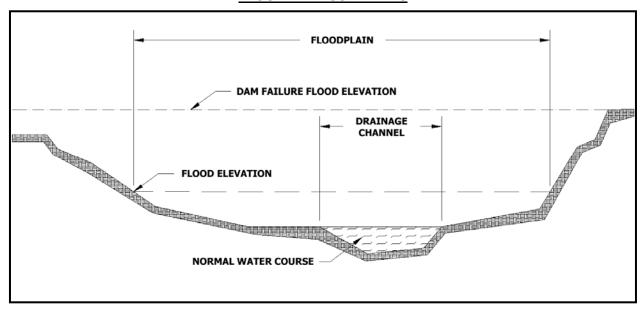
Funding Sources: Administration of the Implementation Programs identified in this section will be funded through the County's General Fund, with the exception of required technical reports which would be prepared at the expense of individual project applicants.

Time Frame for Implementation: Implementation of the programs in this section is ongoing.

FLOOD HAZARD

Tuolumne County has many waterways consisting of ephemeral drainages, intermittent streams, perennial streams and rivers. Most of the major waterways in Tuolumne County are within deeply defined drainage channels, capable of containing flood waters. However, in some areas the drainage channels are less defined and are not capable of containing flood waters. In either case, flood waters create a potential hazard.

FLOODPLAIN SCHEMATIC



Damages resulting from the development of floodplains can be minimized through floodplain management. This management concept encompasses a program of corrective and preventive measures for reducing flood damage, including but not limited to emergency preparedness plans, public information and floodplain management regulations.

In 1990, Tuolumne County became a "regular" member of the Federal Emergency Management Agency, National Flood Insurance Program. Through this program, the flood hazard zone boundary of the one hundred-year floodplain is the basic planning criteria used to distinguish areas where the danger of floods justify the establishment of floodplain management regulations. A "flood hazard zone" means an area subject to flooding that is delineated as either a special hazard area or an area of moderate or minimal hazard on an official flood insurance rate map issued by the Federal Emergency Management Agency. The identification of a flood hazard zone does not imply the area outside the flood hazard zones or uses permitted within flood hazard zones will be free from flooding or flood damage. Areas inside the one hundred-year floodplain and other areas prone to flooding due to rain or dam failure should have some level of regulation or awareness to protect public health, safety, and welfare.

GOAL 6.H Protect new and existing structures and land uses from flood hazards in order to minimize loss of life, injury, damage to property, and economic and social dislocations and manage floodplains for their natural resource value.

Policies

6.H.1 Reduce the potential for damage to property within the 100 year floodplains as designated on the Federal Emergency Management Agency, Flood Insurance Rate Maps and other areas prone to flooding due to rain or dam failure, through limitations on land use.

- 6.H.2 Work to solve flood control problems in areas where existing development has encroached into a floodplain. Encourage property owners with existing structures within areas subject to flooding, whether identified on the Flood Insurance Rate Maps or not, to conform to the requirements of Chapter 15.24 of the Tuolumne County Ordinance Code, the Flood Damage Prevention Ordinance, to "floodproof" the structures.
- 6.H.3 Review all projects proposed within potential inundation areas due to dam failure as identified on the dam failure inundation maps designated by the Office of Emergency Services (OES) and evacuation plans on file with the County Office of Emergency Services for that area. If a project presents a direct threat to human life, appropriate actions shall be taken, including restriction of development in the subject area.
- 6.H.4 Minimize the risk from flood hazards through land use planning and the avoidance of incompatible structural development in floodplains. Utilize regulatory methods of flood control, such as designating identified floodplains and drainage easements as Open Space, where possible, rather than construction-related methods of flood control. Regulatory methods reduce the need for flood control projects, minimize losses in areas where flooding is inevitable, and attempt to notify those who own property in flood hazard areas of the risks and that they should assume responsibility for their actions.
- 6.H.5 Continue to require evaluation of potential flood hazards prior to approval of development projects and require on-site mitigation to minimize off-site flows. Proponents of new development shall submit accurate topographic and flow characteristics information and depiction of the 100-year floodplain boundaries under fully-developed, unmitigated conditions.
- 6.H.6 Attempt to maintain natural conditions within the 100-year floodplain of rivers and streams in order to maintain stream capacity except under the following circumstances:
 - a. Where work is required to maintain the stream's drainage characteristics and where such work is done in accordance with the Tuolumne County Storm Drainage Master Plan, County Standards and Design Manual, County Flood Damage Prevention Ordinance, California Department of Fish and Game regulations, and Clean Water Act provisions administered by the U.S. Army Corps of Engineers; or
 - b. When facilities for the treatment of development generated runoff can be located in the floodplain provided that there is minimal destruction of riparian vegetation, and such work is done in accordance with the County Flood Damage Prevention Ordinance and California Department of Fish and Game regulations.
- 6.H.7 Continue to make information available to property owners and residents living in floodplains.
- 6.H.8 Prohibit the construction of facilities essential for emergencies and large public assembly in the 100-year floodplain, unless the structure and access to the structure are free from flood inundation.
- 6.H.9 Continue to consult with local, regional, state and federal agencies to achieve adequate flood protection. Cooperate with the Tuolumne Utilities District, surrounding jurisdictions, the City of Sonora, and other public, state and federal agencies in planning and implementing regional flood control improvements.
- 6.H.10 Promote the use of natural or non-structural flood control facilities, including off-stream flood control basins, to preserve and enhance creek corridors.

Implementation Programs

6.H.a Develop a Flood Hazards Inventory

Create a flood hazards inventory which identifies flooding hazards (i.e., bridges, roads, natural detention and retention basins and other structures) based upon the Flood Insurance Rate Maps, dam inundation information, historic data on flooding, areas vulnerable to flooding after wildfires and other available information, such as information made available from the U.S. Army Corps of Engineers. The inventory shall identify the level of risk from each type of flood hazard and include a detailed flood hazards map which identifies the flooding risk by location.

6.H.b Notification That Land Is Within Designated Flood Zones

Based upon the Flood Insurance Rate Maps, provide notification to the owners of property within designated floodplains of the consequences of constructing within the floodplain. The Community Development Department shall mail a letter to the owner and record a notice on the property, stating that all or a portion of the property is located in a designated floodplain, and is subject to building and/or use restrictions. This information would be revealed to potential buyers during title search.

6.H.c Review and Update Flood Hazard Information

Continue to maintain flood hazard maps and other relevant floodplain data and revise or update this information as new information becomes available.

6.H.d Flood Damage Prevention Ordinance in Designated "Special Flood Hazard Areas"

Continue to implement and enforce the Flood Damage Prevention Ordinance as it pertains to designated "special flood hazard areas", as identified on the Federal Insurance Rate Maps. The Ordinance will be updated as new information becomes available.

6.H.e Flood Damage Prevention Outside Designated "Special Flood Hazard Areas"

Encourage owners of land and improvements within floodplains not identified on the Federal Insurance Rate Maps (FIRM), to develop the property to meet the requirements of the Flood Damage Prevention Ordinance and the Storm Drainage Master Plan and County Standards and Design Manual. Encouragement will be through public information and conditions attached to County issued entitlements.

6.H.f Dam Failure Evacuation Plan

Update the Tuolumne County Emergency Services Plan to accommodate evacuations due specifically to major dam failure.

6.H.g Emergency Plans

Update the Tuolumne County Emergency Services Plan to accommodate evacuations due specifically to the vulnerability of flooding roads, utilities and essential public facilities, and continue to integrate all flood emergency plans with any emergency plans adopted by local, regional, state, or federal agencies which have regulatory authority over floodplains.

6.H.h Public Information

Continue to provide flood hazard information to the public. Information available includes flood zones, requirements of the Flood Damage Prevention Ordinance, and how to floodproof existing structures through relocation, or "dry" or "wet" floodproofing.

6.H.i Maintain Stream Carrying Capacity

Maintain stream carrying capacity by continuing to regulate new fill, grading, dredging, vegetative clearance for fire protection and other new development which may increase flood damage by increasing sedimentation in streams and watercourses, or by constricting water courses with structures for roads and driveways. Encourage owners of land and improvements within floodplains to maintain the stream carrying capacity by allowing thinning of dense vegetation, subject to approval of the Community Development Department. Encouragement will be through public information and conditions attached to County issued entitlements.

6.H.j Maintain Public Facilities

Continue to maintain essential public facilities, such as culverts and drainage facilities along County maintained roads, and eliminate logiams and other obstructions from bridges.

6.H.k Mitigate Impacts on Downstream Drainage Facilities

Require new development to mitigate impacts on downstream drainages. Measures necessary to mitigate identified impacts will be attached to development entitlements issued by the County.

6.H.I Determine Whether Flood Conditions Affect Lives and Property

Review the County's and City of Sonora's policies and available data concerning development in floodplains to ensure lives and property are not at risk to future flood conditions.

6.H.m Implement the 2013 Tuolumne County Multi-Jurisdictional Hazard Mitigation Plan

Implement the 2013 Tuolumne County Multi-Jurisdictional Hazard Mitigation Plan, adopted on December 4, 2012 pursuant to Tuolumne County Resolution 74a-12, to protect life, safety and property by reducing the potential for future damages and economic losses that result from flood hazards.

Responsibility for Programs: Administration of the Implementation Programs listed in this section is the shared responsibility of the Community Resources Agency and the County Office of Emergency Services with the Community Resources Agency serving as the primary administrator.

Funding Sources: Administration of the Implementation Programs listed in this section will be funded through the County's General Fund and from other funding sources when available.

Time Frame for Implementation: Implementation of the programs listed in this section related to inventory of existing flood hazards, notification of owners of property in flood hazard zones and updating of the Tuolumne County Emergency Services Plan will be completed prior to the end of FY 2014-2015. All other programs are ongoing.

FIRE PROTECTION

Section 65302(g) of the California Government Code requires that each County General Plan contain a Safety Element for the protection of the community from any unreasonable risks associated with the effects of wildland and urban fires. The Safety Element must address evacuation routes, peakload water supply requirements, minimum road widths, and clearance around structures, as those items relate to identified fire hazards.

Tuolumne County contains a diverse mixture of fire environments, ranging from urban shopping centers, multifamily developments, and small-lot subdivisions to blue oak grasslands in the west County and timber stands in the Stanislaus National Forest, including the interface, where development and natural vegetation meet.

Fire protection services within the County are provided by several agencies, representing federal, state, and local jurisdictions, with the assistance of the County's citizens serving as volunteer firefighters. Generally speaking, fire protection missions are broken into two categories; life and property fire protection and wildland fire protection. The majority of the County outside of the Stanislaus National Forest, Yosemite National Park, the City of Sonora and Tuolumne City are State responsibility areas as defined by Sections 4126-4127 of the Public Resources Code. Therefore the California Department of Forestry and Fire Protection (CAL FIRE) is responsible for wildland fire protection in these areas. CAL FIRE utilizes the *Strategic Fire Plan for the Tuolumne/Calaveras Unit* to plan fire prevention, protection and suppression strategies. This plan provides a comprehensive framework explaining how CAL FIRE will assess current and anticipated hazards and risks, develop objectives to mitigate those hazards and risks, establish benchmarks for success, develop strategies to meet the objectives, implement the strategies and facilitate a monitoring system to verify the plan remains connected to the needs of the Tuolumne/Calaveras Unit and stakeholders.

The fire protection agencies within Tuolumne County provide all of the services traditionally associated with fire departments throughout the nation: structural and wildland fire protection, rescue services, and medical aid responses. Complicating fire protection in Tuolumne County is the fact that the County is situated in one of the most hazardous wildland fire environments in the world. Fire protection planning efforts within the County must recognize the need to provide traditional services in light of the extreme fire hazard present within the County. Tuolumne County utilizes the Highway 108 Strategic Plan as the guidance document over the Tuolumne County Community Wildfire Protection Plan. These documents are used to guide wildland fire prevention, protection and suppression planning. The Tuolumne County Community Wildfire Protection Plan was adopted in 2004. It is a comprehensive plan that combines all of Tuolumne County's prefire components into one document. It includes the County's concept of prefire management, a description of the County, a discussion of the stakeholders, fuels, weather, level of service and assets at risk in the County; prefire management plans of fire protection agencies, fire safe councils and strategic groups in the County; and a discussion of the institutional issues related to implementation of this plan. This plan addresses how agencies within Tuolumne County are trying to mitigate the wildland fire hazard and ignition problem in the County. The overall goal of this plan is to reduce costs and losses from wildland fire in Tuolumne County by protecting assets at risk through focused prefire management prescriptions, enhancement of strategic fire defense systems and improved initial attack success.

The *Emergency Services Plan for Tuolumne County* describes the organizational response to typical emergency situations encountered in Tuolumne County. A Wildland Fire Plan is included as Annex G. The purpose of the Wildland Fire Plan is to outline the response organization, command authority, responsibilities, functions and interactions required to mitigate the damaging effects of a large scale or major wildland fire impacting the County. The Wildland Fire Plan is designed to unify agencies responding to a wildland fire under the Incident Command System (ICS) to best utilize resources and most effectively minimize damage to life and property caused by the event.

Structural fire protection is provided to the unincorporated area of the County by providing a cooperative fire protection services approach. Currently CAL FIRE provides administrative and operational services through a fire protection agreement, to the County of Tuolumne, the Jamestown Fire Protection District and the Groveland Community Services District. The remaining local fire agencies in the County, including the Tuolumne Fire District, Columbia Fire Protection District, Mi-Wuk Sugar Pine Fire Protection District, Strawberry Fire Protection District and the Twain Harte Community Services District, play a cooperative role in the fire protection services of the County. However, fire protection needs within the County are continuing to grow and change as the population base within the County changes. In order to provide appropriate levels of

fire suppression services within the County, it may become necessary to further consolidate current agencies that provide fire suppression services into one or more agencies which can accommodate the growing and changing fire suppression needs within the County.

The Tuolumne County Fire Department (TCFD) Service Level Stabilization Plan was adopted in 1992. The Stabilization Plan was designed to address the fire protection needs of the area served by TCFD. It is a general planning document for development of TCFD through acquisition of fire stations, apparatus and equipment and the provision of personnel and support services. The Plan centers on three goals:

- 1. Clearly define the baseline service level for TCFD;
- 2. Identify stable funding sources for TCFD through a realistic annual operations budget; and
- 3. Establish an apparatus replacement fund.

A functionally integrated fire protection system, involving federal, state, and local government resources, is the most cost effective method of delivering high quality fire protection where life, property, and valuable natural resources are at risk. Such a system would allow coordination of fire prevention, protection, and suppression strategies; insuring that both fire starts and the losses associated with fire are minimized.

The Fire Protection Section of the Safety Element insures that impacts on fire protection services resulting from County development will be addressed through the land use planning process. Programs are included which require that fire protection measures be incorporated into new development.

GOAL 6.I Provide structural fire protection to persons and property within Tuolumne County consistent with the needs dictated by the level of development and in accordance with current federal, state, and local fire protection agency regulations and policies.

Policies

- 6.I.1 Improve the County circulation system as necessary to minimize delay of emergency vehicle response and evacuation due to traffic congestion.
- 6.1.2 Maintain adopted levels of fire protection service.
- 6.I.3 Require new development to be consistent with State and County regulations and policies regarding fire protection.
- 6.I.4 Determine that new development does not adversely impact fire protection services provided by local fire agencies within Tuolumne County.
- 6.I.5 Continue to encourage interaction and cooperation between the Tuolumne County Fire Department/CAL FIRE and local fire agencies in responding to and recovering from emergency situations.

Implementation Programs

6.I.a Cooperation Between TCTC, TCFD and Sheriff's Department

Encourage cooperation between the Tuolumne County Transportation Council (TCTC), the Tuolumne County Fire Department (TCFD) and the Tuolumne County Sheriff's Department regarding transportation issues prior to each revision of the Regional Transportation Plan by the TCTC. Fire Department and Sheriff's Department comments regarding emergency response corridors, evacuation routes and needed improvements, such as helispots, should be considered when revising the list of Circulation Improvement Projects.

6.I.b Minimize Response Times

Consult with the Tuolumne County Fire Department when reviewing plans for new County-maintained roads and improvements to existing County-maintained roads in order to minimize emergency equipment response times.

6.l.c Apply Contemporary Standards to New Development

Forward applications for new development to the Tuolumne County Fire Department/CAL FIRE for evaluation and identification of necessary fire protection measures for such development based upon contemporary fire prevention measures and protection standards.

6.I.d Determine Impacts to Fire Protection Services

Support the efforts of fire protection agencies in the County. Solicit comments from the agencies responsible for providing life, property, and wildland fire protection on the impact proposed development would have on the existing fire protection services, and recommendations for measures to maintain the established level of service.

6.I.e Improve Service Levels

Strive to improve the County's Insurance Service Office (ISO) ratings through improved infrastructure of hydrants and water availability, and by reducing response time with a greater number of strategically placed and fully staffed fire stations. ISO ratings should not exceed 9 for areas without hydrants and should not exceed 6 for areas with hydrants within the jurisdiction of the Tuolumne County Fire Department as outlined in the 1992 *Tuolumne County Fire Department Service Level Stabilization Plan.* Provide assistance to fire protection agencies in their efforts to improve ISO ratings wherever possible.

6.I.f Implement the 2013 Tuolumne County Multi-Jurisdictional Hazard Mitigation Plan

Implement the 2013 Tuolumne County Multi-Jurisdictional Hazard Mitigation Plan, adopted on December 4, 2012 pursuant to Tuolumne County Resolution 74a-12, to protect life, safety and property by reducing the potential for future damages and economic losses that result from fire hazards.

6.l.g Coordinate Response to Fire Emergencies

Improve interdepartmental communications in order to coordinate fire emergency response between the Tuolumne County Office of Emergency Services, the Tuolumne County Fire Department, local fire agencies, CAL FIRE, the U.S. Forest Service, the National Park Service, the County Sheriff and other agencies.

GOAL 6.J Provide protection to County residents and natural resources from the losses associated with wildland fire.

Policies

- 6.J.1 Consider the fire hazard severity zone and the risk of wildland fire when evaluating development applications in areas subject to wildland fire.
- 6.J.2 Reduce the exposure to risk from wildland fire to an acceptable level. High or very high fire hazard areas may be developed only if they can be made safe by planning, construction, or other fire safety measures.
- 6.J.3 Require new development to have adequate fire protection and to include, where necessary, design and maintenance features that contribute to the protection of the County from the losses associated with wildland fire.
- 6.J.4 Determine that the fire hazard to adjacent property and improvements will not be increased as a result of new development.
- 6.J.5 Promote public awareness of wildland fire hazards present within the County, as well as proper fire prevention and protection practices.

- 6.J.6 Strive to maintain all currently assigned assets at the CAL FIRE Columbia Air Attack Base at the Columbia Airport.
- 6.J.7 Maintain firefighting assets within the County at current levels.
- 6.J.8 Encourage rapid post-fire assessment and rehabilitation of burned lands to limit soil erosion, protect water quality, minimize flooding and restore damaged landscapes.
- 6.J.9 Protect natural resources from the effects of wildland fire consistent with fire protection planning documents adopted by Tuolumne County and CAL FIRE.
- 6.J.10 Require property owners to maintain wildlands in a fire resistant manner consistent with Section 4291 of the Public Resources Code. Assist fire protection agencies in their efforts to enforce Section 4291.
- 6.J.11 Encourage the eradication of invasive plant species to protect native habitats, conserve agricultural land, support ecological diversity and reduce the wildland fire hazard.
- 6.J.12 Support efforts to restore sustainable landscapes and functioning ecosystems following wildland fire.
- 6.J.13 Consider effects on cultural resources, wildlife habitat and special status species when developing wildfire prevention, protection and recovery plans.
- 6.J.14 Identify assets that require protection from wildland fire and prioritize their protection needs.
- 6.J.15 Encourage resolution of conflicts between wildland fire protection and habitat conservation for wildlife.

Implementation Programs

6.J.a Determine Significance of Fire Hazards

Utilize the CAL FIRE Forest and Resource Assessment Program "Fire Hazard Severity Zone Map", including revisions thereto, as a basis for determining the significance of fire hazards when reviewing development applications.

6.J.b Acceptable Development in Fire Hazard Areas

Recognize that new development, including urban or clustered development, is acceptable in moderate, high and very high fire hazard zones, provided that project design meets California Building and Fire Codes including Wildland-Urban Interface Building Codes. Such developments may be required to provide and maintain additional off-site fire defense improvements.

6.J.c Fire Protection Standards for New Development

Require new development to mitigate wildland fire hazards in such a manner that it minimizes the chance of wildland fire originating outside the development from entering the development and minimizes the chance of fire originating within the development escaping to adjoining property and adjacent wildland.

6.J.d Incorporate Fire Safe Design into New Development

Require developers to incorporate fire protection improvements into project designs where determined necessary. Fuelbreaks, green belts, long-term comprehensive fuel management programs, access to developed water sources, strategic helispots (with water supply), and perimeter road systems can all serve to reduce the fire hazard on project sites as well as adjacent property.

6.J.e Require Maintenance of Fuel Reduction Measures

Incorporate mechanisms into development entitlements where necessary to maintain fire protection measures, such as green belts, fuel breaks, or fuel reduction. Such mechanisms could include County Service Areas, Homeowners Associations, mitigation monitoring agreements, or other verifiable forms of assurance.

6.J.f Require New Development to Provide Safe Ingress and Egress

Require new development in areas subject to wildland fire to provide safe ingress and egress in accordance with Chapter 11.12 of the Tuolumne County Ordinance Code, the County's inlieu regulations pursuant to Section 4290 of the Public Resources Code. Encourage new development that complies with Chapter 11.12 to provide multiple access routes, especially in very high fire hazard severity zones or where one access route is susceptible to closure by landslide, loss of a bridge or other cause. Properly constructed roads can act as fuel breaks and fire operation lines, in addition to providing ingress and egress.

6.J.g Review of Development Applications by TCFD

Support the efforts of the Tuolumne County Fire Department (TCFD) to prevent loss of life, property and resources. Refer land development applications which would permit structures in areas subject to wildland fire to the Tuolumne County Fire Department (TCFD)/CAL FIRE for review and identification of measures necessary to mitigate the fire hazard.

6.J.h Consult with Affected Federal Agencies

Consult the U.S. Forest Service, National Park Service and other federal land management agencies regarding applications for development on privately owned lands located adjacent to or within the boundary of the Stanislaus National Forest, Yosemite National Park or other federal lands to obtain comments regarding the impact of the project on the wildland fire protection mission of that agency.

6.J.i Seek Funding for Fire Prevention Programs

Actively seek funding to develop fire prevention public awareness and education programs.

6.J.j Maintain Firefighting Capabilities

Strive to maintain all firefighting capabilities in the County at current levels or improve the current level of service.

6.J.k Retain the Columbia Air Attack Base

Work with CAL FIRE to retain all currently assigned assets at Columbia Air Attack Base at Columbia Airport.

6.J.I Provide Airports to Facilitate Fire Suppression and Evacuation

Continue to make County airports available to facilitate fire suppression aircraft operations and emergency medical evacuation.

6.J.m Modify Policies to Reduce Risk to Lives and Property from Wildfires

Modify the County's policies concerning development in the wildland urban interface area to further reduce the risk of life and property loss from future wildfires.

6.J.n Protect Natural Resource Values

The wildland areas in Tuolumne County provide natural resource values to the citizens of the County, visitors and other persons throughout the State. These values include watershed resources, timber resources, visual resources, carbon sequestration, wildlife habitat and special status species habitat. Utilize the *Tuolumne County Community Wildfire Protection Plan*, the *Highway 108 Strategic Plan*, the CAL FIRE *Strategic Fire Plan for the Tuolumne/Calaveras Unit* and other adopted fire prevention, protection and response plans to identify the maximum acceptable wildfire size and acceptable initial attack success rate for protection of wildland areas and provide the resources necessary to achieve these standards.

6.J.o Dead and Dying Trees

Require property owners to remove trees killed by drought, disease, insects and other pests to utilize the timber value and reduce the wildland fire hazard consistent with Section 4291 of the Public Resources Code unless a tree is determined to have significant wildlife habitat value by a qualified biologist.

6.J.p Invasive Plant Species

Support the efforts of the Agricultural Commissioner to control, and where possible, eradicate, invasive plant species in the County. Refer applications for discretionary land development entitlements to the Agricultural Commissioner to identify potential impacts from invasive plant species and recommend appropriate mitigation measures.

6.J.q Discourage Sale of Invasive Plant Species

Discourage the sale of invasive plant species and noxious weeds identified by the State.

6.J.r Burn Area Recovery Plans

Support the efforts of CAL FIRE, the Tuolumne County Fire Department, local fire agencies, fire safe councils, other fire protection organizations such as the Southwest Interface Team (SWIFT), and property owners to develop burn area recovery plans that include rapid post-fire assessment and implementation actions that encourage salvage of burned trees and reforestation activities, create resilient and sustainable landscapes and restore functioning ecosystems.

6.J.s Consider Effects on Wildlife

Evaluate the effects on wildlife habitat and special status species when developing wildfire prevention, protection and recovery plans. Incorporate measures to mitigate potentially significant impacts into adopted plans.

6.J.t Consider Native Species Habitat

Incorporate the habitat needs of native wildlife species into wildfire prevention, protection and recovery plans. Utilize plant species native to the area when designing revegetation plans.

6.J.u Consider Effects on Cultural Resources

Evaluate the effects on cultural resources when developing wildfire prevention, protection and recovery plans. Incorporate measures to mitigate potentially significant impacts into adopted plans.

6.J.v Prioritize Assets at Risk

When updating the Tuolumne County Community Wildlfire Protection Plan or updating or preparing other Community Wildfire Protection Plans, include the following:

- Identify assets that require protection from wildland fire and prioritize their protection needs in the event that not all assets can be protected from an approaching fire; and
- Identify fire defense strategies, such as fire ignition resistant areas, that provide fire
 protection without dependence on air attack and could serve as safety zones for the
 public or emergency support personnel.
- 6.J.x Fuel Reduction in Habitat Conservation Areas

Coordinate with CAL FIRE, the Tuolumne County Fire Department and the California Department of Fish and Wildlife to identify acceptable levels of wildland fuel reduction in areas conserved for biological resources to mitigate impacts of development.

6.J.y Essential Public Facilities

Locate new essential public facilities including, but not limited to, hospitals, health care facilities, emergency shelters, emergency operations centers and emergency communications facilities, outside very high fire hazard severity zones if feasible. If essential public facilities must be located in high or very high fire hazard severity zones, incorporate design, construction or other measures to minimize damage in the event of a wildland fire.

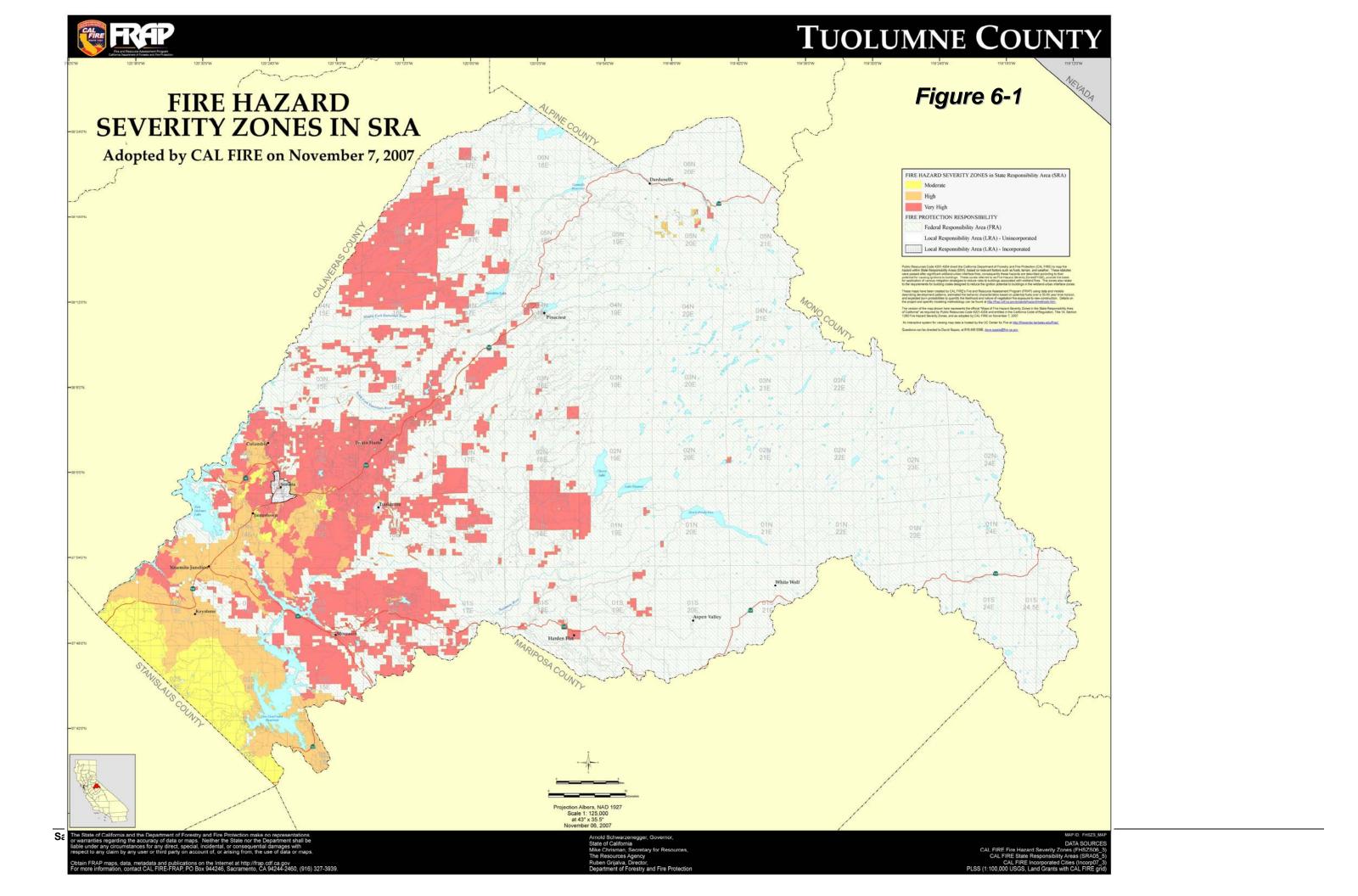
6.J.z Major Wildland Fires

In the event of major wildland fires that exceed the capability of local fire protection resources to control, implement the Wildland Fire Plan contained in the *Emergency Services Plan for Tuolumne County*.

GOAL 6.K Establish and maintain a codified fire protection risk management strategy which requires new development within Tuolumne County to incorporate or supply fire protection infrastructure and improvements necessary so that such development does not exceed the capabilities of the County's fire protection resources.

Policies

- 6.K.1 Review County fire protection regulations to see that they provide for the protection of the public from structural and wildland fire.
- 6.K.2 Apply contemporary fire prevention and protection standards to new development as outlined in the 1992 *Tuolumne County Fire Department Service Level Stabilization Plan*.
- 6.K.3 Require fire prevention and protection measures to be built into new development projects.
- 6.K.4 Determine the impact proposed development will have on the provision of fire protection services and maintain the established level of service as outlined in the 1992 *Tuolumne County Fire Department Service Level Stabilization Plan*.
- 6.K.5 Require that fire flow be provided for development of property designated Commercial, Industrial, Business Park, Mixed Use, Recreational, Low Density Residential, Medium Density Residential, and High Density Residential.
- 6.K.6 Require that new development be provided with access roads which allow for safe and efficient response by emergency apparatus and the safe evacuation of residents in the event of structural or wildland fire.
- 6.K.7 Require that residential development provide for defensible space around structures.
- 6.K.8 Require that street and structural identification are provided to assist in emergency response.



Implementation Programs

6.K.a Utilize Applicable Publications

Utilize the following documents as reference in formulating County standards and ordinances for fire protection measures:

- 2013 Tuolumne County Multi-Jurisdictional Hazard Mitigation Plan
- California Public Resources Code, Section 4290
- Tuolumne County Community Wildfire Protection Plan
- CAL FIRE Strategic Fire Plan for the Tuolumne/Calaveras Unit
- California Fire Code Current Edition
- California Building Code Current Edition
- "Insurance Services Office Publication "Guide for the Determination of Fire Flow"
- Insurance Services Office Standards
- Strategic Fire and Resource Protection Planning
- National Fire Protection Association (NFPA) fire and building safety standards adopted by the County
- CAL FIRE Fire Hazard Severity Zone Map (Figure 6-1)
- Highway 108 Strategic Plan

6.K.b Consult with TCFD and CAL FIRE on Ordinance Revisions

Consult with the Tuolumne County Fire Department (TCFD) and CAL FIRE in revising Titles 11, 15, and 16 of the Tuolumne County Ordinance Code in order to determine if the proposed revisions are consistent with Section 4290 of the California Public Resources Code and other applicable fire protection regulations. Such revisions shall be consistent with fire protection regulations in effect at the time of consideration by the Board of Supervisors.

6.K.c Revise the Tuolumne County Ordinance Code to Reflect Contemporary Fire Protection Measures

Revise the County's development standards as necessary to reflect contemporary fire prevention and protection practices and measures and to determine that needed fire protection infrastructure, including road networks and water systems, are installed and maintained.

6.K.d Adopt Development Criteria Based upon Fire Hazard Severity

Adopt criteria for new development in areas subject to wildland fire. These criteria should be based upon the fire hazard zone rating of the particular development site, and should identify options for reduction of the fire hazard which would be made conditions of development approval.

6.K.e Require Public Water to Be Available for Urban Development

Require that a public water system, having adequate fire flow, is available prior to development of land for which a zone change to an urban zoning district is approved. Public water need not be available on-site at the time of zoning, however, financial and other assurances must be provided to the County which will allow such improvements to be installed in a timely manner.

6.K.f Maintain Title 15 Consistent with the California Building Code and the California Fire Code

Revise Title 15 of the Tuolumne County Ordinance Code as necessary to require new structures to incorporate all fire protection measures required by the current editions of the California Building Code and the California Fire Code, including Automatic Engineered Fire Sprinkler Systems and Automatic Electronic Fire Alarm Systems, referenced in National Fire Protection Association (NFPA) 13 and 72, where necessary.

6.K.g Require Public Water for Urban Development

Residential development, which results in parcels less than two gross acres in area, and commercial development, except that on land designated Special Commercial (SC), shall be protected by a public water system equipped with approved County-standard fire hydrants capable of delivering the required fire flow for the development proposed as required by Sections 15.20.010, 16.24.200 and 16.26.200 of the Tuolumne County Ordinance Code.

6.K.h Require Fire Hydrant Water Systems to Meet Minimum Specifications

Require new fire hydrant water system components to meet the minimum requirements of the California Public Utilities Commission and Section 15.20.030 of the Tuolumne County Ordinance Code.

6.K.i Determine Whether Height Regulations Reflect Services

Review and, if appropriate, amend height regulations for structures, contained in Section 15.20.010(F) of the Tuolumne County Ordinance Code, so that they consistently reflect the ability of the fire protection agencies within the County to provide service.

6.K.j Provide Adequate Evacuation Routes

Consider roadways designated as arterials in the Circulation Element as primary evacuation routes on a County-wide basis. Such routes provide the highest vehicle capacity and serve as the primary means of egress from the County.

The routes designated as collector routes shall be considered secondary evacuation routes on a Countywide basis. These routes provide egress from local neighborhoods and communities.

Require new development to be served by roads which provide safe emergency vehicle response and safe evacuation routes to the nearest arterial or collector route in the event of wildland fire emergency pursuant to Chapter 11.12 of the Tuolumne County Ordinance Code.

6.K.k Provide Vegetation Clearing Adjacent to Access Roads

Revise and enforce County fire protection regulations such that new development in areas subject to wildland fire provides for clearing adjacent to access roads in order to reduce radiant heat received by vehicles on the roadway and thereby facilitate safe evacuation of residents and response by emergency vehicles in the event of wildland fire.

6.K.I Provide Defensible Space Around Structures

Revise and enforce County fire protection regulations that require residential development to provide defensible space for structural fire protection consistent with Section 4290 of the California Public Resources Code and Section 15.20.060 of the Tuolumne County Ordinance Code.

6.K.m Provide Street Signing and Structural Identification

Revise and enforce County fire protection regulations to require new development to provide street signing and structural identification necessary to allow prompt response during emergency situations pursuant to Sections 15.20.045 and 12.12.080 of the Tuolumne County Ordinance Code. Strive to maintain street signs on County-maintained roads. Assist residents and communities to replace street signs where necessary on roads that are not County-maintained.

6.K.n Investigate Incentive Programs for Fire Prevention and Protection Measures

Investigate incentive programs between insurance providers, fire protection agencies, and property owners, whereby financial incentives can be obtained by property owners who implement fire prevention and protection measures through homeowner's insurance reductions or other programs. Such research can be accomplished through contact with legislative offices and the Office of the State Fire Marshal, and review of grant availability lists and fire service technical journals.

6.K.o Tuolumne County Community Wildfire Protection Plan

The Tuolumne County Fire Department Fire Prevention Division continues to revise the *Tuolumne County Community Wildfire Protection Plan* to include projects to reduce the wildland fire hazard in the County. Coordinate revisions of the *Tuolumne County Community Wildfire Protection Plan* and individual community wildfire protection plans with the current version of the CAL FIRE *Strategic Fire Plan for the Tuolumne/Calaveras Unit*.

6.K.p Fire Insurance Rates

Encourage insurance companies to determine fire insurance rates based upon evaluation of individual parcels rather than using the CAL FIRE Forest and Resource Assessment Program "Fire Hazard Severity Zone Map", which was not developed for this use.

GOAL 6.L Establish a system for the orderly expansion of fire protection services within Tuolumne County consistent with the needs dictated by County growth and development.

Policies

- 6.L.1 Construct new fire protection facilities as needed within the jurisdiction of the Tuolumne County Fire Department/CAL FIRE in order to maintain the desired Insurance Services Office (ISO) ratings.
- 6.L.2 Maintain emergency communications systems to support fire suppression efforts.
- 6.L.3 Support the recruitment and training efforts of the Tuolumne County Fire Department and local fire agencies within the County.

Implementation Programs

6.L.a Sites for New Fire Protection Facilities

Identify appropriate areas for construction of new fire protection facilities within the service area of the Tuolumne County Fire Department/CAL FIRE necessary to provide structural fire protection to the residents of Tuolumne County. Consult with all fire agencies in the County on fire protection facilities planning.

6.L.b Provide Fire Protection Facilities, Staffing and Equipment as Required

Construct new fire protection facilities and equip and staff new and existing facilities in areas of the County under the jurisdiction of the Tuolumne County Fire Department where deemed necessary.

6.L.c Emergency Communications Systems

Coordinate maintenance of and improvements to emergency communications systems in the County so that they are capable of supporting use by emergency services during large fire emergencies and incidents in the higher elevations of the County. Coordination should include

the Stanislaus National Forest, Yosemite National Park and fire protection agencies responsible for areas located east of Twain Harte.

6.L.d Support Volunteer Recruitment and Training

Support the Tuolumne County Fire Department and local fire agencies within the County in their efforts to recruit capable volunteers and train them in structural firefighting consistent with State standards.

6.L.e Support the Columbia College Fire Management Program

Support the Columbia College fire science programs by continuing to house a Tuolumne County Fire Department engine at the Columbia College fire station.

6.L.f Support High School Fire Fighter Programs

Support the Tuolumne County Fire Department Explorer Program offered at County High Schools, the Sonora High School Wildland Fire and Emergency First Responder Programs and similar programs offered at other High Schools in the County.

6.L.g Service Level Stabilization Plan

Support and implement the Tuolumne County Fire Department Service Level Stabilization Plan.

GOAL 6.M Establish reliable sources of funding for fire protection services in Tuolumne County in order to maintain the services at an acceptable level.

Policies

- 6.M.1 Establish or redirect existing revenue sources to provide a stable, adequate level of funding for the Tuolumne County Fire Department.
- 6.M.2 Improve fire safety and offset the need for increased fire department staffing and equipment by requiring installation of built-in fire suppression equipment and fire protection measures in new development.

Implementation Programs

6.M.a County Services Impact Mitigation Fee

Review the County Services Impact Mitigation Fees on a regular basis to evaluate the adequacy of the fire protection component.

6.M.b Options for Fire Protection Funding

Investigate and pursue all available and appropriate options for funding of fire protection facilities, equipment and services.

6.M.c Built-in Fire Suppression Equipment in New Development

Enforce the provisions found in Title 15 of the Tuolumne County Ordinance Code for built-in fire suppression equipment in all new development in order to improve fire safety and offset the need for increased fire department staffing and equipment. The fire suppression requirements are found in sources such as Title 15 of the Tuolumne County Ordinance Code, and the California Fire Code.

GOAL 6.N Consult with all affected fire protection agencies on fire protection planning within Tuolumne County.

Policies

- 6.N.1 Actively involve fire protection agencies within Tuolumne County in land use planning decisions.
- 6.N.2 Encourage all fire protection agencies (federal, state, and local) within the County to maintain communication with each other and with the Office of Emergency Services and the Community Resources Agency to promote an integrated approach to fire protection planning.
- 6.N.3 Integrate County policies and land use designations with the strategies of the fire protection agencies within the County to provide adequate service to existing, as well as, future development.
- 6.N.4 Actively support efforts to maintain and improve federal and state fire service capabilities.
- 6.N.5 Consult with CAL FIRE, the U.S. Forest Service, the National Park Service and local fire agencies on fire prevention programs in order to maximize the distribution of information to the public.
- 6.N.6 Support the Strategic Fire and Resource Protection Planning program within Tuolumne County.

Implementation Programs

6.N.a Assess Fire Protection Effects of New Development

Assess the effects of land development applications on fire protection capability during the review of applications. The assessment should incorporate comments from all affected fire protection agencies, not just those with jurisdiction over the project site because wildland fire originating on the site could cross jurisdictional boundaries. Appropriate measures should be formulated and implemented to reduce the safety concerns and fire hazards which could result from approval of the application. Recommendations should specify the source of funding for implementation and maintenance of identified fire protection measures.

6.N.b Involve All Fire Agencies When Amending Fire Protection Regulations

Actively involve all fire agencies, including local fire agencies, within the County when considering revisions to County fire protection regulations which may affect the districts.

6.N.c Cooperate in Management of Wildland Fire Hazards

Work cooperatively with CAL FIRE and local fire agencies to manage wildland fire hazards.

6.N.d Support Efforts of Land Management Agencies to Reduce Wildland Fire Potential

Support efforts of CAL FIRE, the U.S. Forest Service, the National Park Service, other government land management agencies, the Southwest Interface Team (SWIFT), the Highway 108 Fire Safe Council, and the Yosemite Foothills Fire Safe Council, to secure adequate funding for their fire protection and fuel reduction programs, and support their efforts to reduce the wildland fire potential on lands under their jurisdiction within Tuolumne County.

6.N.e Cooperate with Fire Protection Agencies to Distribute Fire Prevention Information

Work with the U.S. Forest Service, CAL FIRE, local fire agencies, the Southwest Interface Team (SWIFT), the Highway 108 Fire Safe Council, the Yosemite Foothills Fire Safe Council, and community fire prevention auxiliary groups within the County to distribute information regarding the wildland fire hazard present within the County, recommended fire prevention practices, and required fire protection measures.

Responsibility for Programs: Administration of the Implementation Programs listed in this section is the shared responsibility of the Tuolumne County Fire Department/CAL FIRE, Community Resources Agency and Board of Supervisors with the Tuolumne County Fire Department/CAL FIRE serving as the primary administrator.

Funding Sources: Administration of the Implementation Programs in this section will be funded through the County General Fund, Tuolumne County Fire Department budget, County Services Impact Mitigation Fees and land development application fees.

Time Frame for Implementation: Implementation of the programs in this section is ongoing.

CRIMINAL JUSTICE SYSTEM

The criminal justice system in Tuolumne County consists of the Sheriff's Department, the court system, the District Attorney's Office, the Probation Department, and the County jail. A deficiency in any portion of the system affects the entire criminal process.

Police protection is provided to the citizens of the unincorporated portion of Tuolumne County by the Tuolumne County Sheriff's Department. The duties of the Sheriff's Department include: patrol of the unincorporated areas of the County for the protection of citizens from criminal activity, respond to citizen requests for law enforcement, crime investigation, maintain jail facilities, provide Public Service Answering Point (911) services, provide coroner services, provide Civil Process and Bailiff support of the judicial system, maintain records of crimes and arrests, issue permits and licenses, manage search and rescue efforts, provide boat patrol services, implement the County Abandoned Vehicle Abatement Program, and provide emergency response and management services. The Sheriff's Department offices and the Tuolumne County jail are located in the City of Sonora.

Population increases and social/economic changes in Tuolumne County have resulted in an increased need for public safety services, particularly in the field of law enforcement. In 2000, the Tuolumne County Sheriff's Department responded to 15,778 service events (a documented request for service through the Dispatch Center that does not include officer initiated incidents). In 2005, the Sheriff's Department received 20,964 calls for service. In 2008, the Sheriff's Department received 32,307 calls for service. As important as the increase in calls for service, has been the change in the severity of calls and cases. Domestic violence, murder, child abuse and molestation, continued drug use, and the appearance of youth gangs indicate that urban problems are present in the County. As the population of the County and, therefore, crime increases, all segments of the criminal justice system must keep pace to maintain the safety of County residents and visitors.

GOAL 6.0 Protect and enhance the quality of life in Tuolumne County by providing a criminal justice system that offers peace of mind to the citizens of Tuolumne County that their lives and personal property will be protected from crime.

Policies

- 6.O.1 Establish revenue sources to provide a stable, adequate level of funding for the criminal justice system in Tuolumne County.
- 6.O.2 Establish a desired level of service for the criminal justice system within the unincorporated area of Tuolumne County and maintain this level.
- 6.O.3 Determine the impact proposed development would have on the criminal justice system in Tuolumne County, and assure that the established level of service is maintained.
- 6.O.4 Require that new development is designed so as to discourage criminal activity.
- 6.O.5 Continue to support a cost-effective, cooperative approach to criminal justice within the Stanislaus National Forest.
- 6.O.6 Regulate illegal and unauthorized dumping to protect the health, safety and welfare of the County's residents.

Implementation Programs

6.O.a Review of County Services Impact Mitigation Fee

Review the County Services Impact Mitigation Fee on a regular basis to determine if the criminal justice component remains adequate. The Fee needs to fund the initial cost recovery of necessary staffing increases and provide on-going revenues to support new positions and services provided by the County's criminal justice system, such as patrol, investigation, supervision, administration, clerical, support, dispatch, coroner, crime laboratory, civil, prosecution, probation and jail services. The heads of each of the respective departments comprising the County's criminal justice system should be consulted as to an adequate level of funding.

6.O.b Level of Service for Tuolumne County's Criminal Justice System

Establish a definitive measure of what constitutes an adequate level of service for the criminal justice system in Tuolumne County. This comprehensive definition should identify all necessary services provided by the County's criminal justice system law enforcement, such as patrol, investigation, supervision, administration, clerical, support, dispatch, coroner, crime laboratory, prosecution, probation and jail services.

In the absence of this determination, the County should continue to maintain the existing level of service and upgrade it to meet the needs of the County's increasing population.

6.O.c Retain the Tuolumne County Law and Justice Center on the Capital Improvement Plan

Retain the Tuolumne County Law and Justice Center on the County's long-term Capital Improvement Plan for funding and construction unless otherwise recommended by a duly appointed Jail Needs Committee. The Law and Justice Center identified in the Justice System Space Needs Study conducted in 1992 and in later studies would provide space for all courts, the District Attorney's Office, Sheriff's Department Administration, and a presentence jail facility on a single site. This Law and Justice Center would minimize inmate transportation needs and would allow the present jail facility to provide space for sentenced inmates.

6.O.d Funding Scheme for the Tuolumne County Law and Justice Center

Develop a comprehensive plan for funding the Tuolumne County Law and Justice Center. Investigate all possible funding sources, including the County General Fund, parcel fees, bond measures, and mitigation fees from the State for expansion of the Sierra Conservation Center.

6.O.e Consider Law Enforcement Options for New and Expanded Urban Areas

Consider implementing law enforcement options as new urban areas develop and expand in order to increase patrol time and reduce response time to citizen requests for law enforcement services.

6.O.f Support and Expand Crime Prevention Programs

Support and expand crime prevention programs, such as the Sheriff's Department Community Services Unit, Neighborhood Watch program, and public education regarding youth gangs. Appoint a Citizen Advisory Committee to provide feedback to the Sheriff regarding law enforcement options and planning. Investigate options to provide an active schools resource officer to work on school campuses.

6.O.g Options for a Juvenile Correction Program for Tuolumne County

Investigate options for a long-range, cost-effective correctional program for juvenile offenders, which includes apprehension, detention and education.

6.O.h Include Criminal Justice Reimbursement in Future Annexations

Include provisions for reimbursement of criminal justice services in the terms of future annexation agreements between the City of Sonora and the County, to provide reimbursement to the County by the City for the expansion of services which it requires.

6.O.i Private Patrols and Security Personnel

Encourage the use of private patrols and security personnel in large residential and commercial developments to assist the Sheriff's Department in crime prevention.

6.O.j Involve the Sheriff in Review of Development Projects

Actively involve the Tuolumne County Sheriff's Department in the review of land development applications and incorporate law enforcement recommendations as conditions of land use entitlements.

6.O.k Regulate illegal and unauthorized dumping

Regulate illegal and unauthorized dumping to protect the health, safety and welfare of the County's residents and the environment. Illegal and unauthorized dumping is deemed to be a public nuisance subject to the administrative/abatement procedures set forth in Chapter 1.10 of the Tuolumne County Ordinance Code.

Responsibility for Programs: Administration of the Implementation Programs listed in this section is the shared responsibility of the Board of Supervisors, County Administrator's Office, Sheriff's Department, District Attorney's Office, Courts, Probation Department and the Community Resources Agency with the Sheriff's Department serving as the primary administrator.

Funding Sources: Administration of the Implementation Programs in this section will be funded primarily through the County's General Fund. Funding of a Tuolumne County Law and Justice Center would require additional revenue sources.

Time Frame for Implementation: Implementation of the programs in this section is ongoing.

EMERGENCY SERVICES

The Tuolumne County Office of Emergency Services (OES) is staffed by the County Administrator's Office. The local OES manages disaster preparedness and training, and manages the response of county resources to disasters. The office maintains emergency response plans required by State and Federal regulations, as well as emergency plans for major developments and facilities located within Tuolumne County.

Chapter 2.40 of the Tuolumne County Ordinance Code addresses emergency services within Tuolumne County. The Chapter designates the Director of Emergency Services, the Assistant Director of Emergency Services, and the Emergency Services Coordinator for the County. The Chapter also establishes the Tuolumne County Operational Area Committee whose mission is to manage a multi-agency disaster response and recovery operation for the Tuolumne County Operational Area. Chapter 2.40 of the Ordinance Code was comprehensively revised in October 1995 to reflect new State and Federal guidelines and remains current in 2009.

The Tuolumne County Emergency Operations Plan (EOP) was updated and approved by the Board of Supervisors in 1996.

Currently, emergency medical services (EMS) are provided to the citizens and visitors of Tuolumne County by the Tuolumne County Ambulance Service, by private air ambulance services and by authorized first response providers. The Tuolumne County Fire Department and participating fire protection districts provide first responder medical aid in cases of emergency. The county ambulance system is operated by the Tuolumne County Human Services Agency. Air ambulance services are provided to the region by private contractors.

The Tuolumne County Search and Rescue Team is a volunteer reserve component of the Sheriff's Department. The Search and Rescue Team performs over 100 calls per year and is one of the five most active search and rescue teams in the State. The Team has developed expertise in search management, search for lost persons, underwater rescue, swift water rescue, technical rescue, underground rescue, aircraft search, mounted search, medical assistance, helicopter rescue, canine rescue unit, and Nordic search. The Search and Rescue Team receives minimal funding from the Sheriff's Department budget each year. However, the costs of maintaining, replacing, and upgrading equipment continue to escalate. The costs associated with training continue to increase as well.

Sonora Regional Medical Center, owned and operated by Adventist Health, is the local hospital providing medical care to the citizens of Tuolumne County.

The County Health Department is charged with coordinating the County's response to public health pandemics.

GOAL 6.P Plan so that Tuolumne County can effectively prepare for, respond to, and recover from the effects of natural or manmade disasters or other emergencies.

Policies 6.P.1 Maintain an effective Tuolumne County EOP to direct the response for a natural disaster or other emergency. 6.P.2 Continue to encourage interagency interaction and cooperation in responding to and in recovering from an emergency situation. 6.P.3 Train emergency personnel in their responsibilities in preparation for a natural/man-made disaster or other emergency. 6.P.4 Assist property owners in the recovery process so they can rebuild structures damaged in a natural/man-made disaster or other emergency.

- 6.P.5 Ensure that current emergency services are adequate to protect public health and safety.
- 6.P.6 Continue to prepare for terrorist incidents and homeland security.
- 6.P.7 Prepare to respond to public health pandemics.

Implementation Programs

6.P.a Periodically Review and Update the Tuolumne County Ordinance Code, Chapter 2.40

Periodically review and update Chapter 2.40 (Emergency Services) of the Tuolumne County Ordinance Code: to evaluate consistency with State and Federal laws and regulations; to assess the current emergency response organization; and to ensure an accurate composition of the Tuolumne County Emergency Services Council.

6.P.b Maintain an Effective Tuolumne County EOP

Maintain an effective Tuolumne County EOP. Ensure the EOP is consistent with the provisions of Articles 1-8 of Division 2 of Title 19 of the California Code of Regulations regarding the Standardized Emergency Management System (SEMS) and with the National Incident Management System (NIMS). The EOP incorporates existing emergency plans where appropriate and evaluates the need to open an emergency operations center (EOC). The EOP should be updated as necessary, in order to incorporate changes in governmental regulations and operational practices.

6.P.c Train County Personnel in Their Responsibilities During an Emergency

Train County personnel in their responsibilities in preparation for a natural or man-made disaster or other emergency pursuant to the SEMS, NIMS and the Tuolumne County EOP.

6.P.d Conduct Training Exercises for Emergency Preparedness

Conduct training exercises on a regular and ongoing basis to establish and maintain an adequate level of emergency response preparedness. Training should involve all agencies anticipated to respond in emergency situations.

6.P.e Funding for Continued Training, Planning and Specialized Emergency Equipment

Actively pursue funding for continued emergency response training, planning and specialized emergency equipment.

6.P.f Apply the "Recovery and Reconstruction Ordinance", Chapters 15.30, 15.32 and 15.34 of the Tuolumne County Ordinance Code

Apply the "Recovery and Reconstruction Ordinance", Chapters 15.30, 15.32 and 15.34 of the Tuolumne County Ordinance Code for implementation following natural disasters. The ordinance streamlines processing of permits required for reconstruction of destroyed or damaged structures, while requiring attention to safety improvements necessary to prevent, or reduce the likelihood of, a reoccurrence of such damage.

6.P.g Implement the 2013 Tuolumne County Multi-Jurisdictional Hazard Mitigation Plan

Implement the 2013 Tuolumne County Multi-Jurisdictional Hazard Mitigation Plan, adopted on December 4, 2012 pursuant to Tuolumne County Resolution 74a-12, to protect life, safety and property by reducing the potential for future damages and economic losses that result from natural and manmade hazards.

6.P.h Office of Homeland Security

Continue to work with the Office of Homeland Security for terrorist preparedness and security training and to upgrade the County's emergency communication facilities.

6.P.i Obtain Funding

Continue to work with state and federal agencies to obtain funding to prepare for public health pandemics and other biological emergencies.

GOAL 6.Q Protect and enhance the quality of life by continuing to provide the highest quality and cost-effective emergency services to the citizens of, and visitors to, Tuolumne County.

Policies

- 6.Q.1 Modify EMS to maintain an acceptable level of service as the County population changes.
- 6.Q.2 Provide state-of-the-art equipment, if economically feasible, to emergency rescue units in order to provide the highest quality, cost-effective EMS.

Implementation Programs

6.Q.a Provide Necessary First Responder Medical Equipment

Provide participating first responder medical aid units with the equipment necessary to efficiently and safely provide emergency first aid, along with the training programs necessary for the safe and effective use of the equipment.

6.Q.b Provide Ambulance Service

Provide ambulance service within the county which maintains a professional level of service to the public in a cost-efficient manner.

GOAL 6.R Identify funding sources to enhance emergency response programs as the county population increases.

Policies

6.R.1 Identify funding sources to provide appropriate levels of emergency services as the county population increases.

Implementation Programs

6.R.a Funding for Emergency Services Training and Equipment

Continue to seek Federal, State and private funding for emergency services training and equipment.

6.R.b Recover Costs for Emergency Services

Assist in recovering costs associated with Search and Rescue missions and ambulance services, wherever/whenever possible.

Responsibility for Programs: Administration of the Implementation Programs listed in this section are the shared responsibility of the County Administrator's Office, Sheriff's Department and the Human Services Agency with the County Administrator's Office serving as the primary administrator.

Funding Sources: Administration of the Implementation Programs identified in this section is funded through Federal and State sources in addition to the County's General Fund, the Health Fund and the Ambulance Enterprise Fund. Emergency services training and equipment are typically funded by Federal and State sources.

Time Frame for Implementation: Implementation of the programs in this section is ongoing.

HAZARDOUS MATERIALS AND WASTE

Pursuant to Section 25135 et sequitur of the California Health and Safety Code, Tuolumne County has prepared a Comprehensive Hazardous Waste Management Plan. The Plan was certified by the Tuolumne County Board of Supervisors on January 31, 1989.

The Tuolumne County Comprehensive Hazardous Waste Management Plan identifies the users of hazardous materials and the hazardous waste producers within the County and the flow of wastes produced. The Plan identifies methods of handling hazardous wastes both on and off site. The Plan further establishes criteria to insure that safe, effective, and economical facilities for the management of hazardous wastes will be available when they are needed, and that these facilities are of the type, and are operated in a manner, which protects public health and the environment.

Household hazardous waste results from products purchased by the general public for household use which may pose a hazard to human health or the environment. Section 41510 of the California Public Resources Code requires each County to adopt a Household Hazardous Waste Element (HHWE) for inclusion into the County Integrated Waste Management Plan which identifies a program for the safe collection, recycling, treatment and disposal of household hazardous waste.

On February 11, 1992, the Tuolumne County Board of Supervisors adopted the Multi-jurisdictional Household Hazardous Waste Element for the unincorporated area of Tuolumne County. The Sonora City Council did the same for the City of Sonora. The goals of the HHWE are to reduce the amount of household hazardous waste generated within Tuolumne County through reuse and recycling, divert household hazardous waste from landfills, promote alternatives to toxic household products, and educate the public regarding household hazardous waste management.

GOAL 6.S Minimize the risk of loss of life, injury, illness, property damage and alteration of established land use patterns resulting from the use, transport, treatment, and disposal of hazardous materials and hazardous wastes.

Policies

- 6.S.1 Verify that the use, storage, transport, treatment and disposal of hazardous materials and hazardous wastes within Tuolumne County complies with Federal, State, and local regulations and safety standards.
- 6.S.2 Protect schools from the risks associated with facilities involved in the handling of hazardous materials or disposal of hazardous waste.
- 6.S.3 Require that industrial plants, mining operations and other facilities which handle or use hazardous materials or hazardous waste be constructed and operated in compliance with current standards for safety and environmental protection.
- 6.S.4 Segregate household hazardous waste generated within Tuolumne County from the municipal waste stream for proper disposal.

Implementation Programs

6.S.a Implement the 2013 Tuolumne County Multi-Jurisdictional Hazard Mitigation Plan

Implement the 2013 Tuolumne County Multi-Jurisdictional Hazard Mitigation Plan, adopted on December 4, 2012 pursuant to Tuolumne County Resolution 74a-12, to protect life, safety and property by reducing the potential for future damages and economic losses that result from hazardous materials and hazardous waste.

6.S.b Compliance with the Comprehensive Hazardous Waste Management Plan

Review development applications for projects that would manufacture, process, or dispose of hazardous materials or hazardous waste for compliance with the Tuolumne County Comprehensive Hazardous Waste Management Plan.

6.S.c Review of Development Applications

Provide for the review of applications for discretionary entitlements for projects which would utilize hazardous materials or generate hazardous wastes by the Tuolumne County Environmental Health Division and the Tuolumne County Fire Department for compliance with the latest adopted regulations for safety and environmental protection.

6.S.d Develop Household Hazardous Waste Collection Facilities

Develop household hazardous waste collection facilities at County transfer stations to facilitate removal of these substances from the municipal waste stream.

6.S.e Support Material Recovery Facility

Support the continued operation of a Material Recovery Facility (MRF), which has the capability of segregating hazardous waste from the County's municipal waste stream.

6.S.f Implement the Multi-jurisdictional Household Hazardous Waste Element

Continue to implement the programs adopted in the Multi-jurisdictional Household Hazardous Waste Element designed to reduce the amount of household hazardous waste (HHW) generated within Tuolumne County, including: periodic drop-off days for all HHW, on-going drop-off program for recyclable HHW, public education regarding HHW reduction, and monitoring the success of these selected programs.

Responsibility for Programs: Administration of the Implementation Programs in this section is the shared responsibility of the Environmental Health Division and Solid Waste Division of the Community Resources Agency.

Funding Sources: Administration of the Implementation Programs in this section will be funded through the County's General Fund, Solid Waste Disposal Fees, and land development application fees. Implementation of some of the programs in the HHWE is dependent upon securing State grants.

Time Frame for Implementation: Implementation of the programs in this section is ongoing.