

WHERE'S THE FIRE?

Stop Sending Fire Trucks to Medical Calls



GRAND JURY 2021-2022

WHERE’S THE FIRE?

Stop Sending Fire Trucks to Medical Calls

Table of Contents

SUMMARY	2
BACKGROUND	2
<i>The Evolution of Fire Departments Providing Medical Services.....</i>	<i>2</i>
<i>A Myriad of Acronyms: EMS, ALS, BLS, PAU.....</i>	<i>3</i>
REASON FOR THE STUDY	4
METHOD OF STUDY	5
INVESTIGATION AND ANALYSIS	5
<i>The Vast Majority of 911 Emergency Calls Routed to Fire Stations Are Medical in Nature .</i>	<i>5</i>
<i>Orange County Fire Departments and Personnel.....</i>	<i>6</i>
<i>Different Areas, Different Needs</i>	<i>6</i>
<i>Anatomy of a Medical Call: Dispatch to Response.....</i>	<i>7</i>
<i>Firefighter Fatigue</i>	<i>7</i>
<i>The Different Approaches to EMS Response in Orange County.....</i>	<i>8</i>
<i>Independent City Fire Departments</i>	<i>8</i>
<i>San Bernardino County Fire Protection District</i>	<i>9</i>
<i>Placentia Model for EMS – A New Approach.....</i>	<i>10</i>
<i>Orange County Fire Authority</i>	<i>11</i>
<i>Friction Between OCEMS and OCFA.....</i>	<i>13</i>
COMMENDATIONS	14
FINDINGS	14
RECOMMENDATIONS.....	15
RESPONSES	16
Responses Required	17
REFERENCES.....	19
GLOSSARY.....	21

WHERE'S THE FIRE?

Stop Sending Fire Trucks to Medical Calls



TYPES OF FIRE TRUCKS & FIRE ENGINES

Fire
Engines



Has a water pump and hoses. Typical tank capacity is 500-750 gallons with pump flow of 1500 GPM

Fire
Trucks



Carries fire fighters and tools, like ladders, extinguishers, floodlights, and rescue tools.

Wildland
Engines



Designed to traverse rough terrain and transport more water relative to their size.

Water
Tenders



Carries as much water as possible to the scene for another firefighting apparatus. Has weak pump and less hoses than fire engine.

Aerial
Trucks



Has an attached telescopic ladder to reach upper stories of buildings.

Quints



Has an aerial ladder, water tank (at least 300 gallons), and at least 40 cubic feet for equipment storage.

Tiller
Trucks



Has an aerial ladder that is mounted to the rear of a semi-trailer truck.

Heavy
Rescue
Trucks



Designed to carry a lot of equipment for traffic collisions, building collapses, and other disasters.

Paramedic
Unit



Similar to an ambulance and comes with advanced life support (ALS) equipment.

Fire
Command
Vehicles



Often driven by a fire chief. Equipped with lightbars, sirens, radios, and other equipment.

WHERE'S THE FIRE?

Stop Sending Fire Trucks to Medical Calls

SUMMARY

In Orange County, nearly 80 percent of all 911 calls to fire departments are for medical services. Efficient and effective responses to 911 calls are of utmost importance to every community. Even though 911 calls are categorized by severity, responses by most Orange County fire departments do not change accordingly. Current protocol requires sending multiple vehicles to the scene which involves not only additional personnel but also expensive fire equipment. This is the case even when an ambulance or rescue squad vehicle could provide all the necessary medical supplies and personnel. Sending a 36,000 to 60,000-pound fire engine or aerial ladder truck down residential streets for strictly medical calls is not only dangerous and costly, but it also results in unnecessary wear and tear on our streets.

Our Orange County firefighters perform an exemplary job under extremely stressful circumstances. They often work compulsory overtime hours. After considering the demands placed on our firefighters and the importance of optimizing efficiency while maintaining a high level of care and response time, the Orange County Grand Jury recommends the following: Fire departments implement a universal tiered response system to dispatch ambulances or rescue squad units to most medical calls rather than deploying larger fire equipment as the standard response.

While the Orange County Grand Jury sees distinct advantages to separating EMS from Fire response, we are not currently recommending privatization of medical services. We applaud the level of care provided by all paramedics, including firefighter paramedics. The Orange County Grand Jury does recommend, however, that the emergency medical services response model should change.

This investigation also revealed a breakdown in communication and trust between Orange County Emergency Medical Service (OCEMS) and OC Fire Chiefs, which includes Fire Chiefs of the Orange County Fire Authority (OCFA) and various city fire departments. Although their mandated responsibilities are clear, there is a mutual reluctance to acknowledge their respective spheres of authority, in particular the critical role of OCEMS as an independent regulatory body.

BACKGROUND

The Evolution of Fire Departments Providing Medical Services

Over 100 years ago, organized firefighting in America was established primarily to guard against loss of property. Prior to the 1970s, emergency medical calls were transferred to either private ambulance companies or hospital ambulance companies. By the 1970s, the number of calls for

WHERE'S THE FIRE?

Stop Sending Fire Trucks to Medical Calls

fire service declined due to the development and enforcement of stringent building codes and fire prevention systems. As a result, the role of local fire department has changed substantially.

In conjunction with the development of the 911 emergency call system, fire departments broadened their service models and capabilities, creating an all-hazards approach to emergency services delivery. The strategic location of firehouses throughout their service area made them a logical choice to respond to time critical calls. Fire departments now respond to any number of emergencies, including but not limited to traffic collisions, hazardous spills, cat rescues, and natural disasters as well as fires. However, 80 percent of all calls are for medical assistance.

An Explanation of Acronyms

This report looks at the ways in which fire departments respond to and provide emergency medical services (EMS). There are two levels of support systems in any kind of medical emergency: Basic Life Support and Advanced Life Support.

Basic Life Support (BLS) generally refers to the type of care that first-responders, healthcare providers, and public safety professionals provide to anyone who is experiencing a non-life-threatening medical event. BLS treatment is noninvasive and is usually performed by an Emergency Medical Technician (EMT).¹

Advanced Life Support (ALS) is a response to critical care patients who may require invasive procedures such as injections, intubation, or the administration of medication. Due to the more severe nature of the patient's condition, ALS calls require a response from a crew that includes ALS-certified responders, specifically paramedics. All paramedics, including firefighter paramedics, are required to undergo a higher level of training than EMTs. Paramedics are trained to administer drugs, intubate patients, and insert IVs. EMTs are not certified to perform these procedures.

California's EMS Act authorizes each county to develop an EMS program and to designate a local Licensed Emergency Medical Services Agency (LEMSA) that oversees the delivery of EMS within that geographic area. This level of governance allows for local control of emergency medical services. In Orange County, the LEMSAs are the Orange County Office of Emergency Medical Services (OCEMS) which operates under the Orange County Health Care Agency. OCEMS is responsible for the oversight of licensing all BLS and ALS responders, the management and inspection of privately owned ambulances, and the creation of response protocols including mass casualty incident response plans.

¹ California Emergency Medical Services "Scope of Practice," (November 2017).

WHERE'S THE FIRE?

Stop Sending Fire Trucks to Medical Calls

A Paramedic Assessment Unit (PAU) provides initial field paramedic assessment and interventions utilizing a minimum of one qualified paramedic and an EMT. A PAU may escort, monitor, and treat patients during transport to a hospital in accordance with that paramedic's provider agency policy.²

REASON FOR THE STUDY

Previous studies within Orange County and elsewhere have come to the same conclusion: there is an over-deployment of equipment and personnel for non-life-threatening emergency medical calls. For example, in 2014, the OCFA commissioned Emergency Services Consulting International to conduct a study on OCFA deployment. One of their recommendations is as follows:

To improve the overall response performance of the OCFA delivery system the number of units sent to most emergency medical incidents must be reduced. Criteria-based dispatch (CBD) protocols could be implemented allowing a single unit response to most emergency medical incidents.³

Furthermore, as part of the Anaheim Fire & Rescue 2015-2020 Strategic Plan, at page 25, it was recommended that a Community Care Response Unit be established as “an alternative and innovative response model that will deploy a single vehicle utilizing a nurse practitioner and paramedic to respond to non-urgent call requests in place of a standard paramedic engine/truck and ambulance unit response.”

Grand Juries in Orange County (2011-12) and Santa Clara County (2010-11) both delivered the same message in their reports: re-evaluate your response model to enable an appropriate EMS response, thereby reducing costs and equipment wear and tear.

Despite all these recommendations, the response deployment for medical calls remains substantially unchanged. This Grand Jury will revisit concerns about the expensive deployment of fire equipment and personnel for routine medical calls.

² OCEMS Agency Policy #330.70

³ Emergency Services Consulting International, *OCFA Standards of Coverage and Deployment Plan*, p. 147 (2014).

WHERE'S THE FIRE?

Stop Sending Fire Trucks to Medical Calls

METHOD OF STUDY

To understand the structure, staffing, and response models for various fire departments within California, as well as the relationship among the fire agencies and OCEMS, the Orange County Grand Jury engaged in the following:

- Reviewed statutes, articles, ordinances, reports, OCFA Memorandum of Understanding (MOU), and commissioned studies.
- Interviewed OCFA leadership, Fire Chiefs inside and outside of Orange County, City Managers, personnel from OCEMS, private ambulance company executives, and firefighter union leadership.
- Reviewed a large volume of material from various relevant websites.
- Reviewed OCFA Board of Directors and various City Council meeting minutes, agendas, and staff reports related to fire and medical services.
- Toured OCFA Headquarters and Training facility.
- Reviewed multiple written communications, deployment protocols, annual reports, and financial reports.

INVESTIGATION AND ANALYSIS

The Vast Majority of 911 Emergency Calls Routed to Fire Stations Are Medical in Nature

OCEMS data, as well as most fire department representatives interviewed, agree that of all 911 calls routed to a fire department for response, at least 80 percent are for EMS; the lowest figure provided was an estimated 75 percent. In areas with older demographics, the EMS percentage of medical calls as opposed to other emergencies is even higher. At least one fire department reported that nearly 90 percent of its calls are purely medical in nature. Furthermore, it has been estimated that up to 80 percent of those EMS calls can be classified as BLS.⁴

In an OCFA-commissioned comprehensive study, it was reported in 2018 that OCFA responded to 139,287 incidents of which 77.39 percent were EMS. Only 1.47 percent of the 911 calls routed to OCFA stations were dispatched as fire calls.⁵ The remaining 21.14 percent were classified as “other,” which included calls for persons in distress, smoke, odor problems, hazardous conditions, electrical wiring arcing, false alarms, children or pets locked in cars, and calls that

⁴ Emergency Consulting Services International, *OCFA Standards of Coverage and Deployment Plan*, p. 146 (2014); interviews with OCEMS staff and several Fire Chiefs.

⁵ Citygate, Associates, Inc., *Standards of Coverage Service Level Assessment OCFA*, p. 53 (June 30, 2020).

WHERE'S THE FIRE?

Stop Sending Fire Trucks to Medical Calls

were resolved prior to OCFA arrival. Consistent with this report, the OCFA Comprehensive Annual Financial Report for fiscal year ending June 30, 2021, provided statistics showing that out of the 152,289 emergency calls directed to OCFA, close to 75 percent were classified as EMS, while only 1.7 percent were considered fire calls.

Orange County Fire Departments and Personnel

Orange County cities are either part of the Orange County Fire Authority or have their own independent fire departments. Founded in 1995, the OCFA is a regional fire service agency that currently serves 25 cities in Orange County and all its unincorporated areas. The OCFA protects nearly two million residents with 77 fire stations located throughout Orange County. The nine Orange County cities that are not OCFA members each have a separate fire department and collectively protect approximately 1,187,000 residents. These independent cities include Anaheim, Brea/Fullerton, Costa Mesa, Fountain Valley, Huntington Beach, Laguna Beach, Newport Beach, Orange, and Placentia.

OCEMS has established a minimum requirement that one paramedic and one EMT respond to EMS calls. It is left up to the individual fire departments to determine how to deploy personnel and whether to exceed these minimum staff requirements. According to several OCEMS employees and its written protocols, one paramedic and one EMT are sufficient to provide appropriate care in response to an EMS call.

In its June 4, 2019 presentation “Consideration of Placentia Fire and Emergency Service,” the City of Placentia reported that out of 43 fire departments surveyed in Los Angeles, Orange, and Riverside Counties, 27 departments (67 percent) utilize a three-person engine crew. This was the most common standard among the three counties. San Bernardino County and several Orange County cities (including La Habra, Laguna Beach, and Huntington Beach) also allow three-person engine companies. OCFA and several other independent fire departments within Orange County staff their engines and trucks with four-person crews.

Different Areas, Different Needs

Based on local demographics, geographic features (for example: beaches vs. forest areas), and other community differences, the needs of various individual communities are radically different. Fire Station 22, located in Laguna Woods, serves a median resident age over 78 years old which results in a very high number of medical responses. Fire Station 2, located in Los Alamitos, operates within a very different demographic and a service territory that includes beaches, a large military installation, as well as a large retirement community. And Station 18 in Trabuco Canyon provides services to a wildland area as well as a ‘suburban’ area with a much lower age demographic than Fire Station 22. Different equipment and staff deployment models are

WHERE'S THE FIRE?

Stop Sending Fire Trucks to Medical Calls

warranted for each environment. The OCFA approach appears to be to add 'engines and trucks' to provide service, rather than taking a much more tailored approach. The trend within OCFA has been to remove Paramedic Squad units and replace them with Engines and Trucks.

Anatomy of a Medical Call: Dispatch to Response.

The goal of any emergency responder is to arrive on site quickly with the appropriate equipment and personnel needed to handle the emergency. The goal of a tiered dispatch system is to match the emergency with the appropriate level of response in terms of urgency, personnel, and equipment.

The most well-known of the tiered dispatch systems is the Clawson system of priority dispatch. Emergency medical dispatchers use call screening to determine what level of response is required by determining what Clawson refers to as the four commandments of medical dispatch: 1) chief complaint, 2) approximate age, 3) status of consciousness, and 4) status of breathing.

Several of the independent city departments are members of Metro Cities Fire Authority, also known as Metro Net Fire Dispatch or Metro Net, a joint powers agency that provides professional dispatch services for fire and emergency medical services. Metro Net uses a modified version of the Clawson model software to triage medical calls. Once it has been established that the call is for medical services, the dispatchers use a software package to walk through triage questions.

OCFA uses a severity model based loosely on the Clawson system for assessing medical emergency calls. Dispatch employees make a preliminary determination as to the nature and severity of the medical emergency through a series of carefully designed questions and computer applications. However, regardless of the preliminary assessment, a full ALS response is dispatched. This means that an engine or truck staffed with four personnel, often in partial or full firefighter turnout, is dispatched, at least two of whom are paramedic/firefighters. A transport ambulance with two EMT trained attendants is also dispatched, regardless of the classification of the medical emergency.

Firefighter Fatigue

Overworked and fatigued firefighters have been the topic of several articles and commentaries in counties throughout the State, and Orange County is no exception. There are staff shortages due to retirements. Firefighters have been forced to take extra shifts when voluntary coverage is not available. This can occur when firefighters are out ill, injured, on workers' compensation, or

WHERE'S THE FIRE?

Stop Sending Fire Trucks to Medical Calls

absent for personal reasons. Absences have been exacerbated by the COVID pandemic and the increased prevalence of wildfires. According to the OCFA, “The volume of vacant shifts is substantially exceeding the overtime our firefighters wish to work.”⁶ As publicly explained by OCFA Fire Chief Brian Fennessy, “Workplace burnout is an occupational phenomenon marked by exhaustion, negativity to one’s job, and reduced professional efficacy.”⁷

Compulsory overtime work, often referred to as “forced hiring,” is not new. While an increase in wildfires as well as the various reasons described above contribute to the firefighter shortage, routinely and unnecessarily sending out fire engines and trucks with the fire personnel required to staff that equipment is also a contributing factor. Using ambulances and other similar paramedic assessment units (PAUs) or paramedic squad units that are more efficient, nimble, and less personnel-intensive would substantially reduce the demand on firefighters leading to a reduction in work time and stress for on-duty firefighters. This is especially important when they are working compulsory overtime.

The Different Approaches to EMS Response in Orange County

Independent City Fire Departments

Several long-established cities in Orange County have independent fire departments. Examples include Anaheim Fire and Rescue, Huntington Beach Fire Department, Fullerton Fire Department, and Laguna Beach Fire Department. Most of these departments utilize Metro Net (described above) as their dispatcher. Even though medical priorities are evaluated by the Metro Net dispatcher, in most cases an engine or truck with firefighter/paramedics is dispatched to the incident, along with an EMT ambulance, regardless of the severity of the medical call. OCFA and Metro Net communicate when necessary.

To avoid competition and to ensure quality of service, OCEMS is also responsible for contracting qualified ambulance companies to service a particular geographic area, known as Exclusive Operating Areas (EOA) for patient transport to hospitals. However, some cities can own and operate ambulances that are not subject to the EOA ambulance agreements provided by OCEMS. Under California law, only cities that had their own ambulance services prior to 1980 (including cities served by OCFA) have the option of purchasing or contracting for their own ambulances. Those cities may also contract with private ambulance companies independently of OCEMS.

⁶ OC Register, Saavedra, T. and Licas, E., “OCFA Firefighters Burned Out By Overtime” (Oct. 29, 2021).

⁷ *Ibid.*

WHERE'S THE FIRE?

Stop Sending Fire Trucks to Medical Calls

Huntington Beach and Anaheim are two examples of this. Both cities deploy city-owned and operated ambulances which are based in fire stations; however, not all fire stations have ambulances. Where available, the ambulance rolls concurrently with the fire apparatus and typically arrives at the same time. The consensus among those interviewed indicated that this is a far better scenario in terms of overall response than relying on contracted private ambulances. There are also significant economic and long-term staffing advantages associated with this model. One example is that having EMTs working within the fire department serves as a pipeline for developing qualified firefighter paramedics. A disadvantage, however, is that city-owned ambulances are not subject to required inspection and approval by OCEMS, which the Orange County Grand Jury finds problematic.

Other benefits to cities able to operate their own ambulances are potential economic and service advantages for residents. In those cases, fees for ambulance services are payable to the city either by individuals or through medical insurance. Those fees typically offset the costs and, in some cases, provide marginal revenue. That excess revenue can be then provided to the overall city Fire/EMS department budgets to enhance services.

Most of the independent city fire agencies within Orange County offer a paramedic subscription service for residents and local businesses. An annual fee (around \$60 per household) provides “free” paramedic services to subscribers. Otherwise, there is a per-call fee charged which is not typically covered by health insurance companies. Huntington Beach, Fountain Valley, and Anaheim are examples of cities with subscription paramedic services. The fees cover many of the fire department costs for paramedic services within the jurisdiction.

San Bernardino County Fire Protection District

For comparison, San Bernardino County uses a staffing model like many other counties in the state. Engines are staffed with a crew of three: a captain, an engineer, an ALS paramedic/firefighter. The captain and engineer are BLS certified. Each engine is considered an ALS response unit. In some areas, depending on budget, there may be an additional paramedic squad unit staffed by an ALS certified paramedic/firefighter and a BLS certified firefighter. These units can participate in rescue activities and carry appropriate rescue equipment. Contract EMS ambulances are provided in parts of the service territory by a private provider while the other areas are covered by the San Bernardino County Fire Protection District Ambulance Operator Program which staffs ambulances with a single function paramedic as well as an EMT.

Dispatch is staffed by Emergency Medical Dispatch (EMD) certified personnel. Each medical call is screened to determine its category and severity. Based on that screening, appropriate response units are dispatched. Typically for a critical situation an engine and an ambulance will

WHERE'S THE FIRE?

Stop Sending Fire Trucks to Medical Calls

be dispatched Code 3 (lights and sirens). In situations that are deemed to be less critical, the response can be a single unit or a transfer to a nurse's hotline. Their current MOU allows for single paramedics on engines, squads, or aerial ladder trucks.

Placentia Model for EMS – A New Approach

Due to severe economic pressures, in 2019 the City of Placentia notified OCFA that they would be withdrawing from OCFA and forming their own fire department. To save money and become more efficient, Placentia separated the paramedic EMS response team from its Fire Department personnel and contracted with a private ambulance company to deliver EMS paramedic services.

Placentia also decided to keep dispatching responsibilities within its Police Department which receives all 911 calls. The police dispatcher determines whether the police, the Fire Department, a private ambulance EMS unit, or some combination thereof (as in the case of a serious traffic accident) should be dispatched to respond. Based on preliminary reports, the system is efficient and results in faster EMS responses, especially for coronary and stroke cases.⁸ This is attributed in large part to the fact that “turnout time” for fire equipment and firefighter personnel (listed at over three minutes and 30 seconds for OCFA) is essentially eliminated with this model. Preliminary statistics show that not only have City costs have gone down, the time taken to appear on site for an EMS call also has been reduced by four minutes, from 9.5 to 5.5.⁹

Despite the positive results and cost savings, Placentia has withstood considerable criticism as well as a lack of cooperation from OCFA and its union.¹⁰ The cost savings could be partially attributed to several factors: its very small geographical area; fewer wildland fires to contend with; no fast-water rescue requirements; and the City's firefighters do not earn the same salary or benefits that OCFA firefighters enjoy. From a cost perspective, why should they be charged by OCFA for services they do not require? Placentia should receive credit for attempting (and in many ways delivering) a new and better approach to EMS.

⁸ City of Placentia Fire and Life Safety Department Inaugural Report FY 2020-21, pps. 8-9.

⁹ *Ibid.*

¹⁰ See, e.g., OCFA Board Meeting, May 26, 2020, comments by Craig Green; Fullerton Observer, *Council and Fire Dept. Clash Over Agreement with Placentia* (June 24, 2020); California Policy Center, Ring, E. *Firefighting in Orange County, Part 3 - Placentia's War for Independence* (July 1, 2020); OC Register, Robinson, A., *Placentia Alleges Retaliation, 'Unprofessional Behavior' After Vote to Quit OCFA* (June 28, 2019); Correspondence between OCFA, OCEMS and Placentia Fire Dept.; Interviews.

WHERE'S THE FIRE?

Stop Sending Fire Trucks to Medical Calls

Orange County Fire Authority

As noted above, OCFA makes an initial determination as to the nature and severity of the medical emergency. Regardless of the preliminary assessment, a full ALS response is dispatched. This means that an engine or truck company, staffed with at least two paramedic/firefighters, two EMT trained firefighters, and a transport ambulance with two EMT trained attendants is sent to the scene. While this approach means less time is spent with the caller before the dispatch for services occurs, it also results in a minimum of six people and two vehicles being dispatched for all EMS calls, even for minor medical events. The OCFA MOU with the firefighter's union specifies a minimum of two paramedic/firefighters on each ALS unit.

OCEMS agrees that a single PAU unit staffed with a paramedic and EMT provides the service needed for most types of emergency medical calls if the requests for service are properly triaged and dispatched based on medical priority.¹¹

In a 2014 OCFA-commissioned report,¹² recommendations included the following:

Formally establish "criteria based" dispatch protocols to allow a single unit response to those incidents triaged as non-life threatening. Staff the majority of fire engines with three personnel, one of whom is a paramedic; in areas considered hard to cover, or those lacking an effective response force coverage (for example areas covered by stations 40 and 53), staff fire engines with four persons, two being paramedics. Response to a life-threatening incident would be two units.

For nonlife-threatening incidents, any response unit can be dispatched. If for example, a squad and engine are both available and the same distance from the incident the squad can be dispatched preserving the engine in the event of a fire incident.

Because over 75 percent of all fire dispatch calls are for medical emergencies, dispatching an ALS response with a truck or engine to every emergency medical call does not make sense and results in a consistent over-deployment of equipment and personnel.

Avoiding the dispatch of fire engines and trucks offers an additional advantage. If one (or both) of the responding firefighter/paramedics must accompany the patient in the ambulance to the hospital, then their engine typically follows the ambulance to the hospital. The fire engine and its crew must wait until the hospital staff takes charge of the patient and releases the paramedic to

¹¹ OCEMS Policy #330.70

¹² Emergency Services Consulting, *OCFA Standards of Coverage and Deployment Plan*, pp. 146-47 (2014).

WHERE'S THE FIRE?

Stop Sending Fire Trucks to Medical Calls

rejoin their unit. The time the engine or truck is out of service waiting for the firefighter paramedic to be released is referred to as “wall time.” COVID-19 has made wall time longer as many emergency rooms have not been able to deal with the high volumes of patients, resulting in much longer wait times and potential degradation of service.

Within OCFA’s jurisdiction, there are at least two geographic areas with even higher medical emergency call volumes. One such area is Laguna Woods which is served by OCFA Station 22. Laguna Woods comprises 3.1 square miles and is home to approximately 16,000 residents with a median age of over 78. Notwithstanding its size, Laguna Woods has the same number of calls as the City of Tustin, which consists of a service territory of 11.1 square miles and a population of approximately 80,000. The table below depicts the high volume of calls and the proportion of medical calls between the two areas with the overall same number of calls.¹³

CITY	POPULATION	SIZE (Sq Miles)	# EMS CALLS	# FIRE CALLS	# TOTAL CALLS
Laguna Woods	16,000	3.31	4,876	24	5,000
Tustin	80,000	11.14	4,062	95	5,395

CITY	% EMS CALLS/TOTAL	CALL/POP	EMS CALLS/POP	% FIRE CALLS/POP	% EMS CALLS/SIZE
Laguna Woods	97.52%	31.25%	30.48%	0.48%	2.07%
Tustin	75.29%	6.74%	5.08%	1.76%	1.39%

While averaging just two fire calls each month, Laguna Woods is equipped with two Type 1 Engines and one aerial truck. Given the size and weight of these large fire vehicles, there is unnecessary wear and tear on the streets of Laguna Woods when Station 22 equipment is sent out on such a high volume of simple medical calls. Replacement of one of the two Type 1 Engines assigned to Station 22 with two paramedic squad vehicles would save the expense of wear and tear, maintenance, equipment, and operating costs. It would also result in faster response times since the time it takes for fire personnel to gear up and get the larger trucks to move out is at

¹³ OCFA Comprehensive Annual Financial Report, FY ending June 30, 2021, pp. 135, 142-43.

WHERE'S THE FIRE?

Stop Sending Fire Trucks to Medical Calls

least two minutes longer than for the smaller vehicles to roll out.¹⁴ Although that approach adds a fourth paramedic unit to the service area, causing a shift in assignments, additional staffing would not be necessary. Additionally, the cost of two fully equipped paramedic squad vehicles is less than the cost of a single Type 1 Engine. The typical cost for a fully equipped Type 1 engine is between \$750,000 and \$1,000,000 as opposed to the typical cost for a fully equipped Paramedic Squad vehicle (based on a Ford F-350 Super Duty Diesel chassis) which is under \$200,000.¹⁵

Friction Between OCEMS and OCFA

Fractures between OCEMS, the OCFA, and independent city Fire Chiefs are apparent. This is exemplified in a letter written to OCEMS from the Fire Chiefs that pointed to OCEMS's "offensive" action in implementing policy changes without prior notice or collaboration. This complaint was made despite the Fire Chiefs' specific acknowledgment in the same letter that a joint advisory committee had been formed and had been discussing the issues.¹⁶

Despite the OC Fire Chiefs' complaint about OCEMS overstepping its authority, the only example provided to the Orange County Grand Jury was the emergency action taken by OCEMS in 2021 when hospitals were backed up. This caused long wait-times for first responders who transported patients to the emergency room and kept them unavailable to respond to other emergencies. In response, OCEMS introduced an emergency measure which allowed EMT and paramedic transporters to leave patients in the hands of the hospital on a portable cot provided by the ambulance squad.¹⁷ Although the change addressed the fire departments' problem of extended "wall time" for fire paramedics, it resulted in a strong rebuke from Fire Chiefs for failing to provide adequate notice to them or provide an opportunity to collaborate. Although OCEMS could possibly have provided better notice to OCFA and the independent Fire Chiefs, the OCEMS appeared to be working in the best interest of all parties involved. This was a fact that was, at best, only begrudgingly acknowledged by a few OCFA union representatives and other fire agency personnel.

Tensions have been further exacerbated by COVID and the demand placed on ambulances that, reportedly, have failed to respond to calls in a timely manner. The extent of the problem is debatable. However, the OCFA Fire Chief took the problem into his own hands. In December 2021, the OCFA Chief directed that all EMS responses be classified as Code 3 to speed up ambulance response times. A

¹⁴ Citygate Associates, Inc., *Standards of Coverage Service Level Assessment* OCFA, p. 8 (June 2020).

¹⁵ OCFA Comprehensive Annual Financial Report, FY ending June 30, 2021, p. 148.

¹⁶ Letter from OC Fire Chiefs Association to OCEMS, November 8, 2021.

¹⁷ OCEMS Temporary Suspension of Diversion and Actions to Reduce APOTs, December 29, 2021.

WHERE'S THE FIRE?

Stop Sending Fire Trucks to Medical Calls

Code 3 response requires lights and sirens.¹⁸ Code 3 responses have been shown to pose a significantly greater danger to the public and emergency personnel.¹⁹ The Orange County Grand Jury is concerned that this OCFA directive and the power struggles existing between the Fire Chiefs Association and OCEMS may be viewed as self-serving rather than serving the best interests of the public.

Similar acrimony was evident when OCEMS received pointed criticism for taking a position on 2021 proposed legislation that was pending in Sacramento that directly affected OCEMS without conferring with the OCFA or independent Fire Chiefs. While Orange County fire leadership is free to disagree with the position taken by OCEMS, OCEMS had no obligation to consult with them prior to advocating for itself in Sacramento.

There is consensus from both sides that the problems between these entities have escalated over the past year; however, there have been some recent signs of better collaboration and communication.

COMMENDATIONS

- Fire department personnel for their professional service and steadfast concern for public safety.
- All Emergency Medical Services personnel for their tireless efforts on behalf of Orange County residents.
- Interviewees for their cooperation and time spent with the Orange County Grand Jury to explore these issues.
- Special commendation to the City of Placentia for innovation in the face of concerted opposition.

FINDINGS

F1 Despite fire departments throughout Orange County having evolved into emergency medical departments, most have not updated their emergency response protocols accordingly, but have simply absorbed emergency medical responses into their existing fire response models.

¹⁸ Correspondence from OCFA to OC Public Health, cc: County Executive Officer, January 25, 2022.

¹⁹ Joint Statement on Lights & Siren Vehicle Operations on Emergency Medical Services (EMS) Responses February 14, 2022.

WHERE'S THE FIRE?

Stop Sending Fire Trucks to Medical Calls

- F2 Despite use of a tiered dispatch system, OCFA's deployment of resources for medical responses are the same for nearly all calls, resulting in unnecessary wear and tear on expensive fire-fighting equipment and public infrastructure.
- F3 ALS staffed ambulances or smaller squad vehicles are often the most appropriate response to medical calls and do not compromise the quality of medical care.
- F4 There has been a breakdown of communication and trust between OCEMS and Orange County Fire Chiefs.
- F5 Over-deployment of firefighters for medical calls contributes to the current climate of forced hiring and firefighter fatigue.
- F6 Code 3 response is over utilized by OCFA, unnecessarily putting the responders and public at risk.
- F7 Since the outbreak of the COVID pandemic, there has been an emergency medical personnel shortage. The pandemic also has contributed to longer wait times at hospitals resulting in firefighter personnel being out of service for longer periods.
- F8 There are specific areas within Orange County, such as Laguna Woods and Seal Beach, that have an extremely high percentage of medical calls which, under the current model, results in the stations servicing those communities to require two engines.
- F9 OCEMS has the authority and responsibility to inspect all for-profit ambulances operating in Orange County; however, publicly owned ambulances are not automatically subject to OCEMS oversight.
- F10 Placentia's changes to the emergency medical response protocols after leaving OCFA have resulted in improved medical call response times.

RECOMMENDATIONS

- R1 As recommended in the 2012 and 2014 OCFA Standards of Coverage and Deployment Plans, as well as other studies, the Grand Jury recommends that, by 2024, all Orange County fire agencies utilize criteria-based dispatch protocols and send a single unit response to those incidents triaged as non-life-threatening (BLS). F1, F2, F5
- R2 By 2024, OCFA should station a paramedic squad vehicle, which is more nimble and less costly to operate, in place of a second engine in stations with high volumes of medical calls. F8
- R3 OCFA should immediately stop the practice of requesting Code 3 responses on all non-life threatening (BLS) calls. F6
- R4 While OCEMS should recognize how certain policy changes may pose operational challenges to emergency responders in the field, fire leadership should recognize and respect the independent oversight authority and expertise of OCEMS. F4

WHERE'S THE FIRE?

Stop Sending Fire Trucks to Medical Calls

- R5 Departments with publicly owned ambulances should allow OCEMS to inspect their ambulances for compliance with State EMS guidelines and adopt OCEMS recommendations. F9

RESPONSES

California Penal Code Section 933 requires the governing body of any public agency which the Grand Jury has reviewed, and about which it has issued a final report, to comment to the Presiding Judge of the Superior Court on the findings and recommendations pertaining to matters under the control of the governing body. Such comment shall be made *no later than 90 days* after the Grand Jury publishes its report (filed with the Clerk of the Court). Additionally, in the case of a report containing findings and recommendations pertaining to a department or agency headed by an elected County official (e.g. District Attorney, Sheriff, etc.), such elected County official shall comment on the findings and recommendations pertaining to the matters under that elected official's control *within 60 days* to the Presiding Judge with an information copy sent to the Board of Supervisors.

Furthermore, California Penal Code Section 933.05 specifies the manner in which such comment(s) are to be made as follows:

(a) As to each Grand Jury finding, the responding person or entity shall indicate one of the following:

- (1) The respondent agrees with the finding.
- (2) The respondent disagrees wholly or partially with the finding; in which case the response shall specify the portion of the finding that is disputed and shall include an explanation of the reasons therefor.

(b) As to each Grand Jury recommendation, the responding person or entity shall report one of the following actions:

- (1) The recommendation has been implemented, with a summary regarding the implemented action.
- (2) The recommendation has not yet been implemented, but will be implemented in the future, with a time frame for implementation.
- (3) The recommendation requires further analysis, with an explanation and the scope and parameters of an analysis or study, and a time frame for the matter to be prepared for

WHERE'S THE FIRE?

Stop Sending Fire Trucks to Medical Calls

discussion by the officer or head of the agency or department being investigated or reviewed, including the governing body of the public agency when applicable. This time frame shall not exceed six months from the date of publication of the Grand Jury report.

- (4) The recommendation will not be implemented because it is not warranted or is not reasonable, with an explanation therefor.

(c) If a finding or recommendation of the Grand Jury addresses budgetary or personnel matters of a county agency or department headed by an elected officer, both the agency or department head and the Board of Supervisors shall respond if requested by the Grand Jury, but the response of the Board of Supervisors shall address only those budgetary /or personnel matters over which it has some decision-making authority. The response of the elected agency or department head shall address all aspects of the findings or recommendations affecting his or her agency or department.

Responses Required

Comments to the Presiding Judge of the Superior Court in compliance with Penal Code §933.05 are required from:

90 Day Response Required	F1	F2	F3	F4	F5	F6	F7	F8	F9	F10
OCFA Board of Directors	X	X	X	X	X	X		X	X	

90 Day Response Required	R1	R2	R3	R4	R5
OCFA Board of Directors	X	X	X	X	X

90 Day Response Required	F1	F2	F3	F4	F5	F6	F7	F8	F9	F10
County of Orange Board of Supervisors			X	X					X	

90 Day Response Required	R1	R2	R3	R4	R5
County of Orange Board of Supervisors					X

90 Day Response Required	F1	F2	F3	F4	F5	F6	F7	F8	F9	F10
City Councils of Cities of Anaheim, Costa Mesa, Fountain Valley, Fullerton, Huntington Beach, Laguna Beach, Newport Beach, and Orange	X		X	X	X				X	

WHERE'S THE FIRE?

Stop Sending Fire Trucks to Medical Calls

90 Day Response Required	R1	R2	R3	R4	R5
City Councils of Cities of Anaheim, Costa Mesa, Fountain Valley, Fullerton, Huntington Beach, Laguna Beach, Newport Beach, and Orange	X			X	X

90 Day Response Required	F1	F2	F3	F4	F5	F6	F7	F8	F9	F10
City of Placentia City Council	X		X	X	X				X	X

90 Day Response Required	R1	R2	R3	R4	R5
City of Placentia City Council	X			X	X

Responses Requested

Comments to the Presiding Judge of the Superior Court in compliance with Penal Code §933.05 are requested from:

60 Day Response Requested	F1	F2	F3	F4	F5	F6	F7	F8	F9	F10
Fire Chiefs for Cities of Anaheim, Costa Mesa, Fountain Valley, Fullerton, Huntington Beach, Laguna Beach, Newport Beach, and Orange	X		X	X	X				X	

60 Day Response Requested	R1	R2	R3	R4	R5
Fire Chiefs for Cities of Anaheim, Costa Mesa, Fountain Valley, Fullerton, Huntington Beach, Laguna Beach, Newport Beach, and Orange	X			X	X

60 Day Response Requested	F1	F2	F3	F4	F5	F6	F7	F8	F9	F10
City of Placentia Fire Chief	X		X	X	X				X	X

60 Day Response Requested	R1	R2	R3	R4	R5
City of Placentia Fire Chief	X			X	X

60 Day Response Requested	F1	F2	F3	F4	F5	F6	F7	F8	F9	F10
OCEMS Director			X	X					X	

WHERE'S THE FIRE?

Stop Sending Fire Trucks to Medical Calls

60 Day Response Requested	R1	R2	R3	R4	R5
OCEMS Director					X

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WHERE'S THE FIRE?

Stop Sending Fire Trucks to Medical Calls

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WHERE'S THE FIRE?

Stop Sending Fire Trucks to Medical Calls

GLOSSARY

ALS	Advanced Life Support
ALL HAZARD	Emergencies, including but not limited to traffic collisions, hazardous spills, cat rescues, natural disasters, house and car fires
BLS	Basic Life Support
CBD	Criteria-based dispatch
CODE 3	The use of sirens and lights on emergency vehicles
EMD	Emergency Medical Dispatch
EMS	Emergency Medical Service
EMT	Emergency Medical Technician
EOA	Exclusive Operation Area
LEMSA	Local Emergency Services Agency – California's EMS Act authorizes each county to develop an EMS program and to designate a local EMS agency (LEMSA) for local control of emergency medical services
METRO NET	Joint Powers Authority agency that provides professional dispatch services for fire and medical services
MOU	Memorandum of Understanding
OCEMS	Orange County Emergency Service-Certifies Ambulances, Paramedics and EMTs

WHERE'S THE FIRE?

Stop Sending Fire Trucks to Medical Calls

OCFA	Orange County Fire Authority
OCGJ	Orange County Grand Jury
PAU	Paramedic Assessment Unit
PM	Paramedic
SEVERITY MODEL	A ranking, either alpha or numerical, on how critical the medical emergency.
TIERED	Calls are categorized by severity
TURNOUT TIME	The time from the dispatch call and change their status to responding
TURNOUT GEAR	Fire Fighters personal protective gear
TYPE 1 ENGINE	Designed for structural firefighting. It will typically include a pump that operates at 1000 gpm, a 400 gal/tank, 1200 ft. 2 1/2" hose, 400 ft. 1 1/2" hose, 200 ft. 1" hose, 20 + feet of ladder, a 500 gpm Master Stream, and minimum staffing of four firefighters. Some cities utilize Type 1 fire engines with only three firefighters due to budget or other staffing issues.
WALL TIME	The time the Paramedic or fire fighter spends at the hospital after delivering a patient