

## EXECUTIVE SUMMARY

The objective of the Fire Master Plan is to assist the Santa Cruz County Fire Department in providing a high level of fire protection and life safety services within the limits of available resources. This plan is based upon a review of the twelve operational components of the County Fire Department, and it provides recommendations for the improvement of each of these functions.

The plan is intended to be a dynamic working document, reviewed quarterly by the Fire Department Advisory Commission (FDAC). It is intended to provide operational guidance for the California Department of Forestry and Fire Protection (CDF) and seven volunteer fire companies who together provide protection and service as the County Fire Department. The Master Plan details twelve operational components of the County Fire Department and provides a workplan assigning responsibilities and costs associated with each component. The appendices include maps, Fire Department History, CDF Staffing Alternatives, Fire Department Advisory Commission, CDF-County Operational Agreement for 1/1/2002-12/31/02 and the vehicle replacement schedule.

Over the past few years, a fund reserve has developed which will be utilized during the life of this plan to implement programs and purchase recommended equipment. The reserve and County Fire fund will provide all necessary funding required for implementation of the plan. Objectives identified as having “no additional costs” will be met by existing staff and with budgeted appropriations from the fire fund.

The recommendations detailed for 2002/03 fiscal year require \$341,700 in funding which is included in the 2002/2003 Proposed Budget. The total funding required in subsequent years to meet the objectives detailed in the plan will be available as additional appropriations in the County Fire budget from the Fire Fund as follows:

2003/04	\$395,700
2004/05	\$90,700
2005/06	\$128,200

Following is a brief description of each of the twelve operational components of the County Fire Department. The work-plan identifies the staff responsible for each task as County Fire Management (County Fire Chiefs and County Sr. Departmental Analyst) and the Operations Team (Fire Chiefs and the Battalion Chiefs). Other responsible staff titles are detailed. A County Fire Department organizational chart follows this section.

### **Financial**

County Fire is a non-general fund department financed through the County Fire fund. Revenues from property taxes, County Service Area #48 fees (imposed in 1997 in accordance with Proposition 218), inspection and plan review fees, and incident response cost recovery finance the fund. Additional funding opportunities are limited and recommended objectives are focused on maximizing the use of available resources.

The costs of achieving the objectives in this section total \$3,500 for parcel reports and grant writing assistance.

### **Management**

Santa Cruz County contracts with the California Department of Forestry and Fire Protection (CDF) for management and services. This relationship is cost effective, and it is recommended that it continue. Improvements are needed, however, in the area of records management, policy documentation, and organization. To address these issues, staff will develop and improve information management systems; review, consolidate, and expand fire department policies, and analyze and improve organizational effectiveness.

The costs of achieving the objectives in this section include existing staff time and resources and an additional \$1,000 for software and equipment to improve records management in 2002/2003.

### **Volunteers**

Volunteer firefighters constitute the majority of County Fire's staff and are therefore critical to its operation. Management support of the volunteer program is crucial to ensure continued recruitment and retention of motivated personnel. Tasks have been identified to increase communications, refine organizational structure, improve relationships between volunteers and CDF staff, and provide enhanced benefits for volunteers.

The additional costs of achieving the objectives in this section include \$65,000 to initiate the PERS Volunteer Fire Fighters Length of Service Award Program in 2002/2003 and \$9,000 annually thereafter for the PERS program. In 2002/03 \$2,500 will be budgeted for assistance from the County Information Services Department to develop a web site and expand the information distribution system. In 2003/2004 \$500 will be appropriated for the cost of printing a summary of benefits for volunteer fire fighters.

### **Jurisdiction**

The County Fire Department and County Service Area #48 include all Santa Cruz County land except that which is within the boundaries of incorporated cities, established fire districts, or the Pajaro Dunes Fire District (County Service Area #4). County Fire's response area is typically rural, geographically diverse, and sparsely populated. It is anticipated that as development continues in the County Fire district, there will be increased pressure to annex portions of County Fire's jurisdiction to other fire agencies. Effective mutual response agreements exist between County Fire and neighboring agencies.

The objectives in this section require no additional financial appropriations and will be completed by assignment of tasks to existing staff.

### **Facilities**

The distribution of six volunteer fire stations, four year round State/CDF stations and three seasonal State/CDF stations is appropriate to the rural character of County Fire Department's jurisdiction. Facility objectives anticipated for the next five years are directed at providing maintenance and improved record keeping for the stations and providing emergency back up power at the Davenport fire station.

The additional cost of achieving the objectives in this section is included in the 2002/2003 appropriations request and estimated to be \$20,000 for the purchase of a generator to provide emergency power for the Davenport Fire Station.

### **Vehicles and Equipment**

It is anticipated that during the next five years a rescue vehicle currently stationed in Bonny Doon, two utility vehicles, a water tender at Corralitos fire station and a 28-year-old reserve engine will require replacement. The remaining fire engines, water tenders, rescues and utilities are within their recommended service lives and should not need replacement until after year 2007 (upon expiration of certificates of participation issued to finance their purchase). Objectives for the vehicle and equipment programs include tasks to maximize equipment life and improve equipment specification and purchasing process.

The cost of achieving the objectives totals \$448,800, including \$92,000 appropriated in 2001/2002 for the Bonny Doon Rescue, \$6,000 per year to lease a reserve engine from San Mateo County, \$260,000 in 2003/2004 to replace the Corralitos water tender and \$18,200 per year to provide additional funding to improve the vehicle maintenance program.

### **Fire Prevention**

In addition to structural fire protection and first responder emergency medical services, the County Fire Department is responsible for providing public fire safety and prevention education, inspections and plan review services. An efficient program for plan review and schedule of inspections is in place. Recommendations for improvement are focused on expanding the public education program utilizing existing resources.

The objectives recommended in this section will be achieved with existing staff and \$1,000 in additional costs in 2004/2005 to develop a program making operating smoke detectors available to all residential occupancies.

### **Training**

Training is a critical element of fire protection. County Fire faces many significant challenges to the delivery of a successful training program. Many of the firefighters are volunteer and live in remote areas of the County. Volunteers have constraints on their time, and requirements to maintain proficiency and

learn new mandated skills continue to increase. It is difficult and expensive to schedule training in a manner that will accommodate each participant's availability. The commitment necessary to comply

with training requirements has an adverse affect on recruitment and retention of volunteers. In response to these challenges, some changes are recommended within this plan that will improve flexibility and efficiency in training delivery and increase the availability of expanded skills training to interested personnel.

The cost of achieving the objectives in this section includes \$2,000 in 2003/2004 to identify and deliver career development training and an \$18,000 contribution in 2002/2003 to build a live structure fire simulator.

### **Dispatch Services**

In accordance with state requirements, the CDF Emergency Command Center (ECC) in Felton is responsible for dispatching County Fire resources. This arrangement has certain benefits related to command and control of resources and unique CDF ECC capabilities. However, call processing times may be extended because emergency service (911) calls are answered at the Santa Cruz Consolidated Emergency Communications Center (SCCECC) and then relayed to the CDF center upon determination of jurisdiction. Recommendations in this section are primarily directed at ensuring that average total call processing time (from receipt of 911 call to dispatch of resources) does not exceed 2.5 minutes.

The objectives in this section will be achieved by existing staff and resources. Additional costs may be required after the CDF computer aided dispatch system is upgraded.

### **Fire Suppression**

Most of County Fire's jurisdiction is geographically diverse, sparsely populated, and has minimal infrastructure with respect to roads and fire protection water supplies. Because of this, the fire suppression objective is to confine all structure fires to the building of origin with no loss of life. Tasks associated with this objective are directed at maximizing effectiveness of fire crews, improving fire safety for residents, and ensuring compliance with new regulations requiring a minimum of four personnel on scene before firefighters can enter a burning building.

The objectives in this section will require an additional \$290,000 in appropriations over four years to add additional fire fighters to increase staffing from 2 personnel to 3 personnel per engine.

### **Emergency Medical Services**

County Fire provides basic life support (BLS) and defibrillator services throughout its jurisdiction. The Department has evaluated the possibility of providing increased paramedic services, however it was determined that this would require a significant increase in operating funds, organizational structure, and paid staff. Recommended tasks in this section are related to maintaining the BLS program and increasing the availability of defibrillator services.

The objectives in this section will be achieved with existing staff and \$60,000 in 2005/2006 to purchase defibrillators for all response vehicles.

### **Disaster Preparedness**

Santa Cruz County is vulnerable to many kinds of disaster. As a result, County Fire is an active participant in disaster planning, mutual aid, and multi-agency training. Recommended tasks associated with disaster preparedness focus on continued participation in operational planning efforts and mutual aid exercises.

The objectives in this section will be achieved with existing staff and a \$15,000 annual contribution to maintain the regional hazardous materials team.

### Appendices

#### Appendix 1:

Map A: Locations of County Fire Department Stations

Map B: Locations of all fire agency stations in the County.



## FINANCIAL

The annual County Fire budget totals approximately 2.2 million dollars. Departmental expenditures include:

- 63% for contracted services with CDF including staff and operational support,
- 10% for debt service on purchased vehicles (due to expire in 2007),
- 7% for County staff salaries and benefits (.5 street naming clerk and .5 senior departmental administrative analyst), and
- 20% for all other operational needs including turnouts, station maintenance, station utilities, equipment purchases, and training requirements.

The County Fire Department is financed through the Fire Fund which is funded primarily through property taxes and county service area fees. Other sources of revenue include receipts for fire safety plan reviews and reimbursement from parties responsible for incidents to which County Fire responds. The property tax portion of the Department's revenues is governed by limitations imposed in 1978 with the passage of Proposition 13. New construction and the resale of existing properties contribute a slight annual increase to tax revenues. In 1997, after the passage of Proposition 218, the assessments for fire protection services for County Service Area 48 were approved by a majority vote of the property owners including a provision for future increases based on the Consumer Price Index (CPI). The assessment rate for the service area may be increased by the percentage increase in the CPI, All Urban Consumers, for the San Francisco/Oakland Metropolitan Areas, as published by the U.S. Department of Labor for the prior calendar year. Over the last four years CSA fees for a single-family residence have increased from \$83.70 to \$99.76, with annual CSA revenue increasing from \$668,441 to \$803,276.

The County Fire Department budget has provided for a reserve over the last few years. Over the next five years, the reserve will provide funding for necessary replacement of emergency equipment, communication equipment, and safety gear, as well as negotiated increases in the salary and benefit rates for CDF state employees and financing for vehicle replacement when the debt service payments are completed in 2007.

**Goal:** Continue to provide an acceptable level of service by operating the County Fire Department in a cost effective and efficient manner, with great reliance continuing to be placed on volunteers.

**Objective 1:** Identify short- and long-term potential changes that could affect the Department's funding from its traditional sources.

**Task 1:** Compare revenue and cost of service in areas which may be annexed to other fire jurisdictions. \$1,500 will be allocated for maps and assessor's tax reports.

**Responsible:** County Fire Management  
**Complete by:** 2004/2005  
**Cost:** \$1,500

**Objective 2:** Increase revenues from other sources.

**Task 1:** Evaluate potential grant programs and apply for funding where appropriate. \$2,000 will be allocated for grant writing training and extra help staff, if necessary, to assist with grant applications.

**Responsible:** County Fire Management  
**Complete by:** July 2002  
**Cost:** \$2,000

**Task 2:** Review fee schedule for plan check and inspection fees and increase where appropriate.

**Responsible:** County Fire Management  
Fire Prevention & Planning Staff  
**Complete by:** November 2002  
**Cost:** No additional costs

**Task 3:** Explore other options for "fee for service" revenue, e.g. training programs.

**Responsible:** County Fire Management & Training Staff  
**Completed by:** November 2003  
**Cost:** No additional costs

**Objective 3:** Maintain a dedicated fund reserve for emergency funding requirements.

**Task 1:** Determine an appropriate fund reserve based on anticipated changes in revenue and expenditures and potential emergency needs.

<b>Responsible:</b>	County Fire Management
<b>Complete by:</b>	July 2002 and annually
<b>Cost:</b>	TBD

## MANAGEMENT

Santa Cruz County contracts with the California Department of Forestry and Fire Protection (CDF) for the administration of the County Fire Department including operational oversight and supervision of all career and volunteer firefighters. CDF provides administration, access to state resources, training, vehicle and equipment maintenance, purchasing specifications and recommendations, structural maintenance and administration of volunteer firefighter benefits and worker's compensation programs. During the non-wildland fire season months, CDF uses a combination of state and county funding to provide full-time staffing in four state-owned fire stations that would normally be closed.

CDF is responsible for maintaining the Volunteer Handbook which sets forth department policy and procedures. The handbook is an essential tool to ensure good communication and promote teamwork between paid CDF staff and the volunteer firefighters. Ongoing updates to the handbook are required to maintain a cooperative process to operate efficiently and resolve organizational issues.

Improvements in the distribution of information, record keeping and data collection are necessary. This effort is particularly important as it relates to personnel records, training records, vehicle maintenance, facilities documentation, and statistical information. Expansion of effective internal communication methods, such as electronic mail and newsletters is needed.

There has been a significant improvement in administrative services within the agency since the assignment of the half-time departmental administrative analyst. It is recommended that the duties and assignments of this position be reviewed and expanded as needed to meet program requirements.

**Goal:** To provide a coordinated management program in order to effectively serve the needs of the entire County Fire Department.

**Objective 1:** Establish and maintain an effective records management system for each component of the department's operations.

**Task 1:** Expand the existing volunteer handbook into a comprehensive document which contains the rules, regulations, policies and procedures of the Department adopted by the County and enforced by the management staff of the agency.

**Responsible:** County Fire Management,  
Volunteer Company Officers,  
Battalion Chiefs

**Complete by:** September 2002 and annually thereafter

**Cost:** No additional costs

**Task 2:** Develop and improve records management related to training, volunteer benefits, equipment maintenance and replacement, and facilities. \$1,000 will be allocated for software, an electronic label maker and office supplies necessary to improve the department's records management.

**Responsible:** County Fire Management  
**Complete by:** January 2003  
**Cost:** \$1,000

**Objective 2:** Enhance the relationship between the paid and volunteer staff through the organizational structure of County Fire.

**Task 1:** Evaluate the effectiveness of workload assignments and implement improvements that are identified.

**Responsible:** Operations Team  
**Complete by:** July 2003  
**Cost:** No additional costs

**Objective 3:** Provide staff levels necessary to complete management responsibilities.

**Task 1:** Analyze the functions currently performed by the senior departmental analyst as liaison between the County, CDF and the volunteer section of the Department as to the appropriate classification.

**Responsible:** County Fire Management  
County Personnel Department  
**Complete by:** January 2004  
**Cost:** TBD

## VOLUNTEERS

The County Fire Department could not provide an effective level of fire protection and emergency response without volunteer firefighters. The volunteer companies allow for a level of staffing and distribution of fire stations and equipment that could not otherwise be accomplished. Volunteer auxiliary organizations also play a vital role by providing support and funding to the volunteer companies through community events and service.

A good working relationship between the volunteer companies and CDF is essential to the efficient operation of the County Fire Department. Volunteer recruitment and retention support must be a priority in management of the County Fire Department. It is recommended that the department continue to explore and implement ways to increase benefit programs for volunteers.

Each volunteer company is unique and varies according to their location, their membership, and their community. Each volunteer company is represented at a bi-monthly meeting by the Company Officer. As discussed in the Management section, the existing Volunteer Firefighter Handbook should be enhanced in a manner which recognizes the uniqueness of each company but strengthens and clarifies standardized roles and responsibilities of company officers and volunteer firefighters.

**Goal:** To strengthen recruitment and retention of an effective force of volunteer firefighters through improved communications, working relationships, and benefits.

**Objective 1:** Establish and maintain effective communication throughout the Department.

**Task 1:** Expand the existing information distribution system to reach all volunteer personnel using available computer technology, such as web page development. County Fire staff have been and will continue to consult the County Information Services Department in regards to this effort. It is estimated that \$2,500 will be charged by the Information Services Department for their assistance.

**Responsible:** Emergency Communication Center,  
Training,  
County Information Systems Dept  
**Complete by:** July 2002  
**Cost:** \$2,500

**Task 2:** Develop and implement a quarterly newsletter via e-mail that will address matters of interest to fire department personnel.

**Responsible:** County Fire Management  
**Complete by:** January 2003  
**Cost:** No additional costs

**Task 3:** Establish a system for researching and making recommendations on issues that arise at the regular company officers' meetings.

**Responsible:** County Fire Management and Vol Co Officers  
**Complete by:** July 2002  
**Cost:** No additional costs

**Task 4:** Incorporate information on the critical role played by volunteer staff into ongoing training and new CDF employee orientation to ensure that all CDF staff understand and support the role of the volunteer staff.

**Responsible:** Training Staff  
**Complete by:** Spring 2003 & ongoing  
**Cost:** No additional costs

**Objective 2:** Improve the working relationships between the volunteers and CDF managers and line personnel.

**Task 1:** Evaluate the current organizational structure of the department and determine additional areas where volunteers can be included.

**Responsible:** Battalion Chiefs,  
Volunteer Company Officers,  
County Fire Management  
**Complete by:** July 2004  
**Cost:** No additional costs

**Objective 3:** Provide enhanced benefit program options for the volunteers.

**Task 1:** Implement the CalPERS Volunteer Length of Service Award –Retirement Program which provides a retirement stipend based on years of volunteer firefighter service.

**Responsible:** Co Fire Management  
**Complete by:** July 2002  
**Cost:** \$65,000 start-up, approximately \$9,000 annually thereafter

**Task 2:** Establish an incentive benefit for volunteers participating as trainers in the County Fire training program.

**Responsible:** County Fire Management  
**Complete by:** July 2003  
**Cost:** TBD

**Task 3:** Develop and distribute a summary of volunteer benefit programs offered by the Department. The anticipated cost of developing and printing a benefits pamphlet is \$500.

**Responsible:** Training Staff  
County Fire Management  
**Complete by:** July 2003  
**Cost:** \$500

## JURISDICTION

The jurisdiction of the County Fire Department is rural, geographically diverse and has limited effective water systems for fire protection. The service area remains relatively unpopulated and undeveloped and presents a significant challenge in meeting public expectations regarding service levels.

As development occurs and infrastructure conditions improve within the County Fire's jurisdiction, developed areas may be annexed to adjacent fire agencies or form separate service areas in order to pursue a more urban level of service. It is recommended that the department identify possible annexations and develop budgetary contingency plans that minimize overall operational impacts.

**Goal:** Maintain effective fire and emergency response.

**Objective 1:** Maintain appropriate mutual aid agreements and distribution of County Fire resources.

**Task 1:** Review mutual/automatic aid agreements annually and expand where possible to improve level of response by closest appropriate resources.

**Responsible:** County Fire Management and Battalion Chiefs  
**Complete by:** January 2003 and ongoing  
**Cost:** No additional costs

**Objective 2:** Respond to changes in service areas and demographics.

**Task 1:** Establish a procedure to review potential annexations and development projects and their resulting effects on revenues and service demand. Develop contingency plans to maintain appropriate levels of service as needed.

**Responsible:** County Fire Management  
**Complete by:** January 2004  
**Cost:** No additional costs

## FACILITIES

The County Fire Department has an adequate distribution of facilities, given its resources. The four full-time State-owned fire stations are maintained by the State under the County contract with CDF. The volunteer companies maintain the six volunteer stations, with County funding available for repairs and extraordinary maintenance requirements.

Two new replacement fire stations were completed in the year 2000. Bonny Doon Station 34 and Loma Prieta Station 44 provide additional equipment, training and meeting space for County Fire volunteers.

It is recommended that a central filing system for data and records pertaining to County Fire Department properties be developed as well as a program to ensure routine facility inspections and maintenance.

**Goal:** Establish and maintain an effective inventory of facilities to serve the needs of the Department.

**Objective 1:** Ensure that existing facilities are adequately maintained to avoid unnecessary costs and to extend their operational life.

**Task 1:** Establish and implement a program of station maintenance and inspection for every County Fire facility.

**Responsible:** Battalion Chiefs  
**Complete by:** January 2003  
**Cost:** No additional costs

**Task 2:** Identify a facility coordinator for each County Fire facility and establish a committee of facility coordinators to make recommendations on matters relating to facilities maintenance.

**Responsible:** Battalion Chiefs and Vol Company Officers  
**Complete by:** January 2003  
**Cost:** No additional costs

**Objective 2:** Maintain comprehensive records of all County Fire facility sites to include legal descriptions, ownership and/or lease status, maintenance records, capital equipment, planned improvements and all other matters relating to the facility.

**Task 1:** Establish and maintain a complete facility file on each property operated by the Department.

**Responsible:** County Fire Management and office staff  
**Complete by:** July 2003  
**Cost:** No additional costs

**Objective 3:** Provide emergency backup power for all fire stations.

**Task 1:** Install a generator at the Davenport Fire Station.

<b>Responsible:</b>	County Fire Management, Battalion Chiefs & Volunteer Company Officers
<b>Complete by:</b>	June 2003
<b>Cost:</b>	\$20,000

## VEHICLES & EQUIPMENT

The following table shows the current configuration and status of the County Fire vehicle fleet:

APPARATUS	QUANTITY	AVERAGE AGI	SERVICE LIFE*
Fire Engine	12	10 years	20 years
Water Tender	3	9 years	25 years
Rescue/Lt Engine	5	9 years	15 years
Utility Vehicles	5	4 years	10 years

\*Estimate only. True service life is dependent upon use and determined by evaluation of the individual piece of equipment.

With the exception of a 28-year-old reserve engine, none of the fire engine fleet will be due for replacement within the next five years. It will be necessary; however, to replace the Bonny Doon rescue unit and two utility vehicles used by the training and prevention staff. Additionally a larger capacity (2500 gallon) water tender is needed for Corralitos. The existing 1200-gallon water tender will be transferred to reserve status when replaced in 2003/04. A reserve engine is available through a lease with San Mateo County to replace the existing reserve. The vehicle replacement plan is attached as Appendix 7.

The vehicle maintenance staff consists of a state funded equipment manager, two state funded heavy equipment operators, and a county funded heavy equipment mechanic. Most vehicle maintenance is performed at the Felton CDF equipment shop. At times, however, it is necessary to use private vendors to perform specialized repairs or to accommodate spikes in workload that may disrupt the maintenance schedule.

The operating budget for the County Fire fleet maintenance program is approximately \$1,300 per vehicle per year. It accommodates very few special repairs and does not provide for the increased maintenance needs of the fleet as it ages. It is necessary to increase the funding for the program.

County Fire has implemented several equipment replacement plans in recent years. Structural turnout clothing was replaced through a four year plan completed in fiscal year 1998/1999, fire hose is being replaced on a five year schedule begun in fiscal year 1999/2000, defibrillators were upgraded in fiscal year 2000/2001, and new self-contained breathing apparatus were purchased in fiscal year 2001/2002. It is recommended that these replacement plans continue and that additional plans be developed as needed to ensure that County Fire equipment is up to date, serviceable, and effective.

**Goal:** Operate a comprehensive vehicle and equipment program addressing replacement, maintenance and future purchases.

**Objective 1:** Provide equipment necessary to fully address the operational needs of the department.

**Task 1:** Replace the Bonny Doon rescue unit with a new vehicle.

**Responsible:** Equipment Battalion Chief  
**Complete by:** January 2003  
**Cost:** \$92,000 (appropriated 01/02)

**Task 2:** Establish a lease agreement with San Mateo County at a cost of \$6,000 per year to replace the 28-year-old reserve engine currently replacing front-line engines being serviced or repaired.

**Responsible:** County Fire Management  
Equip Battalion Chief  
**Complete by:** January 2003  
**Cost:** \$6,000 per year (\$24,000 for four years)

**Task 3:** Replace the undersized 1200 gallon water tender at Corralitos with a 2500 gallon unit at a cost of \$260,000. Retain the 1200-gallon tender in reserve status.

**Responsible:** County Fire Management  
Equip Battalion Chief  
**Complete by:** June 2004  
**Cost:** \$260,000

**Objective 2:** Develop and implement a plan to ensure maximum effective operational life for all vehicles and equipment in the Department's fleet.

**Task 1:** Increase current vehicle maintenance funding to \$2,000 per vehicle to operate an aggressive preventive maintenance program

**Responsible:** County Fire Management,  
Equipment Battalion Chief  
**Complete by:** July 2002  
**Cost:** \$18,200 per year

**Task 2:** Develop a program that will identify vehicles for replacement based on operational status in addition to time in service.

**Responsible:** County Fire Management,  
Battalion Chiefs,  
Volunteer Company Officers  
**Complete by:** February 2005  
**Cost:** No additional costs

**Task 3:** Standardize a minimum preventive maintenance program to be undertaken by volunteer companies regarding their assigned apparatus.

**Responsible:** Training  
Equipment Battalion Chief  
**Complete by:** January 2004  
**Cost:** No additional costs

**Objective 3:** Ensure that specifications for new vehicles and equipment meet County Fire needs.

**Task 1:** Develop detailed vehicle specifications and procedures for review of any proposal to add a vehicle to the fleet.

**Responsible:** County Fire Management,  
Battalion Chiefs,  
Volunteer Company Officers  
**Complete by:** July 2005  
**Cost:** No additional costs

## **FIRE PREVENTION**

Fire prevention is a top priority of County Fire protection services. In 1995 the Office of the County Fire Marshall was consolidated into the County Fire Department enhancing services to the public and coordination between County Fire, County departments and state and local agencies. Subsequently, through the cooperative agreement with CDF, the County Fire Department gained access to a full time law enforcement/fire investigation staff, further increasing the level of service to the community.

The County Fire Department addresses fire prevention through a number of effective programs and activities:

- Inspections and plan checks as part of the building permit process
- Immediate response to fire hazard complaints
- Public education programs

**Goal:** Provide a comprehensive fire prevention program.

**Objective 1:** Review and expand the existing public education program.

**Task 1:** Formalize a public education plan that identifies audiences, delivery schedules, and information to be presented.

**Responsible:** Fire Prevention Battalion Chief  
**Complete by:** January 2003  
**Cost:** No additional costs

**Task 2:** Identify and train professional staff and interested volunteer personnel to deliver public education programs.

**Responsible:** Fire Prevention Staff  
**Complete by:** January 2004  
**Cost:** TBD

**Task 3:** Develop an evaluation process to monitor the public education programs and identify necessary updates and changes based on current events.

**Responsible:** Fire Prevention Staff  
**Complete by:** July 2004  
**Cost:** No additional costs

**Task 4:** Develop a program to make operating smoke detectors available to all residential occupancies. It is anticipated that \$1,000 will be allocated to purchase smoke detectors for distribution.

**Responsible:** Fire Prevention Staff  
**Complete by:** July 2004  
**Cost:** \$1,000

## TRAINING

An effective training program is critical to a successful fire department, particularly when that Department depends heavily on volunteer personnel. The fire and emergency response service has evolved into a very complex discipline with numerous training and certification requirements imposed by different regulatory entities.

Volunteer personnel are required to complete a minimum of 190 hours of training in their first year and at least 72 hours per year thereafter. Recruitment and retention of volunteers is difficult due to the number of training hours required and economic and demographic factors of Santa Cruz County. Training schedules must be as compatible as possible with the various lifestyles and schedules of the volunteer firefighters.

County Fire has expanded the reimbursable training it provides through Cabrillo College and other outside agencies to increase funding for improved training for County Fire volunteers and paid personnel.

In a cooperative effort with other Santa Cruz County fire agencies, County Fire is installing a live structure fire simulator at the CDF Ben Lomond Youth Conservation Camp. When complete the simulator will provide career and volunteer staff the opportunity to experience interior structure fire conditions in a controlled, non-polluting environment.

**Goal 1:** Ensure that all personnel are provided with sufficient training to carry out their duties and responsibilities and are afforded opportunities to develop skills and abilities beyond the minimum requirements of the department.

**Objective 1:** Develop and implement a program to ensure that all personnel are qualified and capable of performing their duties.

**Task 1:** Evaluate basic skills and operational readiness through drills to ensure proper focus for the training program.

**Responsible:** Training Staff  
**Complete by:** January 2003  
**Cost:** No additional costs

**Task 2:** Participate in a coordinated effort with other Santa Cruz County fire agencies to provide an expanded training schedule to enable volunteers to fulfill training requirements.

**Responsible:** Training Staff, Co Fire Mgt  
**Complete by:** July 2003  
**Cost:** No additional costs

**Task 3:** Maintain accurate records of training received by each individual and operational unit.

**Responsible:** Training Staff  
**Complete by:** July 2002  
**Cost:** No additional costs

**Task 4:** Document the trainings provided or arranged by the training division and the participation of companies and individuals to ensure that all personnel have received appropriate training. Compile findings in an annual report.

**Responsible:** Training Staff  
**Complete by:** October 2002  
**Cost:** No additional costs

**Objective 2:** Provide technical career development training to appropriate personnel on a regular basis.

**Task 1:** Develop and distribute a career development guide based on the needs and desires of department personnel.

**Responsible:** Training Staff  
**Complete by:** July 2004  
**Cost:** No additional costs

**Task 2:** Identify and offer available programs to deliver career development training. It is anticipated that \$2,000 will be allocated for career development instructors.

**Responsible:** Training Staff  
**Complete by:** July 2003  
**Cost:** \$2,000

**Task 3:** Install a live structure fire simulator at the CDF Ben Lomond Youth Conservation Camp. The County Fire Chiefs Association has appropriated \$156,000 for the project. County Fire will contribute approximately \$20,000.

**Responsible:** County Fire Mgt, County Fire Chiefs Assoc  
**Complete by:** January 2003  
**Cost:** \$20,000

## DISPATCH SERVICES

The County Fire Department operates under a shared, two-facility, dispatch system. Calls for service are initially received by the Santa Cruz County Consolidated Emergency Communications Center (SCCCECC) and then transferred to the CDF Emergency Communications Center (ECC) in Felton. This system is necessary because the state requires that CDF dispatchers perform command and control functions within the CDF response system that are not typically performed by the dispatchers at the Consolidated Center. This system of two distinct communication centers can result in logistical problems and extended call processing. Depending on the type of call, SCCECC typically requires one to two minutes for caller interrogation and determination of jurisdiction and resource needs before the request for fire response can be relayed to the CDF Communication Center. It is important to ensure that CDF dispatching is as efficient as possible to minimize combined call-processing time.

The efficiency of the dispatch function is critical to the success of emergency response. It is recommended that specific performance standards be developed and implemented to ensure that the public receives the highest possible level of service.

The current Computer-Aided Dispatch (CAD) system at the CDF Communication Center is unable to produce statistics or other helpful management data. As a result, command center personnel have developed a database program to record and track information such as the number of responses by each station and the types of incidents.

**Goal:** Provide for efficient dispatch of emergency response providers.

**Objective 1:** Streamline the process of receiving, processing and dispatching 911 calls for service to the maximum extent possible.

**Task 1:** Monitor total call processing time from receipt of the 911 call to dispatch of resources and identify and implement operating methods that ensure average total dispatching time does not exceed 2.5 minutes.

**Responsible:** ECC Staff  
**Complete by:** January 2003  
**Cost:** No additional costs

**Task 2:** Participate in the development and selection of a new CDF CAD system.

**Responsible:** ECC Staff and County Fire Mgt  
**Complete by:** July 2005  
**Cost:** TBD

## FIRE SUPPRESSION

The County Fire Department covers a very broad and diverse geographical area which is sparsely populated and provides little infrastructure with regard to access and water supply. Additionally the department depends heavily on the participation of volunteer firefighters to carry out its mission.

The County Fire Department operates with limited revenues and consequently seeks practical, low cost, service delivery programs. Additionally, recent regulations requiring a minimum of four personnel at a structure fire scene before firefighters can enter a burning building have increased the need for innovation and creative solutions to staffing challenges. As part of the solution, County Fire management recommends that career engine staffing be increased from two personnel per engine to three personnel per engine in fiscal year 2002/2003 and thereafter. The increase in staffing will accomplish the following operational objectives:

1. *Quick compliance with the requirement to have a minimum of four personnel on the scene of a structure fire prior to beginning interior attack.* County Fire incidents receive an average response of 1.6 volunteers per call. With three personnel on the career engine, a response of only one volunteer will be sufficient to begin interior attack.
2. *Improved fire engine crew safety and effectiveness.* Three person staffing allows for two firefighters to operate a fire hose or attend to a patient while leaving the company officer free to supervise the scene, coordinate with other agencies, and watch for unsafe conditions.
3. *Compliance with the Santa Cruz County fire services mutual aid plan.* The fire services mutual aid policy requires that fire engines responding to mutual aid requests be staffed with a minimum of three personnel. County Fire is a frequent user of mutual aid; it is important that the department be capable of providing mutual aid in return.

The increased staffing will be accomplished by reducing the number of fire apparatus engineers in the CDF agreement from eleven to six and adding ten firefighters. The projected increase in costs over two person staffing are as follows:

FY 2002/2003	\$100,000
FY 2003/3004	\$100,000
FY 2004/2005	\$ 55,000
FY 2005/2006	\$ 35,000

The cost rate decreases because under the current employees' agreement, firefighters will receive significantly lower salary and benefit increases when compared with fire apparatus engineers.

Providing reliable and effective fire suppression and emergency response service is dependent upon response time (defined as the time between receipt of call and arrival on scene) and the capability of the response complement. In an effort to reduce response time, the County Fire Department has developed

and implemented automatic response agreements with neighboring agencies to ensure that the closest appropriate resources are sent to incidents. Automatic response from the nearest available responder, regardless of jurisdiction, is a critical element of service delivery for the County.

The following chart shows types and frequency of County Fire Department responses for calendar year 2000.

<b>INCIDENT TYPE-Response</b>	<b># of Incidents</b>
Structure Fire	148
Fire (wildland, vehicle, refuse, etc.)	422
Medical	1,166
Fire Menace Standby (power lines, hazmat, fuel spill, etc.)	139
Public Assist (vehicle lockouts, flooding, etc.)	104
<b>TOTAL</b>	<b>1,979</b>

**Goal:** Provide a high level of structural fire suppression services within the resources available to the department.

**Objective 1:** Contain all structure fires to the building of origin with no loss of life.

**Task 1:** Evaluate the structural fire liability within the jurisdiction of the County Fire Department and develop and maintain specific strategic plans for those locations that pose a particular or unusual operational problem for the Department’s fire suppression efforts.

**Responsible:** County Fire Management and Battalion Chiefs  
**Complete by:** July 2003  
**Cost:** No additional costs

**Task 2:** Ensure that all fire suppression personnel are trained in the elements of specific fire suppression plans developed to address unusual circumstances.

**Responsible:** Operations and Training Staff  
**Complete by:** July 2004  
**Cost:** No additional costs

**Task 3:** Increase staffing on the four career engines from two personnel to three personnel to comply with OSHA “two in two out” regulations.

**Responsible:** County Fire Mgt  
**Complete by:** July 2002  
**Cost:** \$260,000 over four years

## EMERGENCY MEDICAL SERVICES

County Fire provides basic life support (BLS) and defibrillator services throughout its jurisdiction. Paid and volunteer staff are trained to a minimum level of Emergency Medical Services First Responder, and over 50% of the personnel are certified Emergency Medical Technicians (EMT I). In fiscal year 2000/2001, County Fire upgraded its defibrillator equipment, and plans are being developed to increase the level of EMS certification for the majority of personnel to EMT I.

Some fire jurisdictions within the County have adopted fire engine based advanced life support (ALS - paramedic) programs to augment services from the ambulance provider. The provision of paramedic services are an option for County Fire, but preliminary staff review indicates that adopting such a program would require a significant increase in staffing, training, and operational funding. The training levels necessary to implement and maintain an ALS program are beyond the scope of the current departmental staffing arrangement. Providing paramedic services from the four stations currently staffed by CDF (Corralitos, Burrell, Saratoga Summit, and Big Creek) would require the addition of a minimum of twenty-one full-time personnel as well as thousands of dollars in operating funds.

**Goal:** Provide a high level of pre-hospital emergency medical services.

**Objective 1:** Ensure that all responding personnel are trained and certified to deliver emergency medical services at a level consistent with County and State minimum requirements.

**Task 1:** Equip all primary CDF/County FD response vehicles with appropriate defibrillators and ensure that all-primary response personnel within the CDF/County FD system are trained and certified to operate them. It is anticipated that \$60,000 will be needed to purchase the defibrillators.

**Responsible:** County Fire Mgt  
**Complete by:** June 2006  
**Cost:** \$60,000

**Task 2:** Evaluate implementing an enhanced Emergency Medical Technician level of certification among responding personnel.

**Responsible:** County Fire Mgt and Training  
**Complete by:** June 2006  
**Cost:** No additional funds

## DISASTER PREPAREDNESS

The County Fire Department, like other fire agencies in the County and elsewhere, are “first response” organizations. As part of its mission, the department maintains a capability to respond to incidents independently or in concert with multiple agencies and jurisdictions.

Enacted after the 1991 Oakland-Berkeley Hills conflagration, all local agencies participating in emergency response and recovery operations are required to follow and implement the Standardized Emergency Management System (SEMS). The department’s current plan for disaster response complies with this new law and its guidelines.

As a member of the Santa Cruz County Fire Chiefs Association, the County Fire Department participates in the Operations Group to work on issues related to mutual aid, standardized fire service training, and standardized operations. The Operations Group also advises the County Fire Chiefs Association and the Area Fire Coordinator regarding disaster planning and preparedness. The Area Fire Coordinator is selected annually by the County Fire Chiefs Association although historically the role has been filled by the County Fire Chief. The Area Fire Coordinator represents the fire services at the County Emergency Operations Center (EOC) whenever it is fully activated.

It is necessary that the Department continue to incorporate current information and directives from state and federal authorities regarding non-fire emergency response requirements, such as crisis and consequence management, into its planning and training programs.

Historically, County Fire and all other fire jurisdictions in Santa Cruz County have relied upon the Watsonville Fire Department and Scotts Valley Fire Protection District Hazardous Material Teams to augment first responder operational level response to hazardous material incidents. Recently, due to loss of funding, Watsonville Fire Department has decided to no longer assist with hazardous materials incidents on a countywide basis. As a result, the Santa Cruz County Fire Chiefs Association is reviewing the response to hazardous material incidents throughout the County and developing new plans and strategies to deal with such issues. It is recommended that County Fire continue to participate in this planning process and support solutions that maintain response capability.

**Goal:** Ensure that the Department’s abilities to respond to major emergencies and disasters are maintained at an effective level.

**Objective 1:** Participate in the annual seminar on disaster operations and tactical procedures for all fire service personnel.

**Task 1:** Revise the training curriculum to reflect lessons learned and information updates.

**Responsible:** Division Chief and Training Staff

**Complete by:** January 2003 and ongoing

**Cost:** No additional costs

**Objective 2:** Participate in an annual, or preferably more frequent, multi-fire agency disaster drill involving tactical units.

**Task 1:** Revise the training curriculum to reflect lessons learned and information updates.

**Responsible:** County Fire Management and Battalion Chiefs  
**Complete by:** January 2003 and ongoing  
**Cost:** TBD

**Objective 3:** Participate in an annual, or preferably more frequent, multi-fire agency disaster drill consisting of command and support functions only.

**Task 1:** Participate in table-top exercises held for command and support functions and revise the training curriculum to reflect lessons learned and updated information.

**Responsible:** Division Chief and Battalion Chiefs  
**Complete by:** July 2002 and ongoing  
**Cost:** No additional costs

**Objective 4:** Include recent non-fire emergency response requirements (e.g., crisis and consequence management) into the department's plans and training.

**Task 1:** Obtain, review and determine how best to incorporate such information into current plans, programs, and training.

**Responsible:** Division Chief and Battalion Chiefs  
**Complete by:** July 2002 and ongoing  
**Cost:** No additional costs

**Objective 5:** Ensure law enforcement and other applicable public safety agencies are afforded the opportunity to participate in fire/rescue mutual aid training as necessary.

**Task 1:** Include other public safety agencies in the planning process for mutual aid exercises.

**Responsible:** County Fire Management  
**Complete by:** July 2002 and ongoing  
**Cost:** No additional costs

**Objective 6:** Ensure that fire department access to specialized HAZMAT response resources is maintained.

**Task 1:** Work with Scotts Valley Fire Department to develop a regional HAZMAT team. It is anticipated that \$15,000 may be allocated to the development and maintenance of such a response.

<b>Responsible:</b>	County Fire Mgt
<b>Complete by:</b>	July 2002
<b>Cost:</b>	\$15,000 annual