

# Emergency Preparedness

## Background

Santa Cruz County has had more than its share of government declared disasters, 17 in the last 25 years. It's likely another will occur sometime soon. Now, in addition to natural disasters, we are warned of impending disasters such as bioterrorism. Our country has been at the second highest threat alert level several times this year. The Grand Jury's goal in this report was to assess whether county agencies are adequately prepared to manage health and safety issues resulting from a disaster.

Emergency preparedness in Santa Cruz County has emerged from earlier Civil Defense programs. It has expanded to include the following disasters: earthquakes, fires, floods, tsunamis, bioterrorism, convergent refugees (people fleeing a disaster from other counties), civil unrest, hazardous materials (HAZMAT) and other large scale life-threatening situations.

## Scope

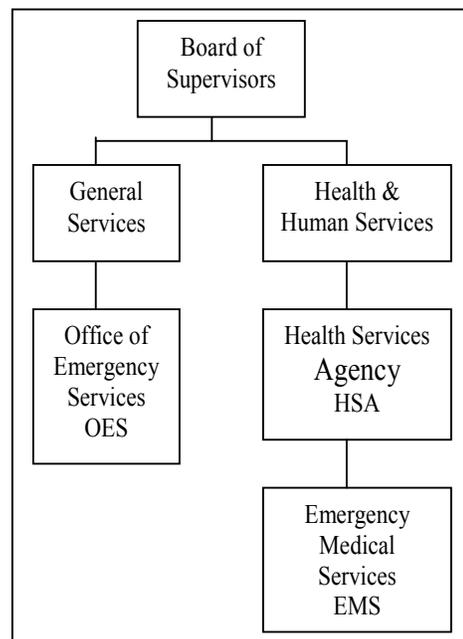
The purpose of this study is to assess preparedness of Santa Cruz County health and human services agencies in the event of a disaster. Many agencies and groups must collaborate to provide a swift, coordinated disaster response. Volunteer organizations are critical to the success of county programs but are not within the county's jurisdiction. The Grand Jury includes volunteer organizations in this study and refers to their roles without making recommendations to them.

In this study, the Grand Jury evaluated the adequacy of current emergency plans, evaluated the Command Post, and assessed communication and the availability of medical resources. Other issues included: staffing, volunteer programs, and programs to warn the public that rescue from outside the county and evacuation from the county may be unavailable for up to 72 hours.

The following entities are included in this review: the Santa Cruz County Office of Emergency Services (OES) Health Services Agency (HSA), Emergency Medical Services (EMS), and the County Board of Supervisors.

## Glossary of Emergency Organization Roles:

County emergency agencies receive some funding and direction from state and federal entities including the



United States Department of Justice, Federal Emergency Management Agency (FEMA), and the Department of Homeland Security “Homeland Security”. OES must comply with state and federal guidelines. Homeland Security issues warnings and planning requests. OES is the liaison between government agencies in disaster relief efforts.

Once the President declares a disaster, FEMA mobilizes resources for recovery efforts in the area. FEMA then makes aid directly available to the public through a variety of federally funded programs.

During an emergency, operations are coordinated at the Command Post located at De Laveaga Park. When activated, the Command Post is staffed by the County Administrative Officer who serves as Director of Emergency Services, the Emergency Services Administrator serves as a Coordinator, a designated staff person from the County Administrative Office serves as a Public Information Officer, County Counsel serves as a Legal Officer and Risk Management provides a staff person who serves as a Safety Officer. EMS also responds to disasters at the Command Post. The EMS Emergency Coordinator reports to the Emergency Services Administrator. Additionally, a Santa Cruz Chapter Red Cross (Red Cross) representative and the Radio Amateur Civil Emergency Services (RACES) Officer have Command Post seats.

### ***County Organizations:***

**The Office of Emergency Services** is responsible for emergency planning and preparation for Santa Cruz County. OES assesses risks from disasters and develops operational contingency plans to address them. OES was created in 1980 and is currently co-located with the 911 emergency call center and the Command Post. This facility opened in 1996.

**The Emergency Management Council (Disaster Council)**, following State guidelines, recommends emergency policy to the County Board of Supervisors. OES provides staff to the Emergency Management Council. Red Cross is a member of the Emergency Management Council along with the Radio Amateur Civil Emergency Services (RACES) Officer.

**Emergency Medical Services** manages pre-hospital emergency services such as Basic Life Support and Advanced Life Support. Basic Life Support care includes stabilizing a patient and transport to the hospital. Staff may do airway management or defibrillation. Advanced Life Support paramedics can also intubate, and administer emergency cardiac drugs.

**The Disaster Designated Medical Facilities** supply additional medical care in an emergency. There are currently 14 facilities located throughout the county.

### ***Volunteer Organizations:***

**Community groups** were originally formed to provide self-help when storms closed Highways 9 and 17 because county rescue operations were unable to locate people in need of rescue. Neighborhood coordinators work with radio operators, fire departments, schools, Red Cross and others to manage rescue information.

**The Disaster Service Workers Program** is comprised of trained volunteers, many with medical training, who enroll prior to an event and must take a loyalty oath.

The **Community Emergency Response Team (CERT)** concept was developed and implemented by the Los Angeles Fire Department in 1985. The Whittier Narrows earthquake in 1987 underscored the threat of a major disaster in California and confirmed the need for training civilians to meet their local neighborhood's needs. The CERT program covers skills needed when emergency services are not immediately available.

**Red Cross Disaster Services** focuses on meeting people's immediate emergency needs. In a disaster, the Red Cross provides shelter, food, and health services. Red Cross serves all of Santa Cruz County from around Pescadero to Aromas and into the Santa Cruz mountains.

**Amateur Radio Clubs** Amateur Radio Emergency Services (ARES) and Radio Amateur Civil Emergency Services (RACES) both provide emergency communication during a disaster. The Federal Communications Commission (FCC) licenses radio operators and mandates emergency communication by radio operators. RACES originated as part of Civil Defense. ARES provides support to volunteer organizations.

## **Fieldwork**

The Grand Jury undertook the following fieldwork:

- a. Interviewed the Watsonville hospital Emergency Services Director and toured the hospital
- a. Attended a meeting of the Emergency Management Council
- b. Observed an annual disaster drill from the Command Post at Emergency Services
- c. Interviewed the staff at Emergency Services
- d. Interviewed the staff of Emergency Medical Services at the Health Services Agency
- e. Interviewed the Director of Disaster Services at Santa Cruz Red Cross
- f. Interviewed the Emergency Services Administrator, Santa Cruz County Office of Emergency Services
- g. Attended a Mountain Community Resources Meeting – San Lorenzo Valley Community Group
- h. Interviewed the RACES Officer

Additional Sources:

- County of Santa Cruz Health Services Agency's Bioterrorism Preparedness and Response - Bioterrorism resources from the CDC Web site: <http://www.bt.cdc.gov/>
- FEMA CERT program Web site: <http://training.fema.gov/EMIWeb/cert/overview.asp>
- 911 SCCECC Communications Center Web site: <http://www.sccecc.org/>
- Aptos/La Selva Fire District CERT Web site: [www.aptosfire.com/cert.html](http://www.aptosfire.com/cert.html)
- Aptos Times article "Community Emergency Response Team" Jan. 1, 2003
- Red Cross Web site: <http://www.sccredcross.org/>
- Office of Emergency Services Web site: <http://scCounty01.co.santa-cruz.ca.us/oes/oesmain1.htm>
- County of Santa Cruz Emergency Management Plan, April 2002

- Santa Cruz Emergency Medical Services Web site:  
<http://www.santacruzhealth.org/phealth/ems/3ems.htm>
- Health Services Agency Web site: <http://www.santacruzhealth.org/>

## **Findings**

1. A threat assessment was recently completed by OES using a Department of Justice grant. The assessment found that although there are not many attractive terrorist targets in Santa Cruz County, there are plenty of potential natural disasters. Monterey has possible targets but none compare to San Jose, San Francisco or Los Angeles. Potential convergent refugees fleeing from emergencies outside the county—along with hazards that might come into the county such as radiation—are issues that require planning.

### **Response: Santa Cruz County Board of Supervisors AGREES**

2. Escape from a disaster is hindered by traffic. At capacity, only 1800 cars per hour per lane can travel on Highway 1. The population of Santa Cruz County as reported in the 2000 census was 255,602. Residents alone have 227,345 cars. Imagine the nightmare if everyone tried to leave a crowded location at the same time. (Santa Cruz County Transportation Commission) (2000 U.S. Census)

### **Response: Santa Cruz County Board of Supervisors AGREES**

3. The County HSA is responding to medical issues specific to bioterrorism. A coordinated response will be conducted with fire, police, health care providers and other public agencies. Surveillance is being expanded to detect unusual or suspicious disease occurrences. Information about unusual diseases that might be the result of a bioterrorist attack is being distributed to emergency rooms and to medical personnel in the county. (cdc Web site)

### **Response: Santa Cruz County Board of Supervisors AGREES**

4. The Command Post is in an isolated location but must get information quickly about county issues. An aerial view of a disaster site using a Civil Air Patrol plane, Coast Guard helicopter, a Fire Services plane, or a helicopter volunteered by a local citizen, would help in developing an appropriate plan. Currently, there is no way to transmit an aerial view to the command Post.

### **Response: Santa Cruz County Board of Supervisors PARTIALLY AGREES**

*Aerial information is a valuable tool in the coordination and management of emergency events. We have recently developed and are in the process of implementing an aerial reconnaissance capability with the Civil Air Patrol where digital images can be radioed directly to the Emergency Operations Center.*

5. The Grand Jury observed that many computers at the Command Post were non-functional during the annual disaster drill. Since our visit, newer computers with maintenance contracts arrived at the Command Post.

**Response: Santa Cruz County Board of Supervisors AGREES**

*All computers in the Emergency Operations Center have now been upgraded.*

6. EMS would like access to information when at the Command Post. For instance, the California Highway Patrol's (CHP) website may indicate calls for road closures. Hospitals need this information if a patient must be transported over the hill to a trauma center and Highway 17 is closed. A new software system is needed so that this type of information can be quickly and easily distributed to the Command Post.

**Response: Santa Cruz County Board of Supervisors AGREES**

7. In a localized emergency, Santa Cruz County can get outside help. However, if a disaster affects a larger area, county residents will be on our own for some time. In any case, parts of Santa Cruz County are isolated and terrain restricts access. Supplies and resources will go to larger metropolitan areas first. It is impossible to cache all of the supplies and equipment needed in the event of a major disaster.

**Response: Santa Cruz County Board of Supervisors AGREES**

8. An emergency may require an urgent need for medication. There is no cache of emergency medications including antibiotics in the county as hospitals and pharmacies obtain them as needed. A medication cache requires rotation of stock before expiration dates.

**Response: Santa Cruz County Board of Supervisors AGREES**

9. With only two emergency hospitals in the county, staff, resources and beds are inadequate to deal with a disaster. In an emergency, Disaster Designated Medical Facilities supply medical care for patients with minor injuries to prevent overloading hospital emergency rooms. Disaster Dedicated Medical Facilities are asked to have materials on hand to care for 50 patients for three days; however, they have not made that financial commitment.

**Response: Santa Cruz County Board of Supervisors AGREES**

10. Homeland Security has given two small grants for first responders, administered by OES. Local officials identify the emergency needs of the community and request support from both the state and the federal government. FEMA is a funding contributor but the State OES, and the County OES, coordinate local disaster relief efforts. (OES Web site) (Emergency Management Plan)

**Response: Santa Cruz County Board of Supervisors PARTIALLY AGREES**

*County OES is currently managing seven grants related to Homeland Security totaling over \$1.3 million, with additional grants anticipated in the 2004 Federal fiscal year.*

11. Budget cuts are expected to hurt. General Services is going through a horrific budget process right now. The Grand Jury heard that budgets are likely to be smaller—probably countywide. EMS has some state funding but most funding is from the county. EMS applies for grants when possible and recently received a trauma grant. When staff is out on vacation or due to illness, work must be delegated to the department head, as there is no staff relief.

**Response: Santa Cruz County Board of Supervisors AGREES**

12. Most of the money for emergency services after 9/11 has been for equipment and training, not staffing. Approximately \$8000 has come to the county for a CERT program. The administrative cost to set up the program was about \$800, which was spent on the first meeting.

**Response: Santa Cruz County Board of Supervisors AGREES**

13. Emergency planning staff is limited. Each county in California has the same disaster planning requirements, regardless of size. Large counties with more staff have less trouble fulfilling state mandated activities. Santa Cruz County, the second smallest county geographically in the state, has fewer staff. OES and Emergency Services each have a staff of three, comprised of a manager plus two staff. According to staff, this is inadequate.

**Response: Santa Cruz County Board of Supervisors PARTIALLY AGREES**

*The County agrees with this finding in terms of the number of positions, but does not believe that this staffing level is inadequate.*

14. Currently, there are small Homeland Security grants to be administrated by OES. Writing proposals and administration of the grants is time consuming. Although 80% of new issues involve homeland security, there is no new staff.

**Response: Santa Cruz County Board of Supervisors AGREES**

15. Civilians can be recruited and trained as CERT teams that, in essence, will be auxiliary responders. CERT teams can provide immediate assistance to victims in their area, organize spontaneous volunteers who have not had training, and collect disaster intelligence that will assist professional responders with prioritization and allocation of resources following a disaster. Training was made available nationally by FEMA in 1993. A new FEMA grant is earmarked for a Santa Cruz area CERT program. (FEMA CERT Web site)

**Response: Santa Cruz County Board of Supervisors AGREES**

16. Aptos/La Selva Beach Fire District is currently recruiting and training CERT volunteers to safely help themselves, and their neighbors in an emergency. Training topics include: disaster fire suppression, hazardous materials, disaster medical operations, light search and rescue operations, disaster psychology and team organization. A new CERT program is also forming in San Lorenzo Valley. (Aptos Fire Web site)

**Response: Santa Cruz County Board of Supervisors AGREES**

17. The Disaster Service Workers Program insurance funding has been recently reinstated in the State budget. During a disaster, trained volunteers are authorized to work under a declared state of emergency. EMS has a list of skilled people they can call upon to do medical work. RACES members also qualify as Disaster Service Workers.

**Response: Santa Cruz County Board of Supervisors AGREES**

18. Santa Cruz Red Cross receives no money from the American Red Cross or from federal agencies such as FEMA or Homeland Security. Funding from United Way is only available through the next 18 months due to a change that allows payment for fixed shelters only. Although some materials come from the American Red Cross, Santa Cruz Red Cross must do local fundraising to make up for the lack of federal funding.

**Response: Santa Cruz County Board of Supervisors**

*The County has no jurisdiction over the Red Cross and defers to that agency to respond to this finding.*

19. Red Cross Disaster Services provides shelter and food to disaster victims, supplementing the county's mobile canteen services and offering shelter for 100-1000 people. Red Cross sheltered 1700 people at the Santa Cruz County Fairgrounds after the 1989 Loma Prieta earthquake. Emergency supplies in moveable containers are located throughout the county such as at the airport, and fire stations. Some of the sixty-seven local nurses who volunteer with Red Cross work on pandemic\* and other disasters.

**Response: Santa Cruz County Board of Supervisors**

*The County has no jurisdiction over the Red Cross and defers to that agency to respond to this finding.*

20. Red Cross conducts town hall meetings and provides speakers and training to neighborhood groups. Topics include sheltering in place\*\*\*, disaster and pets, seniors, disabled, and HAZMAT. Red Cross conducts disaster training using volunteer trainers at community colleges. Red Cross also conducts shelter drills and is working on a disaster compliance plan.

**Response: Santa Cruz County Board of Supervisors**

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\* such as the 1918 Influenza pandemic that killed 20 million people

\*\*\* stay where you are

*The County has no jurisdiction over the Red Cross and defers to that agency to respond to this finding.*

21. Funding and project coordination of community groups are tied to a number of entities. For example, community group neighbors are working with a FEMA grant to raise the elevation of their houses to be above flood levels.

**Response: Santa Cruz County Board of Supervisors AGREES**

22. OES is interested in establishing and working with more community groups. OES and Red Cross will help train community groups interested in mobilizing their own disaster planning efforts. Community groups help fill some gaps of OES functions in planning and relief efforts. They also provide needed eyes in the field for information flow.

**Response: Santa Cruz County Board of Supervisors AGREES**

23. Consistent and accurate information will reduce public panic and rumors. To address this issue, EMS is preparing fact sheets on how to manage specific emergency situations such as; shelter in place, food and water safety and hygiene, and others regarding power outages and evacuations tips. Currently information can be sent to the media, read over phone, or put in libraries.

**Response: Santa Cruz County Board of Supervisors AGREES**

24. Recently, the phone company agreed to reinstate the basic first aid page in the phone book. However, it is currently somewhat hard to find and incomplete.

**Response: Santa Cruz County Board of Supervisors AGREES**

*The County agrees with the finding that the information has been reinstated and appreciates the phone company's partnership.*

## **Conclusions**

1. The county should plan for the most likely emergencies. The most urgent issue may be the potential for convergent refugees fleeing from a disaster outside the county. Money from Homeland Security would help county agencies achieve a greater level of preparedness.
2. Overall county emergency planning is good. However because of the potential number of different types and variations of disasters the county cannot plan for every possible emergency.
3. Digital cameras for use in the field by aircraft could transmit emergency information to the Command Post.

4. The facility and hardware at the Command Post are now adequate but communication software is poor. Communications software is needed to support shared information. A portable system would allow access from the primary site and remote locations.
5. A centralized cache of emergency medications is needed to supply medical facilities.
6. Staffing at OES is inadequate to handle an increasing workload. The time constraint of fulfilling the grant process may negatively impact staff needs in other areas. For example, staff needs have increased with heightened alerts and the recent HAZMAT concern.
7. A federal grant for CERT volunteer training is needed.
8. Additional support from government agencies is needed for volunteer programs such as Disaster Service Workers, RACES, and Red Cross.
9. Programs that support and encourage volunteers, such as community groups, should be pursued.
10. EMS needs to improve public awareness that residents will probably be “on their own” until outside help is received. People need to have enough medication available before the need arises. Information should be distributed through the following methods:
  - Post fact sheets on web site.
  - Send fact sheet inserts with PG&E bills.
  - Distribute fact sheets to students at schools.
11. The emergency information page in the phone book needs to be revised for easy access and provide emergency instructions for home or work, including advice on keeping a supply of medication.

## **Recommendations**

1. OES should acquire digital cameras for the Command Post for use in the field with a wireless method of transmitting the images.

### **Response: Santa Cruz County Board of Supervisors**

*This recommendation has been implemented. Digital cameras have been acquired with grant funds and a method of transmitting digital images from the field directly to the Emergency Operations Center has been developed, tested and is projected to be fully implemented by the end of calendar year 2003.*

2. OES should purchase communications software for the Command Post that will function during emergency situations and facilitate information access and sharing.

**Response: Santa Cruz County Board of Supervisors**

*This recommendation will be implemented. While “communications” software is not a priority need, OES is in the process of acquiring incident management software for the Emergency Operations Center through Homeland Security Grant funding. As well, these grants will provide funds for acquisition of the same software in each of the city’s Emergency Operations Centers, County Fire’s Emergency Communications Center, as well as the Sheriff’s Office and City of Santa Cruz incident command vehicles to allow all emergency management team members a vastly improved ability to share and manage real-time information and resources. Acquisition, installation and training is scheduled to be completed by the end of calendar year 2003.*

3. EMS should establish a local supply of enough emergency medications to last for at least three days to be kept at a central location. Stock should be rotated as needed.

**Response: Santa Cruz County Board of Supervisors**

*This recommendation is being implemented. HSA maintains an inventory of selected medications held by local pharmacies. This inventory shows very limited supplies of agents that might be needed in a disaster or bioterrorist event.*

*The Strategic National Stockpile (SNS) is maintained at regional sites in the nation, and should be available within 24 hours to our county for a bioterrorist or disaster event. The county's All-hazards Response Plan includes procedures to access the SNS.*

*HSA, through its EMS/Homeland Security funding and in consultation with the Emergency Medical Care Commission and our ambulance partner, AMR-West, is establishing a cache of equipment and medical supplies, including selected emergency medications, in support of our rapid response capability. Numerous items already have been ordered from the current HSG grant. HSA, with continued grant support, will work with adjacent counties and local medical institutions to identify and build up a supply of critical medications, and to rotate the stock in a timely manner to prevent expiration and wastage. This plan is a deliverable within our Bioterrorism Response Plan.*

4. OES should add staff to write grant proposals and implement grants. OES should possibly share this staff with EMS. EMS should, at a minimum, maintain staffing.

**Response: Santa Cruz County Board of Supervisors**

*This recommendation will be considered as part of the 2004-05 budget hearings. It may be that additional staff is needed, but the County is currently unable to finance the cost to add staff since existing grant funds are very restrictive on providing funding for staff resources and County financial resources are extremely limited.*

*Emergency Medical Services program staff focuses specifically on oversight of the emergency medical response infrastructure in the County. Sharing the staff would not be*

*effective since the EMS mission is significantly different from that of the Office of Emergency Services.*

5. The county should obtain funding from FEMA for CERT training programs.

**Response: Santa Cruz County Board of Supervisors**

*This recommendation has been implemented. The Office of Emergency Services has recently been awarded a CERT grant from the Governor's Office which is in final contract review. The grant agreement will be recommended to the Board of Supervisors in September. OES has also transmitted a Notice of Intent to submit an application for 2003 CERT grant funds. Grant application packages are scheduled to be delivered to OES in September.*

6. The Board of Supervisors should encourage formation and success of community groups by providing lists, training opportunities and information about properties from the county Assessor's Office and parcel maps.

**Response: Santa Cruz County Board of Supervisors**

*This recommendation has been implemented. The County fully supports development and involvement of community groups in emergency planning activities. The Office of Emergency Services and its partner agencies make every effort to provide these groups with applicable information in support of their efforts.*

7. EMS should develop a public awareness campaign with a broader distribution of information to prepare citizens to be self-sufficient for at least seventy-two hours. Information should be circulated as outlined in conclusion 10, including working with the telephone company to improve emergency information and utility companies to mail emergency information inserts.

**Response: Santa Cruz County Board of Supervisors**

*This recommendation is being implemented. Focus Area F under the Federal Bioterrorism Planning Grant process stipulates numerous deliverables related to Public Information and Communication in disaster situations. A statewide process is under development, in part through new centers established at UCLA and UC-Berkeley, to help local agencies address this requirement. Print, radio, television and advertising vehicles are being expanded to quickly alert the public to safety and public health issues.*

*Our County, in partnership with the Santa Cruz Sentinel, will be preparing a newspaper insert for delivery to all households in the county that will contain the types of information called for in this recommendation. Fact Sheets including Food and Water Safety, Evacuation, and Shelter in Place are available and can be quickly reproduced and distributed, depending on the nature of the disaster and the self-help modalities that will be most effective. Video productions are being developed at national and state levels to aid in public education via television in the event of a terrorist or natural disaster.*

*Resource materials are available now on federal, state and local websites for individual residents to access and these can also be adapted for mass distribution as flyers. A community TV broadcast is being developed in September to further educate the public.*

*With scores of possible scenarios for natural disasters as well as chemical, biological, radiological and blast attacks by terrorists, it is not possible to provide specific guidance for every possibility. However, resource materials are being developed at multiple levels of government that can be disseminated quickly for the most likely events.*

*The First Aid and Survival Guide in the SBC Smart YELLOW Pages (B1 - B6) represents six pages of excellent, though limited, information. The Bioterrorism Preparedness Plan will address the Grand Jury recommendations to enhance this and other methods of educating and informing the public about supplies and medications to have on-hand in emergencies.*

**Responses Required**

<b>Entity</b>	<b>Findings</b>	<b>Recommendations</b>	<b>Respond Within</b>
Santa Cruz County Board of Supervisors	15-21	5, 6	60 Days (Sept. 2, 2003)
Santa Cruz County Office of Emergency Services	1, 2, 4, 5 7, 10, 12- 14, 22	1, 2, 4	90 Days (Sept. 30, 2003)
Santa Cruz County Emergency Medical Services	3, 6, 8, 9, 11, 13, 23, 24	3, 7	90 Days (Sept. 30, 2003)

**Note: Santa Cruz County Board of Supervisors responded for Santa Cruz County Office of Emergency Services and Santa Cruz County Emergency Medical Services.**