



**NAPA COUNTY  
GRAND JURY**

**2007-2008**

**Final Reports on**

**NAPA COUNTY EMERGENCY  
COMMUNICATIONS**

**NAPA COUNTY OFFICE OF  
EMERGENCY SERVICES**

**NAPA COUNTY**

**EMERGENCY**

**COMMUNICATIONS**

# TABLE OF CONTENTS

1. Letter to Presiding Judges	
2. Letter to the Citizens of Napa County	
3. Emergency Communications	
a) Summary	1
b) Background	2
c) Methodology	2
d) Discussion	3
General	3
Physical Communications Facilities	3
Public Safety Radio System	3
Public Notification System	4
Regional Communications Interface	5
Procedural Issues, 911 Call Routing (VoIP)	5
Background	5
Caller Identification (Caller ID)	6
Public Safety Answering Point (PSAP)	6
Landline	7
Wireless	7
Voice over Internet Protocol (VoIP)	8
Medical and Fire Emergencies	9
City of Napa Police Department Central Dispatch	9
CAL FIRE Emergency Command Center (ECC)	10
City of Calistoga PSAP	11
Quality Assurance/Quality Control	12
Consolidated Napa County PSAP	13
4. Commendation	14
5. Findings	14
6. Recommendations	15
7. Request for Responses	15
8. Glossary	15
9. Appendix	16



**NAPA COUNTY GRAND JURY**  
**P.O. BOX 5397**  
**NAPA, CALIFORNIA 94581**

April 28, 2008

The Honorable Francisca P. Tisher  
The Honorable Raymond A. Guadagni  
Presiding Judges 2007/2008  
Superior Court of the State Of California  
County of Napa  
825 Brown Street  
Napa, CA 94559

Dear Judges Tisher and Guadagni,

Pursuant to Section 933(a) of the California Penal Code, the 2007-2008 Napa County Grand Jury submits to you its Final Report on the Napa County Emergency Communications. Our investigation of the Napa County Emergency Communications was conducted in a manner consistent with the California Penal Code, this Court's Charge, and the historic role of the Grand Jury – to protect the interests of the citizens of Napa County.

This is the sixth in a series of final reports we will be issuing before our term ends. I would like to acknowledge the hard work and dedication of the Grand Jury which our reports reflect. It is a privilege and a pleasure to work with them.

Respectfully submitted,

A handwritten signature in black ink, appearing to read "William E. Trautman".

William E. Trautman  
Foreperson  
2007-2008 Napa County Grand Jury



## **NAPA COUNTY GRAND JURY**

**P.O. BOX 5397**

**NAPA, CALIFORNIA 94581**

To the Citizens of Napa County:

The 2007-2008 Napa County Grand Jury is engaged in several comprehensive investigations of various governmental agencies in Napa County in exercise of its duty under California law. We will issue a series of final reports on these investigations before the end of our term, June 30, 2008.

Our sixth report, issued with this letter, is the result of our investigation of the Napa County Emergency Communications as part of our general review of disaster preparedness and management in Napa County. Emergency communications includes both the physical communication together with the telephone system constitute the physical systems and fall under the responsibility of the Napa County Information Technology Services. Communications procedures relate primarily to the County Public Safety Access Points (PSAP) which are generally the responsibility of law enforcement agencies.

The Grand Jury was impressed by the physical communications facilities in Napa County and the aggressive program for the maintenance and improvement of these facilities by the County Information Technology Services. The Grand Jury was not impressed by the cumbersome procedures used in transferring emergency information between agencies and the lack of any apparent quality control techniques in use by the PSAP organizations. In addition, the Napa County PSAP organizations are among only 17% in the State of California which still rely on the California Highway Patrol to forward wireless telephone calls.

The Napa County Counsel has reviewed this final report on the Napa County Emergency Communications and the Presiding Judge of the Napa County Superior Court has certified that the report complies with Title 4 of the California Penal Code. The report has also been accepted and filed as a public document by the County Clerk.

Copies of this report are available for your review in the Napa City/County Library and online by following the link to Grand Jury at <http://www.napacourt.com/> It is our pleasure and honor to serve you during the 2007-2008 Grand Jury tenure. We hope you find our report interesting and informative.

Respectfully submitted,  
The 2007-2008 Napa County Grand Jury

# Napa County Emergency Communications

## SUMMARY

*The preservation of life, property and the environment is an inherent responsibility of local, state and federal government.*

In order to fulfill the Grand Jury's mandate to investigate all branches of government, to be assured that they are being administered efficiently, honestly, and in the best interest of Napa County's citizens, this Grand Jury investigated the Napa County Emergency Communications system.

For purposes of this report, emergency communications is divided into two general areas: the physical transmission/reception facilities (hardware) and communications procedural issues. Physical communications include the County's Public Safety Radio System and telephone communications. These facilities fall under the Napa County Information Technology Services. The communications procedural issues relate primarily to County Public Safety Access Points (PSAP) which are generally the responsibility of law enforcement agencies.

The Grand Jury was impressed by the physical communications facilities in Napa County and the aggressive program by the County Information Technology Services for communications improvement. The absence of a microwave link to the Berryessa Peak repeater station, which precludes use of the simulcast system in that area, is the most significant shortcoming in the County's hardware system. The Grand Jury was advised that the cost of extending a microwave relay capability to Lake Berryessa would be approximately \$130,000.

The Grand Jury was not impressed with the communications procedures in place. Among other issues, there does not appear to be any method of recording or analyzing errors. Also, the Napa County PSAPs are among 17% of the PSAPs in the State of California which still rely on the California Highway Patrol (CHP) to forward wireless calls.

Dispatch for medical emergencies is complicated by two issues. The PSAP call taker must be Emergency Medical Dispatch (EMD) qualified and dispatch includes both ambulance service and a fire department. The caller's Enhanced 911 (E-911) Caller ID information together with the call taker's manual input data go to the Central Dispatch dispatcher. The dispatcher places a landline call for an ambulance and then places a landline call to the CAL FIRE Emergency Command Center (ECC) located north of St. Helena for the fire department dispatch. Since the Napa Central dispatcher does not transfer the original 911 call, but places a separate call, the ECC does not get the E-911 Caller ID information and relies on the Napa Central dispatcher to provide the data.

The policies and procedures in use by Napa Central Dispatch need a general review and updating, both from an administrative standpoint and from a good practices standpoint.

There appears to be almost a total absence of basic quality assurance procedures in place in the PSAP organizations investigated by this Grand Jury.

## BACKGROUND

Physical communications include the County's Public Safety Radio System and telephone communications. These facilities fall under the Communications Division of the County Information Technology Services.

Napa County has three Primary PSAPs: the City of Napa Central Dispatch, which is an element of the Napa Police Department; the City of Calistoga Dispatch and the City of St. Helena Dispatch, which are each elements of their respective Police Departments. Napa County Sheriff's Department PSAP functions are administered by the City of Napa Central Dispatch PSAP through a contract with the County.

The CAL FIRE Emergency Control Center, under contract to the County, provides fire dispatch services for the Napa County Fire Department.

## METHODOLOGY

### Interviews Conducted

Interviews were conducted with various individuals from the following agencies or departments:

- City of Napa Police Central Dispatch
- City of Calistoga Police Department
- CAL FIRE Emergency Command Center
- Napa County Sheriff's Department
- Napa County Information Technology Services
- California Highway Patrol PSAP, Benicia, CA.

### Documents Reviewed

- Napa Central Dispatch Policies
- Napa Central Dispatch Standardized Evaluation Guidelines
- Napa Central Dispatch EMD Training
- City of Calistoga Police Department communications policies and training materials
- Napa County Fire Department Communications Procedures
- CAL FIRE Communications Procedures
- Contract for Dispatching Services Between the County of Napa and City of Napa, Napa County Agreement No. 2443 dated July 15, 1986, and Amendments

## DISCUSSION

### General

For purposes of this report, emergency communications is divided into two general areas: the physical transmission/reception facilities (hardware) and communications procedural issues. The

Grand Jury was impressed by the recent progress in the physical transmission/reception area and deeply concerned by procedural issues.

## Physical Communications Facilities

Physical communications include the County's Public Safety Radio System and telephone communications. These facilities fall under the Napa County Information Technology Services. Public safety radio has experienced long standing coverage problems because of the diverse topography of the County. Jamieson Canyon, Pope Valley, and the Lake Berryessa area, in particular, suffer from communication "dead spots". Lake Berryessa is of particular concern because of the high volume of law enforcement radio traffic on weekends and holidays. Significant improvements have occurred in both the Public Safety Radio System and the telephone notification system during this Grand Jury's tenure. However, the lack of microwave relay facilities to the Berryessa Peak repeater facility remains a significant defect.

The Communications Division of the County Information Technology Services had a 2006/2007 budget of \$1,077,000 and a staff of five-full time equivalent employees. Of that budget, \$539,000 were salaries and employee benefits; \$538,000 were services and supplies. The division generated \$55,500 in revenue.

The Grand Jury was impressed by the physical communications facilities in Napa County and the aggressive program by the County Information Technology Services for communications improvements.

### Public Safety Radio System

The Public Safety Radio System consists of a system of VHF fixed receivers, transmitters, antennas and mobile units (patrol cars and hand-held units). Principal County communications repeaters are located on Mt. St. Helena, Atlas Peak and Berryessa Peak. In addition there are municipal repeaters on Sugarloaf and Oat Hill. Napa County covers a large geographic area with significant topographical features, resulting in communications "dead spots". The County has been working to minimize these dead spots through technological advances.

The Mt. St. Helena repeater site is on land covered by a long term lease with the Bureau of Land Management. The Atlas Peak repeater is on privately owned property which has been leased to the County. Recently the property owner indicated that the lease will not be renewed and plans are in progress to relocate the repeater. The Berryessa Peak repeater is also on privately owned property.

High power fixed transmitters allow the mobile units to hear the dispatcher, but because the power output of the mobile/hand-held units is relatively low, the dispatcher may not be able to receive a clear signal from the mobile unit. To offset this problem, repeater systems are used. Repeaters pick up the mobile transmission and relay the signal by microwave or landline to the dispatcher. Currently, both St. Helena and Atlas Peak are linked to the central facilities by microwave while the Berryessa repeater has only landline. Until recently, the mobile user had to manually select which repeater to use. Physical proximity was not always the best selection criteria because of topography, atmospheric conditions, etc. Repeaters are also used to provide enhanced coverage for dispatch transmissions. However, when more than one transmitter is



sending a signal, interference between the transmitters may degrade the communications at any given location.

Napa County recently installed and placed in service a “voting system” for the Public Safety Radio System. A voting system automatically selects and uses the best repeater signal source. Incoming signals to each repeater are relayed to a central location by microwave or landline link where they are compared. The repeater signal “voted” to be the best is then relayed to the dispatcher. The mobile operator no longer has to manually select the repeater station which they think will provide the best communications. The voting system makes the selection automatically, and changes the option several times a second if necessary.

Napa County recently installed and placed into service a simulcast system for the Public Safety Radio System. Currently this system can only be used with the St. Helena and Atlas Peak repeater stations since a microwave link is required. A simulcast system provides simultaneous transmission of the signal by two or more transmitters. By adjusting a delay between the transmitters, the interference pattern can be minimized. The absence of a microwave link to the Berryessa Peak repeater station, which precludes use of the simulcast system in that area, is the most significant shortcoming in the County’s system. The Grand Jury was advised that the cost of extending a microwave relay capability to Lake Berryessa would be approximately \$130,000.

The County has obtained software which has the capability of modeling the repeater characteristics and the County topography to map out predicted radio coverage. These models can then be used in the future to implement changes which will improve the radio coverage. This software is currently being calibrated for Napa County.

Many Public Safety Radio Systems are moving away from the VHF radio band to the UHF band. Because much of the County’s communications are linked to CAL FIRE, and because that organization has committed to remaining with VHF for a least the next ten years, Napa County does not have any current plans to shift to UHF.

#### Public Notification System

Public Notifications Systems, sometimes referred to as “Reverse 911®” systems, allow public safety officials to notify citizens of emergency situations. One function of the system is to deliver a recorded message to a pre-defined list of numbers for internal callouts or specified public callouts (search and rescue teams, SWAT teams, Haz-Mat, etc.). However, the more powerful feature of these systems uses Global Positioning System (GPS) data to deliver a recorded message to a specific geographic area.

Napa County has recently purchased a W.A.R.N. (Wide Area Rapid Notification®) Public Notification System. The Grand Jury was given a demonstration of the W.A.R.N. GPS function. The operator assumed that a chemical spill had occurred at the intersection of Trancas and Jefferson streets in Napa. The operator further assumed that the incident commander had made the decision that all residents within a half-mile radius of the intersection should be told to “shelter in place”. A brief recorded message was prepared which identified the emergency and provides basic instructions. In actual practice, this message would be provided in English and Spanish.

In an emergency situation, the Public Notification System would then call all landline telephones within the defined circle, and deliver the “shelter in place” warning. The speed at which the notification can be made is limited only by the telephone company’s switching capabilities. There are additional features of the W.A.R.N. system selected by the County. When all the proper safeguards regarding use of the system are in place, the public will be provided with details of its use and options that are available to them. For example, it will be possible for you to request to have your wireless telephone called as well as your landline.

The City of St. Helena already has a Public Notification System in place.

#### Regional Communications Interface

Napa County communications supervisors are active in the various Bay Area’s public safety radio organizations, including the Super Urban Area Security Initiative (SUASI).

## Procedural Issues

### **911 Call Routing (landline, wireless and Voice over Internet Protocol (VoIP))(unbold)**

#### Background

When a telephone call is placed to 911, the calling number is identified by a system known as the Automatic Number Identification (ANI) system. This system was originally established by telephone companies for billing purposes. All telephone companies collaborate with public safety agencies to create a Master Street Address Guide (MSAG) which cross-references every assigned number with the subscriber’s data. These database functions are often provided by third party vendors.

When a 911 call is dialed, the telephone company’s switching system routes the call to the appropriate PSAP and includes data from the MSAG.

#### Caller Identification (Caller ID)

There are three basic types of Caller ID. The first, or basic service, returns only the calling number. The second, or enhanced, may return the directory information (caller name) for the calling number. These first two types receive their information from the subscriber data base. The third type of Caller ID is E-911 Caller ID which uses the MSAG data and is only available to public safety facilities. E-911 displays the caller’s name, phone number, street address, apartment or space numbers, the type of phone, additional phone numbers at that location, and a recommendation for police, fire, or paramedic response. It also keeps numbers from being blocked, even if they are unlisted. In addition, wireless E-911 can determine the location of the caller by either using cell towers or a GPS in the phone itself. Under optimal GPS conditions, the wireless phone location can be determined within 30 feet. Current software can convert the GPS data to a street address in urban areas.

#### Public Safety Answering Point (PSAP)

The PSAP is the interface between a caller who has an emergency and the first responders. Each PSAP has two principal functions: call taking and first responder dispatching. In a small

or low volume PSAP, these functions may be carried out by the same person. Typically, however, these functions are handled by separate individuals. The PSAP which takes unfiltered calls from the public is described as a Primary PSAP. A Secondary PSAP is one which receives calls forwarded by the Primary PSAP. A fire department dispatcher would typically be a Secondary PSAP. The CAL FIRE Emergency Control Center and City of Napa Fire Department are examples of Secondary PSAPs. Napa County has three Primary PSAPs: the City of Napa Central Dispatch, the City of Calistoga and the City of St. Helena. Napa County Sheriff's department PSAP functions are administered by the Napa Central Dispatch PSAP through a contract with the County (County Contract #2443).

When the PSAP call taker answers the 911 telephone call, their Computer Aided Dispatch (CAD) system displays the caller's E-911 Caller ID data. The call taker determines the nature of the call (law enforcement, fire or medical) and any other pertinent data, then enters this information into the CAD system. If the caller is a non-English speaker, the services of a translator are obtained as a PSAP typically has a standing contract with a translation service. The 911 caller, the translator and the PSAP call taker use a "conference" call approach to respond to the emergency.

The E-911 data plus the call takers input is displayed on a dispatcher's computer screen. The dispatcher then notifies the appropriate agency or agencies. Law enforcement calls are dispatched to the municipal police departments or the Sheriff's Department. Similarly, fire calls are dispatched to the appropriate firefighting organization. Medical calls generally result in the dispatch of both an ambulance and a fire department vehicle. In Napa County, all ambulances are dispatched by the Napa Central Dispatch PSAP.

EMD personnel are call takers trained to provide the caller with assistance in dealing with a medical emergency until professional assistance arrives. Not all PSAP organizations are staffed with EMD personnel. If the PSAP does not have EMD qualified personnel, then the 911 medical calls must be forwarded to a PSAP which does have EMD personnel available. The Calistoga, St. Helena, and CAL FIRE PSAPs are not qualified to handle medical calls. Any medical 911 calls originating within the City of Calistoga or St. Helena must be forwarded by the local PSAP to the Napa Central Dispatch PSAP.

#### Landline

All 911 landline calls originating within Napa County are routed to the Napa Central Dispatch PSAP with the exception of calls originating from within the city limits of Calistoga and St. Helena. The later go to their respective PSAPs. The routing of Napa County landline 911 calls is shown in Appendix 1.

#### Wireless

The early "wireless" telephones were typically "car phones". For this reason, the CHP was charged with establishing PSAP facilities for wireless telephones. For many years, all 911 calls originating from any wireless telephone within the State of California was routed to CHP PSAP facilities. The CHP PSAP would dispatch CHP personnel and/or forward the call to the appropriate local PSAP or firefighting agency for law enforcement, fire or medical response.

That policy changed approximately eight years ago. California Assembly Bill No. 1263, signed by the Governor on September 29, 2000, and incorporated into California Law, Public Utilities Code 2892 (c) provides that: *A “911” call from a commercial mobile radio service telecommunications device may be routed to a public safety answer point other than the Department of California Highway Patrol...* . The CHP advised the Grand Jury that there are 407 primary PSAP centers in the State of California, of which 383 are local and 24 are CHP. Of the 383 local PSAPs, 83% (318) now receive wireless 911 calls directly.

The Napa Central Dispatch PSAP, Calistoga PSAP and St. Helena PSAP are among those remaining which still rely on the CHP to forward wireless calls. If a citizen within Napa County places a 911 call on their wireless telephone, that call first goes into a queue at the CHP dispatch center in Benicia. The Benicia CHP facility is currently handling an average of 173 wireless calls per hour from the nine Bay Area counties with an average wait time of 57 seconds. During peak response times, the delay can be several minutes. After the caller’s location and the nature of the emergency have been determined by CHP Benicia, the call is then transferred to a queue at the appropriate Napa County PSAP.

When a wireless telephone call is made, the telephone transmission is picked up by one or more “cell sites” (typically a tower) which are equipped with transponders to receive the incoming call from a telephone and relay it by microwave or landline to the telephone company’s network. Typically, each cell site is fitted with a circular array of transponders, each “looking” out at a pie-shaped segment. The cell site superimposes data on the call which not only identifies the receiving cell site, but the individual transponder, or cell sector, as well. There are approximately 82,000 cell sectors in service in California, of which 19,000 were added in 2007, alone. Each sector call is individually routed with respect to 911 calls. If the cell sector which is activated is overlooking an area for which the CHP is responsible (e.g., a highway), the call would be routed to the appropriate CHP PSAP rather than a local PSAP.

Every PSAP also has regular seven digit access numbers which permit other agencies to contact the PSAP without going through the 911 sequence. Because of the wireless delays associated with calls routed through CHP Benicia, citizens are sometimes advised to program this seven digit number into their wireless telephone so that their emergency call will go directly to their PSAP. While this procedure does bypass the CHP step, there are two critical elements to consider. First, since the call is made to a regular seven digit telephone number, the telephone company’s system does not recognize it as a “911” call and therefore the E-911 data, including caller location, is not provided. The local PSAP will see only the enhanced Caller ID information (telephone number and name). Secondly, if the call is placed from outside the County, the Napa PSAP must forward the call to a PSAP in the caller’s current location once they have determined where the caller is. This takes additional critical time. The routing of Napa County wireless 911 calls is shown in Appendix 1.

#### Voice over Internet Protocol (VoIP)

Recently introduced, VoIP service allows the subscriber to use a telephone connected to an internet access device (computer, Blackberry®, etc.) to place telephone calls. As with landline or wireless calls, the telephone company will route a VoIP 911 call to the appropriate PSAP. However, unlike a wireless 911 call, the “appropriate” PSAP is determined by the customer data

(similar to landline call), but not by the physical location of the VoIP telephone. Since laptop computers and other internet access devices are portable, the VoIP 911 call may not be placed from the address listed in the customer data. VoIP service provider systems typically recognize if the call has been placed from a “hot spot” or internet address different from the subscriber’s, but currently do not have the capability of determining the appropriate PSAP from that information. It is therefore essential that VoIP users fully understand exactly how their particular telephone company routes 911 calls. Within the limitations noted above, VoIP 911 calls are routed like landline calls as shown in Appendix 1.

### Medical and Fire Emergencies

Medical emergencies are complicated by two issues. The call taker must be EMD qualified and dispatch includes both ambulance service and a fire department. Appendix 1 details the medical response sequence. In Napa County this can be convoluted. For example, if a medical 911 call is initiated within the City of St. Helena, the call goes initially to the St. Helena PSAP. However, since that PSAP does not have EMD qualified personnel, the call must be transferred to the Napa Central Dispatch PSAP. The caller’s E-911 Caller ID information together with the call taker’s data goes to the dispatcher. The dispatcher places a landline call for an ambulance and then places a landline call to the CAL FIRE Emergency Control Center (ECC) located north of St. Helena for the fire department dispatch. Since the Napa Central dispatcher does not transfer the original 911 call, but places a separate call, the ECC does not get the E-911 Caller ID information and relies on the Central Dispatch dispatcher to provide the data. The CAL FIRE ECC then “tones out” (alerts) the St. Helena Fire Department to respond. Medical calls received from County locations other than Calistoga and St. Helena are slightly less cumbersome, but the manual transfer of information from the Central Dispatch dispatcher to the fire dispatcher still occurs.

One example of why confusion can arise is that some long streets, such as the Silverado Trail, have repeating numbers in different municipalities. A Silverado Trail numerical address without a specific city identification can result in an unacceptable response time while the location is determined. The Grand Jury was provided with informal (email) and formal correspondence addressed to the Napa Central Dispatch PSAP from fire agencies complaining of dispatch address errors and requesting that the original 911 call be “conferenced” with the fire dispatch instead of receiving the data “second hand”. This would permit fire dispatch to see the E-911 data and to clarify any location questions directly with the caller.

The Napa Central Dispatch PSAP has resisted this approach on the grounds that it might confuse the caller. Since a similar procedure is routinely used in the case of third party translators, this argument does not seem to be valid. There are other ways of providing the original E-911 data to fire dispatch including linking the Napa Central Dispatch PSAP and fire dispatch CAD systems or sending the information on a “Rip and Run” system which transmits the E-911 Caller ID to a “Blackberry®” or other communications device. These systems are hardware/software dependent and take time to implement. The “conference call” approach could be implemented immediately. The American Canyon Fire Department does have a “Rip and Run” system available.

### City of Napa Police Department Central Dispatch

The Napa Central Dispatch PSAP provides call taking and dispatch functions for essentially the entire County. Although St. Helena and Calistoga have their own PSAPs, the Napa Central Dispatch covers medical 911 calls from those communities as well.

The Grand Jury requested a copy of the Central Dispatch policies and procedures. We were provided with a “Policies Index” with an initial issue date of 1988, and a revision date of December 1994. Of the 66 policies listed in that index, the Grand Jury received 27, plus an additional two policies not listed on the index. The policies identified in the index are shown in Appendix 2, to this report. Those policies which have an entry in the “date” column are those which were received. As shown in Appendix 2, the most recent policy revisions were dated June 2003, but most were considerably older.

The Grand Jury was also given a list of “Dispatch General Orders and General Orders Associated with Dispatch”. Most of the General Orders provided to the Grand Jury were undated and in several cases carried titles similar to policies listed in the Policies Index. A list of the General Orders received is shown in Appendix 3.

The policies and procedures in use by Napa Central Dispatch need a thorough review and updating, both from an administrative standpoint and from a good practices standpoint.

Except for qualified dispatchers hired from the outside (which is unusual), Napa Central Dispatch provides the training for their dispatchers. Most of this training is one-on-one supervision. Dispatcher training, including EMD training, normally takes nine months to a year. The Grand Jury requested, and was provided dispatcher training materials. The Grand Jury believes that better training materials and more formal requirements, including documented progress assessments, should be instituted. For example: the Grand Jury at its first interview asked for flow charts which indicated how the various law enforcement, fire and medical calls were routed. This seemed to be a reasonable request and we expected that this information would be readily available training material. It took several weeks to obtain the requested information which apparently did not exist in written form and had to be produced specifically in response to our request. This information is included as Appendix 1 to this report.

Because a number of dispatchers retired from the Napa Central Dispatch PSAP at approximately the same time, the remaining staff was required to work significant overtime for an extended period until replacement personnel could be hired and trained. This prolonged, forced overtime adversely impacted the organization. This situation is now improving with the hiring and training of new dispatchers. The Grand Jury believes that the recent assignment of a sworn officer from the patrol side of the Napa Police Department as the new communications supervisor will help to resolve many issues.

#### CAL FIRE Emergency Command Center (ECC)

CAL FIRE is a state organization and therefore not within the jurisdiction of the Napa County Grand Jury. However, the County of Napa does contract with CAL FIRE for various services in support of the Napa County Fire Department. Those contracted services include fire dispatching.

The County of Napa directly funds one full-time dispatcher located at the ECC, and there are Napa County Fire Department procedures directly affecting CAL FIRE dispatcher requirements.

The Napa County Fire Department has issued two procedures directly relating to County fire dispatch:

Policy No. 2005-1, Working Structure Fire Dispatch Protocol

Policy No. 2005-7, Dispatch Protocol

In the process of investigating a Wooden Valley structural fire, and the subsequent investigation of CAL FIRE dispatch procedures relating to the Napa County Fire Department, the Grand Jury concluded that these procedures were not generally followed. In the case of 2005-7, the requirement to “tone out” a volunteer fire department a second time in five minutes if an initial response had not been received wasn’t followed. The Grand Jury was advised that this was because there was no alarm to tell the dispatcher that five minutes had elapsed. The CAL FIRE ECC does maintain communications records, but no formal records are maintained of dispatch errors.

The Grand Jury did not investigate CAL FIRE dispatcher training or staffing.

#### City of Calistoga PSAP

The City of Calistoga PSAP is part of the Calistoga Police Department. The Grand Jury found the PSAP to be a small and well organized entity. The PSAP has four full-time and one part-time dispatchers. Dispatcher training takes eight to sixteen weeks depending upon the individual and formal training materials are provided to employees.

Approximately 60% of the calls received by the Calistoga PSAP are medical in nature, 30% law enforcement and 10% fire. Medical calls are transferred to Napa Central Dispatch where EMD personnel are available. Fire calls are transferred to the CAL FIRE ECC, and law enforcement calls are dispatched locally. In the case of fire calls or medical calls which are likely to result in the dispatch of the Calistoga Fire Department equipment, the PSAP alerts the Fire Department.

Calistoga would like to have wireless 911 calls routed directly to the Calistoga PSAP. However, because it is a small community, located between two highways under the jurisdiction of the CHP, there is not adequate discrimination between available cell sectors to distinguish between highway locations and municipal locations. Calistoga expects this situation to be corrected in the near future and will then be able to receive wireless calls directly from within the city limits.

With the exception of policies and procedures which appeared to be up-to-date, there did not appear to be any formal quality control measures in place. Dispatch problems are not recorded unless they are serious enough to justify a personnel action (which is rare).

#### Quality Assurance/Quality Control

The Grand Jury found little evidence of basic quality assurance procedures in place in the PSAP organizations investigated. Essential elements of such programs would include:

- a set of procedures that cover all key processes
- monitoring processes to ensure they are effective

- keeping adequate records
- checking output for defects, with appropriate corrective action where necessary
- regularly reviewing individual processes and the quality system itself for effectiveness
- facilitating continual improvement

While the Grand Jury found most of these elements to be lacking, perhaps the most discouraging was the absence of record-keeping with respect to tracking defects and initiating corrective action. The 2001/2002 Grand Jury commented on problems associated with the dispatch of fire equipment in Napa County. The general response to their findings was that since the Grand Jury could not provide specifics, the problems did not exist. Armed with this knowledge, the current Grand Jury attempted to obtain the specifics of the many “anecdotal” stories we were told regarding communications problems. This, indeed, turned out to be a difficult task as records are not kept. The common response was that “minor” problems are corrected by the shift supervisor (and not documented) and significant issues (problems that the “boss” would be likely to hear about) are identified informally up the chain of command. This Grand Jury did obtain copies of some interagency emails detailing specifics of dispatch errors, one formal interagency letter detailing a dispatch problem, and a copy of one “Employee Action Report” regarding a dispatch error.

During an interview with a municipal PSAP, the Grand Jury asked if the existing call routing procedure for medical calls (municipal PSAP to Napa Central PSAP to CAL FIRE to municipal Fire Department) resulted in any problems? The answer was that there are frequent problems in that area. The morning of the Grand Jury interview, an error had occurred. The municipal PSAP received a medical emergency call, and the caller’s E-911 location data was displayed on their CAD system. The municipal PSAP transferred the call to the Napa Central Dispatch and at the same time alerted the local Fire Department, providing the E-911 address. The local fire department was already responding when the formal fire dispatch was received from CAL FIRE. The address provided by the CAL FIRE dispatcher was different than that provided by the municipal PSAP. The responding local fire unit advised CAL FIRE of the address discrepancy, and CAL FIRE ultimately confirmed that the original address provided by the municipal PSAP to the fire department was the correct address. The municipal PSAP had no way of knowing if the error occurred between Napa Central Dispatch and CAL FIRE, or if it was a CAL FIRE ECC error. No record of this occurrence was made at the municipal PSAP, and based on the Grand Jury’s investigation, it is unlikely that any other organization made a record of the error.

Since records are not routinely kept, there is no way for management to look at trends or to assess the effectiveness of corrective action. The Grand Jury has the following questions: What kind of errors most frequently occur? Are the errors the result of deficiencies in the training program? Are the errors related to excessive overtime demands and dispatcher fatigue?

One issue identified as a reason for the lack of record-keeping is restrictions on adverse comments in personnel files. An example cited was the “Firefighter’s Bill of Rights”, Assembly Bill 220, which became effective January 1, 2008. The following is an excerpt from that document (underscore added):



3255. A firefighter shall not have any comment adverse to his or her interest entered in his or her personnel file, or any other file used for any personnel purposes by his or her employer, without the firefighter having first read and signed the instrument containing the adverse comment indicating he or she is aware of the comment. However, the entry may be made if after reading the instrument the firefighter refuses to sign it. That fact shall be noted on that document, and signed or initialed by the firefighter.

This would seem to fall within Joseph Heller's "Catch-22" criteria. However, since the goal of quality assurance is to improve the product, not disciplinary action, this issue should not preclude identifying and tracking errors.

One key component of quality assurance programs is third-party auditing and certification. In the manufacturing and service industries the International Organization for Standardization (ISO) 9000 family of standards for quality management systems is the normative criteria. In the medical field, the Joint Commission on Accreditation of Healthcare Organizations (JCAHO) provides the third party assessment. A medical facility which fails accreditation would be out of business, but there is no equivalent safeguard for emergency communications.

## Consolidated Napa County PSAP

For all intents and purposes, the Napa Central Dispatch PSAP does serve as a consolidated PSAP for Napa County with the exception of fire dispatch (CAL FIRE) and the St. Helena and Calistoga non-medical calls. It is, however, the interface between Napa Central Dispatch and CAL FIRE ECC that seems to cause most of the confusion. The Grand Jury was advised that Calistoga and St. Helena desire to maintain their own PSAPs in order to provide more personal, local service. Since many of the 911 calls from these communities are medical in nature and must be referred to Napa Central Dispatch, and because wireless 911 calls go directly to CHP Benicia, this would not seem to be an overriding consideration. The County Sheriff's Department currently contracts their PSAP function to Napa Central Dispatch, but has recently initiated a study to determine if a more cost effective solution exists. That study was not completed at the time this report was prepared.

The Grand Jury recommends that Napa County institute a consolidated County PSAP. This PSAP would have two primary divisions, law enforcement and fire/medical. These divisions should be co-located and use a common CAD system. The physical location of this PSAP to provide convenient access to the users. Napa County wireless calls, not directly CHP related, to be routed to this consolidated PSAP.

## COMMENDATION

The Communications Division of the County Information Technology Services is to be commended for recent major improvements to the Public Safety Radio System and implementation of the Public Notification System.

## FINDINGS

The 2007/2008 Napa County Grand Jury finds that:

1. Through the implementation of a communications repeater voting system and the implementation of simulcast broadcasting the Napa County Public Safety Radio System has been significantly enhanced.
2. The Berryessa Peak radio repeater station is not equipped with a microwave relay system.
3. The Public Notification System soon to be implemented will provide emergency response agencies with a powerful communications tool.
4. The only Napa County PSAP with Emergency Medical Dispatch qualified personnel is the Napa Central Dispatch PSAP.
5. Napa County PSAPs have elected not to receive wireless 911 calls directly from the caller.
6. Napa Central Dispatch places a separate landline call to CAL FIRE ECC rather than conferencing the call with 911 callers. This action precludes the ECC from receiving E-911 Called ID information without resorting to additional hardware or software modifications.
7. It is essential that VoIP users fully understand how their particular telephone company routes 911 calls.
8. The American Canyon Fire Department has “Rip and Run” communications equipment to receive E-911 Caller ID information from the Napa Central Dispatch.
9. The Napa Central Dispatch policies and procedures appear to be out of date and generally in a state of neglect.
10. The Napa Central Dispatch training materials appear to be inadequate and seem to consist, in a large part, of vendor manuals.
11. CAL FIRE ECC dispatch personnel appear to be unaware of the Napa County Fire Department dispatch policies.
12. The CAL FIRE ECC does maintain communications records, but no formal records of dispatch errors are maintained.
13. None of the PSAP organizations investigated by the Grand Jury have quality assurance programs, or even the basic elements of such a program, in place.
14. Combining existing primary PSAP functions into a single consolidated PSAP would appear to better serve the citizens of Napa County than the current system.

## RECOMMENDATIONS

The Napa County 2007/2008 Grand Jury recommends that:

1. The Berryessa Peak public safety radio repeater be equipped with a microwave relay system.
2. County PSAP organizations initiate action to receive wireless 911 calls directly.
3. As an interim policy, the Napa Central Dispatch PSAP immediately begin to “conference” the CAL FIRE ECC on fire dispatch or medical/fire dispatch calls.
4. CAL FIRE ECC dispatchers be made aware of the requirements of the Napa County Fire Department dispatch related procedures.
5. On an urgent basis the Napa County PSAPs institute formal quality assurance programs, preferably audited by outside third party organizations qualified in the area of emergency communications.
6. The Master Plan be modified to include a consolidated Napa County PSAP and planning be initiated to establish the facility.

# REQUEST FOR RESPONSES

The 2007/2008 Grand Jury requests responses from:

1. The Napa County Executive Officer, Recommendation 1.
2. The Napa City Police Department and St. Helena Police Department, Recommendation 2.
3. The Napa City Police Department and Napa County Board of Supervisors, Recommendation 3.
4. The Napa County Fire Chief, Recommendation 4.
5. The Napa City Police Department, Calistoga Police Department, St. Helena Police Department, and Napa County Board of Supervisors, Recommendations 5 and 6.

## GLOSSARY

**ANI**---Automatic Number Identification

**CAL FIRE**---formerly California Department of Forestry (CDF)

**Cell Sector**---Refers to one of the antennas existing on a cell site. Most cell sites have three sectors.

**Cell Site**---The antenna array, base station equipment and supporting structure that is the local point of interface between a wireless phone device and a wireless network.

**CHP**---California Highway Patrol

**CHP PSAP**--- One of the 24 CHP public Safety answering points that prior to January 2001, were legally responsible for directly answering all wireless 911 calls received at cell sites in California.

**CMRS**---Commercial Mobile Radio Service. A category of wireless telephone service regulated by the FCC. It includes cellular telephone service.

**ECC**---Emergency Control Center (CAL FIRE)

**EMD**---Emergency Medical Dispatch

**GPS**---Global Positioning System

**Haz-Mat**---Hazardous Material

**Local PSAP**---Refers to all public safety answering points under the control of local public safety agencies.

**MSAG**---Master Street Address Guide

**OES**---Office of Emergency Services

**Primary PSAP**---A PSAP that answers 911 calls directly (unscreened) from the public.

**PSAP**---Public Safety Answering Point

**Secondary PSAP**---A PSAP that answers 911 calls that are transferred from other agencies (primary PSAPs). Fire and Emergency Medical Service PSAPs are typically secondary PSAPs

**SUASI**---Super Urban Area Security Initiative

**Wireless E-911**---Refers to the delivery of wireless 911 calls made pursuant to FCC Report and Order 94-102. This includes the delivery of a callback number, location, and routing of the call to the appropriate PSAP based on the caller's location.

**SWAT**---Special Weapons and Tactics

**UHF**---Ultra High Frequency (300 Mhz to 3 GHz)

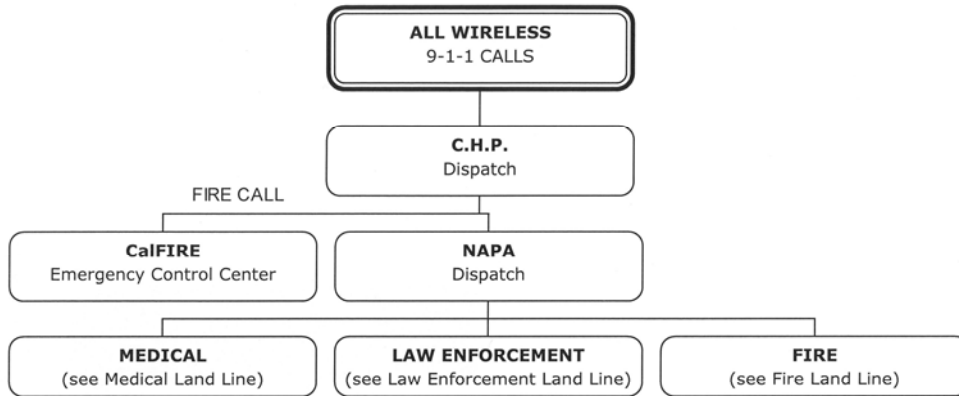
**VHF**---Very High Frequency (30 to 300 MHz)

**VoIP**---Voice over Internet Protocol

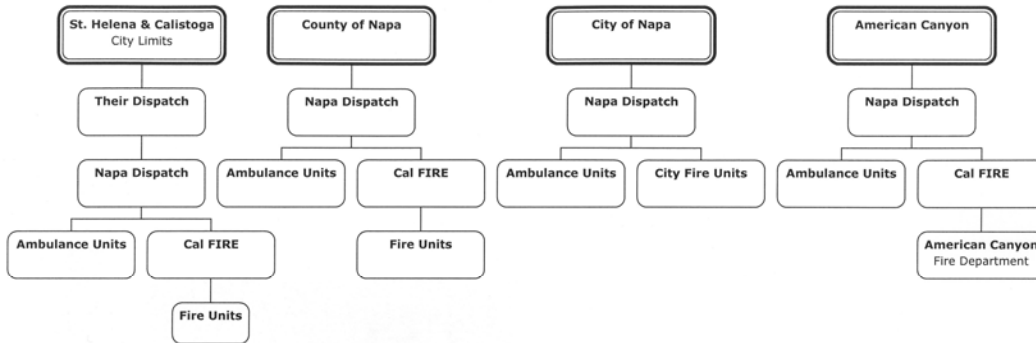
# Appendix

## Appendix 1: County Emergency Communications Routing Flow Sheets

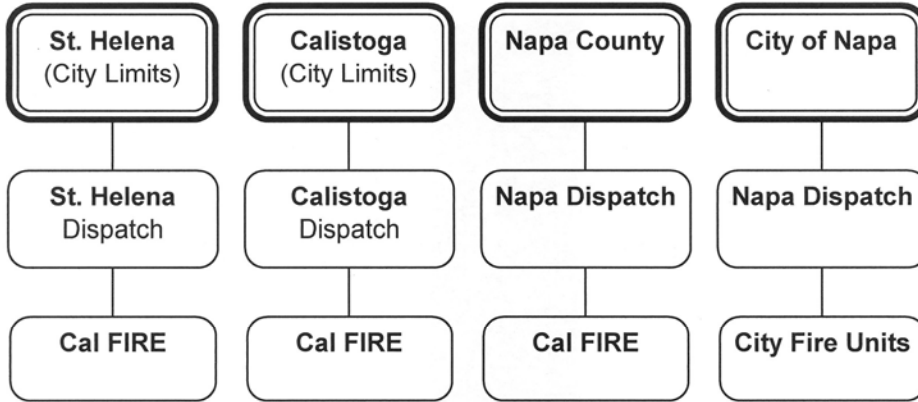
### NAPA COUNTY COMMUNICATIONS WIRELESS 9-1-1 CALLS



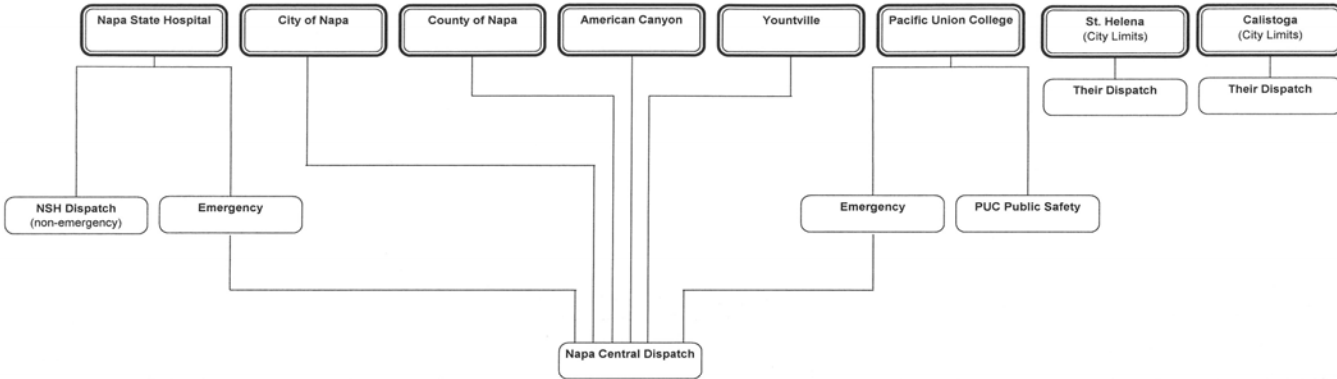
### NAPA COUNTY COMMUNICATIONS MEDICAL LAND LINE 9-1-1 CALLS



**NAPA COUNTY COMMUNICATIONS  
FIRE LAND LINE  
9-1-1 CALLS  
(non-medical)**



**NAPA COUNTY COMMUNICATIONS  
LAW ENFORCEMENT LAND LINE  
9-1-1 CALLS**



Appendix 2: Napa Central Dispatch Policies

POLICY NUMBER	TITLE	DATE
9000	DISPATCH POLICIES	
9001	Introduction	
9002	Purpose	
9003	Authority	12/94
9004	Organization of Department	
9010	BASIC POLICIES	
9011	Basic Qualifications	
9012	Required Knowledge	7/30/96
9013	Standard of Performance and Conduct	7/30/96
9014	Personal Appearance and Grooming Stds	
9020	PERSONNEL POLICIES	
9021	Dispatch Probationary Periods	7/30/96
9022	Payroll and Pay Periods	
9023	Overtime and Holiday Compensation	7/30/96
9024	MOU/Bargaining Unit	7/30/96
9025	Suggestion Procedures	7/30/96
9030	ATTENDANCE POLICIES	
9031	Attendance Requirements	7/30/96
9032	Shift Schedules	
9033	Shift Selections	6/13/03
9034	Requests for Notification of Time Off	6/13/03
9035	Voluntary Overtime Scheduling	6/13/03
9036	Mandatory Overtime Policy	
9040	DAILY POLICIES	
9041	Daily Shift Responsibilities	
9042	Position Responsibilities	
9043	Administrative Watch Board	
9044	Bulletin Boards	
9045	Building Security and Restricted Areas	
9046	Lunch and Coffee Breaks	1/22/02
9047	Care and Dispatch Facility	7/30/96
9048	Lockers/Mailboxes/Lunchroom	
9100	COMMUNICATIONS FACILITY	
9101	Dispatch Monitored Alarms	7/30/97
9200	COMPUTER AIDED DISPATCH	
9300	TELEPHONE COMMUNICATIONS	
9301	Telephone Communications	
9302	911 Consoles	
9303	Emergency Phone System	
9304	Napa County Centrex System	
9305	Civil Defense Phone – NAWAS	
9306	Call Handling Procedures – “911”	1/22/02
9307	Call Handling/911 Calls Hangup/Disconnets	
9400	LAW ENFORCEMENT COMMUNICATIONS POLICIES	
9401	Assignment of Cover Units	7/30/96
9402	General Broadcasts/Call Assignment	
9403	Front Counter/Telephone Complaints	
9500	LAW ENFORCEMENT/POLICE DEPARTMENT SPECIFIC	

9600	LAW ENFORCEMENT/SHERIFF DEPARTMENT SPECIFIC	
9700	EMS POLICIES	
9710	AMBULANCE POLICIES	7/30/96
9711	Ambulance Dispatch Procedures	
9712	Ambulance Zones	
9713	Authorized Ambulance Service Providers	
9714	South Napa County Zone – Rotation	
9715	Lake Berryessa Ambulance Zone	
9716	Ambulance Dispatch/Special Procedures	
9720	AIR AMBULANCE POLICIES	
9721	Air Ambulance Procedures	7/30/96
9722	Air Ambulance – Dispatch Guidelines	
9723	Air Ambulance Callout	
9724	Manual Dispatch/Ambulances	
9730	EMD POLICIES	
9800	FIRE COMMUNICATION POLICIES	
9801	Use of “Clear Text”	
9802	Specific Fire Terms/Definitions	
9803	Cross Street & Dispatch Tub File	
9804	Fire Department Callouts	5/2/91
9805	Bells & Pagers	
9806	Response Level indexes	1987
9807	Alarm Assignments	
9808	Broadcast Formats/Fire Dispatch	4/24/91
9809	Fire dispatches	1987
9810	SPECIAL CALL HANDLING	
9811	Bombs/Explosive Devices/Threats	3/27/03
9812	Fire Drills	4/24/91
9813	Automatic Fire, Smoke, and Sprinkler Alarms	
9814	Mutual Aid	5/6/91
9815	Hazardous Materials	1987
9816	Medical Aid/Rescue	1987
9817	Service Calls/Fire Menace Standby	1987
9027	Training Program	7/30/96
9731	Emergency Medical Dispatching	

Appendix 3:Dispatch General Orders

	<b>Dispatch General Orders and General Order Associated with Dispatch</b>
401	Call for Service Prioritization
402	Basic Knowledge
403	Standards of Performance and Conduct
404	Fire Department Callouts
405	Fire Drills
406	Automatic Fire Alarms
412	Daily Shift Responsibilities
414	Care of Dispatch Facility

415	Dispatch Monitored Alarms
417	Assigning Cover Units
418	Ambulance Dispatching
419	Ambulance Dispatching – Hazard Alert
420	Emergency Medical Dispatch
422	Mutual Aid
90-2	Bomb Threat
91-3	Stolen/Recovered Vehicles
03-03	Attempted Child Abduction



**NAPA COUNTY**

**OFFICE OF**

**EMERGENCY SERVICES**

# TABLE OF CONTENTS

1. Letter to Presiding Judges	
2. Letter to the Citizens of Napa County	
3. Napa County Office of Emergency Services	
a) Summary	1
b) Background	1
c) Methodology	2
d) Discussion	2
Planning	2
Community Emergency Response Team (C.E.R.T.)	3
Emergency Water Supplies	4
The Napa Valley Lifeboat	4
Ongoing Needs	5
Communications	5
4. Findings	6
5. Recommendations	6
6. Request for Responses	6
7. Commendation	7
8. Glossary	7



## NAPA COUNTY GRAND JURY

P.O. BOX 5397

NAPA, CALIFORNIA 94581

April 28, 2008

The Honorable Francisca P. Tisher  
The Honorable Raymond A. Guadagni  
Presiding Judges 2007/2008  
Superior Court of the State Of California  
County of Napa  
825 Brown Street  
Napa, CA 94559

Dear Judges Tisher and Guadagni,

Pursuant to Section 933(a) of the California Penal Code, the 2007-2008 Napa County Grand Jury submits to you its Final Report on the Napa County Office of Emergency Services. Our investigation of the Napa County Office of Emergency Services was conducted in a manner consistent with the California Penal Code, this Court's Charge, and the historic role of the Grand Jury – to protect the interests of the citizens of Napa County.

This is the seventh in a series of final reports we will be issuing before our term ends. I would like to acknowledge the hard work and dedication of the Grand Jury which our reports reflect. It is a privilege and a pleasure to work with them.

Respectfully submitted,

William E. Trautman  
Foreperson  
2007-2008 Napa County Grand Jury



## **NAPA COUNTY GRAND JURY**

**P.O. BOX 5397**

**NAPA, CALIFORNIA 94581**

To the Citizens of Napa County:

The 2007-2008 Napa County Grand Jury, as a function of its charge to provide the residents of Napa County with information regarding the City and County governments, conducted an investigation of agencies responsible for disaster preparedness and those agencies which will be required to act as “first responders” in an emergency situation. This report focuses on the Napa County Office of Emergency Services.

The Napa County Emergency Operations Plan states the County Executive Officer will direct the emergency management organization, serving as the Director of Emergency Services. The Director of Emergency Services is responsible for implementing the Emergency Operations Plan through the efforts of the Napa County’s Office of Emergency Services (OES). The Emergency Services Manager supervises the Napa County OES.

Continued emphasis on Community Emergency Response Team (C.E.R.T.) training and implementation of this training in the County schools is important to significantly improve the ability of the citizens to survive that initial period following a disaster when first responders are overwhelmed. Realistic planning to permit the Napa Valley to accept and care for disaster refugees from other Bay Area communities must be carried out. Long range planning also should include facilities that provide a dedicated Emergency Operations Center (EOC) in place of the Board of Supervisors’ meeting room, which is currently used for that purpose.

The Napa County Counsel has reviewed this final report on the Napa County Office of Emergency Services and the Presiding Judge of the Napa County Superior Court has certified that the report complies with Title 4 of the California Penal Code. The report has also been accepted and filed as a public document by the County Clerk.

Copies of this report are available for your review in the Napa City/County Library and online by following the link to Grand Jury at <http://www.napacourt.com/>

It is our pleasure and honor to serve you during the 2007-2008 Grand Jury tenure. We hope you find our report enlightening.

Respectfully submitted,  
The 2007-2008 Napa County Grand Jury

# NAPA COUNTY OFFICE OF EMERGENCY SERVICES

## SUMMARY

*“The preservation of life, property and the environment is an inherent responsibility of local, state and federal government.”* This statement signed by the Chairman of the Napa County Board of Supervisors, begins the Letters of Promulgation for both the Napa Operational Area Hazard Mitigation Plan dated 2004 (NAOHMP) and the Napa County Emergency Operations Plan dated 2001 (NCEOP). These plans evaluate potential emergency and disaster situations, the steps to mitigate their impact, and preparation to respond to a variety of emergency situations.

The 2007-2008 Napa County Grand Jury, as a function of its charge to provide the residents of Napa County with information regarding the City and County governments, conducted an investigation of agencies responsible for disaster preparedness and those agencies which will be required to act as “first responders” in an emergency situation. This report focuses on the Napa County Office of Emergency Services.

Continued emphasis on Community Emergency Response Team (C.E.R.T.) training and implementation of this training in the County schools is important to significantly improve the ability of the citizens to survive that initial period following a disaster when first responders are overwhelmed.

A significant disaster involving major population centers in the Bay Area could result in a large number of people being displaced. Napa County may be called upon to accept many of these refugees. Realistic planning is necessary to permit Napa County to accept and care for disaster refugees from other Bay Area communities.

The Grand Jury believes it is also necessary that long range planning include facilities that provide a dedicated Emergency Operations Center (EOC) in place of the Board of Supervisors’ meeting room, which is currently used for that purpose.

## BACKGROUND

Covering an area of 788 square miles, Napa County has a population of 133,522 according to Census Bureau 2006 estimates. In evaluating and planning for potential disasters requiring emergency response, the County has considered seismic hazards, fire, flooding, landslides, terrorism, man-made hazards including hazardous chemicals, traffic hazards, electromagnetic fields, and other threats including crop pests. For planning purposes these are grouped into four major areas: flooding, earthquake, wildland interface fires at the edge of wildland areas, chiefly affecting residential areas, terrorism and technological hazards including the glassy-winged sharpshooter, a vineyard pest that carries Pierce’s Disease, a condition that is deadly to grapevines. Recovery operations are broken down into two types: short-term and long-term.

The Napa County Hazard Analysis lists earthquakes as having the highest “severity” rating followed by floods and dam failure. The “frequency” rating is highest for thunderstorms followed by multiple casualty transportation incidents, floods, and hazardous material spill transportation accidents. Terrorism followed flood and dam failure with respect to severity rating, but the frequency rating was evaluated as low.

The Napa County Emergency Operations Plan states the County Executive Officer will direct the emergency management organization, serving as the Director of Emergency Services. The Director of Emergency Services is responsible for implementing the Emergency Operations Plan through the efforts of the Napa County’s Office of Emergency Services (OES). The Emergency Services Manager supervises the Napa County OES.

## **METHODOLOGY**

The Napa County Office of Emergency Services investigation by the 2007-2008 Grand Jury included the review of hazard mitigation and emergency response documents, interviews of the emergency management organization personnel, participation in a County-wide disaster drill as observers and observation of a disaster drill critique.

### **Documents Reviewed**

- Napa Operational Area Hazard Mitigation Plan (NOAHMP)
- Napa County Emergency Operations Plan (NCEOP)
- Napa County Terrorist Response Annex, NCEOP, Third Draft, November 6, 2003
- Response Protocol to Terrorist Incidents
- Sheriff’s Department Emergency Evacuation Operation Procedure, August 16, 2004
- The CEO Disaster Field Operations Guide
- Living in an “Act of God” Theme Park, Napa County Exercise Program
- Napa Valley Community Emergency Response Training (C.E.R.T.) website
- 2006-2007 Emergency Services Budget Data
- Safety portion of the Public Hearing Draft, Napa County General Plan, December 3, 2007

## **DISCUSSION**

### **Planning**

Detailed hazard identification and hazard mitigation planning has been developed by the County and municipal governments. The NAOHMP ranks each mitigation proposal, or project, as Priority 1, Priority 2, or Priority 3 based on community needs and concerns. In addition, a time horizon was established for each as near, mid or long. The cost of these proposals was estimated and presented as either a one-time cost (e.g., the cost of elevating secondary bridges) or as an annual cost (e.g., earthquake month education program). The following table summarizes the one-time and annual costs of mitigation

proposals by hazard for those proposals not completed at the time the NAOHMP was issued.

HAZARD	ESTIMATED ONE-TIME PROJECT COST	ESTIMATED ANNUAL PROJECT COST
Flood	\$32,000,000	0
Earthquake	\$27,500,000	\$35,000
Wildland Interface Fire	\$5,000,000	\$1,350,000
Technology	\$10,000,000	\$2,100,000
Total	\$74,500,000	\$3,485,000

The Napa County Operational Disaster Committee is responsible for reviewing and updating the mitigation plan, and mitigation goals are to be incorporated into future development of the Napa County General Plan. The draft Napa County General Plan refers to the NAOHMP.

The planned response to emergency situations associated with natural disasters, technological incidents, and national security emergencies which impact Napa County are identified in the NCEOP . This plan establishes an emergency management organization, identifies policies, responsibilities and procedures for the protection of Napa County residents and property, and establishes the operational concepts associated with field response to emergencies.

The Grand Jury had the opportunity to observe a county-wide emergency drill and to be present for the formal critique of this drill. Because this was a medical exercise, the County Health and Human Services (HSS) Department was designated as the operations center and was the observation point for the Grand Jury. The Grand Jury was impressed by conduct of this drill. As in most “drill” situations it is difficult to interject the sense of urgency and confusion that would exist under actual conditions. The Grand Jury was concerned over the lack of physical security at the HSS operations center demonstrated by uncontrolled access to the site and the absence of law enforcement personnel during the drill. The formal critique appeared to be an open and frank discussion of successes and shortcomings by the agencies involved.

### **Community Emergency Response Team (C.E.R.T.)**

The C.E.R.T. program is a Federal Emergency Management Agency (F.E.M.A) training program. The Napa Valley C.E.R.T. website states that “Following a major disaster, emergency responders in Napa County will not be able to meet the demand for response. Factors such as number of victims, communication failures & road blockages will prevent people from accessing the emergency services they have come to expect at a moment’s notice.” C.E.R.T. training is designed to prepare individual members of the community to be able to take care of themselves, their families and neighbors in the event of a major disaster. In the event of a disaster, the pool of C.E.R.T. volunteers would provide needed backup for first responders throughout the County.

C.E.R.T. training was instituted in Napa County in late 2000, by the Napa County Office of Emergency Services, the American Canyon Fire Protection District, the City of Calistoga Office of Emergency Services, the Napa Valley College and the City of Napa Fire Department. In 2002, F.E.M.A. provided a grant of \$47,638 to the Napa County Office of Emergency Services to create a viable county-wide emergency response training program. The initial F.E.M.A. goal was to have the County train 1200 County residents in the national C.E.R.T. curriculum. This goal was met in 2007. Napa County's 10-year goal is to train 2000 residents.

One of the mitigation goals identified in the NAOHMP (Action Item 4.3.2) is to institute school C.E.R.T. training. The goal is that either all middle school or all high school students in Napa County would be given the basic 20-hour C.E.R.T. training. The cost of this program is estimated at \$100,000 per year in the NAOHMP document. While acknowledging the increasing externally imposed curriculum demands placed on our schools, the Grand Jury believes this to be an important step in community disaster preparedness. One of the additional advantages of instituting a school program would be to mitigate language issues in bringing preparedness training into the home. Napa County does not yet have a bilingual C.E.R.T. training capability. One class was taught with a translator present, but this was not considered to be an effective method of reaching non-English speaking residents.

## **Emergency Water Supplies**

The 2007-2008 Grand Jury investigated the availability of emergency water supplies in Napa County. The Grand Jury's report on Municipal Fire Departments in Napa County addresses this issue with respect to fire fighting in the County's major cities. The Grand Jury learned that the problem of water supplies for drinking and sanitation falls more in area of distribution than in overall availability. The water system is extremely vulnerable to disruption due to earthquakes. The Napa Valley sits on an alluvial plain and at any time an earthquake could rupture pipelines which carry water from the reservoirs, holding tanks, and the North Bay Aqueduct system. Residents are encouraged to have available one gallon of water per day per person in the event of an emergency.

Outside of the municipal areas, approximately one-third of the households depend on wells to provide their water. Interviews indicated that there are approximately 25,000 wells in the County. The pumping of water from these wells relies on electrical power, so those households without emergency generators would be affected by a power outage.

## **The Napa Valley Lifeboat**

The Grand Jury inquired about emergency evacuation plans for Napa County in the event of a major disaster or terrorist attack. Napa County has evacuation plans. The NCEOP addresses situations that may require evacuations. The Napa County Sheriff's Department is charged with the responsibility of implementing evacuation orders. The Grand Jury has reviewed the Sheriff's Department Emergency Evacuation Operation Procedure.



During our investigation, the Grand Jury learned that there are a limited number of occurrences that would necessitate a major evacuation of the Napa Valley. A more likely scenario is that refugees from other Bay Area counties would come to the Napa Valley in the event of a major disaster. This concept envisions Napa County as a “lifeboat” for the Bay Area. The Katrina disaster and subsequent refugee problems provide a vivid example of what happens when a major population center is devastated by a natural disaster. The Grand Jury was advised that the organization and cooperation of agencies, mutual aid agreements between the County and municipal governments, and the structure of the emergency/disaster plan would be able to support the influx of people into the County.

The Grand Jury acknowledges that the Napa County Emergency Operations Plan and the various mutual aid agreements provide significant flexibility in responding to a variety of emergency/disaster scenarios. However, since the “lifeboat” response is considered to be a real possibility, and because of the significant impact it could have on this region, the Grand Jury believes that it is necessary for the Napa County OES to develop specific response plans to address this issue. Food and shelter, medical aid, transportation and increased law enforcement demands are just some of the issues that would be encountered if a major influx of refugees occurred.

## **Ongoing Needs**

The Grand Jury considered two major areas that would enhance the County’s mitigation and response capabilities: a dedicated emergency operations and training center, and the implementation of C.E.R.T. training in the public schools as noted above.

The County does not yet have a dedicated emergency operations and training center. The primary Napa County Emergency Operations Center (EOC) is located in the Board of Supervisors’ meeting room in the Administration Building at 1195 Third Street, Room 305, Napa. The first alternate Napa County EOC site is located at the Greenwood Ranch Fire Station at 1555 Airport Road near the Napa County Airport. While the Board of Supervisors’ meeting room is adequate, certainly for short term emergency situations, the Grand Jury believes, based on its investigation, that a dedicated EOC facility would provide a more suitable solution in the future. In addition, the acquisition of a dedicated EOC would provide an opportunity for the County to establish a single, unified Public Safety Answering Point (PSAP) facility as an integral part of the EOC. The PSAP would receive all county 911 calls and dispatch law enforcement, fire and medical response teams. The dedicated EOC site would not only provide a central operations site for all County agencies, but could be used as a training facility as well.

## **Communications**

Effective communications are an essential element of disaster response. Effective communications are also an essential element in the day-to-day response to law enforcement, fire, and medical emergencies. Because of the complexity of the technological and procedural aspects of County emergency communications, a separate Grand Jury report will be dedicated to this subject.

## **FINDINGS**

The 2007-2008 Napa County Grand Jury finds that:

1. C.E.R.T. training is a valuable asset in preparing the citizens of Napa County to deal with a major disaster.
2. Meeting the initial F.E.M.A. training goal and pursuing the County's 10-year, training goal was an important accomplishment.
3. Continued effort by the County to meet the 10- year, training goal will enhance community preparedness.
4. C.E.R.T. training in County high schools and middle schools, as recommended in The Napa Operational Area Hazard Mitigation Plan, and approved by the Board of Supervisors, would significantly advance this aspect of preparedness training.
5. The Napa County Emergency Operations Plan does not specifically address the possibility of a significant influx of refugees from other Bay Area major population centers as envisioned in the "lifeboat" scenario.
6. A dedicated County Emergency Operations Center would be a valuable asset for the county and should be considered in long term planning.

## **RECOMMENDATIONS**

The 2007-2008 Napa County Grand Jury recommends that:

1. C.E.R.T. training be implemented in Napa County high schools and middle schools..
2. The impact of a significant influx of Bay Area disaster refugees into Napa County be evaluated and specific plans prepared to deal with this eventuality; that the County Emergency Operations Plan be modified to incorporate this planning.
3. Long range facility planning for Napa County includes a dedicated Emergency Operations Center combined with an integrated County PSAP and training facilities.

## **REQUEST FOR RESPONSES**

The 2007-2008 Napa County Grand Jury requests the following responses:

1. The Napa County Office of Education respond to Recommendation 1.
2. The Superintendents of the Napa Valley Unified School District, St. Helena School District, Calistoga Unified School District, Angwin School District, Pope Valley School District respond to Recommendation 1.
3. The Director of Emergency Services respond to Recommendation 2.
4. The Napa County Board of Supervisors respond to Recommendation 3.

## **COMMENDATION**

The Napa County C.E.R.T. organization is to be commended for meeting its initial goal of 1,200 trained volunteers.

The County Office of Emergency Services is to be commended for an aggressive training program that emphasizes Countywide drills and fosters open and candid critique of drill results.

## **GLOSSARY**

**EOC**---Emergency Operations Center

**C.E.R.T.**---Community Emergency Response Team

**NAOHMP**---Napa Area Operational Hazard Mitigation Plan

**NCEOP**---Napa County Emergency Operations Plan

**OES**---Office of Emergency Services

**PSAP**---Public Safety Answering Point