TWAIN HARTE COMMUNITY SERVICES DISTRICT

FIRE DIVISION ANNUAL REPORT 2018



Twain Harte Fire's Engine 723 responding to the Butte County Camp Fire



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Chief's Message

2018 was a year of implementation of several new Twain Harte Fire programs and constant refinement of existing programs. I am once again immensely proud of the dedication, commitment and work ethic demonstrated by the THFD staff, volunteers and CERT members. As a regional leader in training, preparedness and professional emergency response, THFD leads by example and continues to demonstrate our commitment to protecting our community. Throughout 2018, THFD and CERT have completed numerous tasks, trainings and important projects thereby improving our ability to provide exceptional service and protection to the Twain Harte community, Tuolumne County and the entire State of California. THFD and CERT have once again established another first in Tuolumne County as the only fire department to implement an Unmanned Aerial Vehicle Program (UAV) and be granted a Public Safety Commercial Certificate of Authorization from the Federal Aviation Administration to fly public safety missions. The embracement and utilization of the UAV technology has significantly enhanced our situational awareness during emergency incidents, assists in documenting training used in critiques and supports our Fire Prevention Program by providing detailed imagery of hazards in our District. The power of this program is astonishing and serves as a binding agent between the THFD and CERT as the two organizations deploy this resource to the benefit of the entire county.



Another significant additional to the capabilities of the THFD in 2018 is the acquisition and placing in service a Type One Tactical Water Tender, WT-721. This apparatus was purchased at reduced price and enhanced to meet the specifications of a tactical tender having never previously run a single call. THFD was able to secure a 2016 apparatus and customize it to perform in the environment of Tuolumne County. WT-721 augments the overall pump capacity and rapid water delivery capabilities of THFD to better protect the community of Twain Harte.

THFD is making an impact at the

community, county and state level. We are constantly improving and maintaining our reputation as a solid customer service based organization and a leader in emergency services delivery. With the dedication of the THFD staff, Volunteer Interns, CERT and support of the community, THFD has built a foundation from which we can continue to grow and improve in the coming year. I want to express my sincere gratitude to the Board of Directors, the General Manager, The staff of the Twain Harte Community Services District and the Twain Harte community for once again providing me with the honor to serve as the Fire Chief of Twain Harte Fire.

Significant Events

Listed below is a summary of THFD's significant accomplishments and progress that occurred in 2018:

- Water Tender 721 a Type 1 Tactical Tender was acquired and placed in service
- Three UAVs placed in service at THFD with varying capabilities and mission specific performance
- Approval for one additional Volunteer Intern on each shift
- Delivery of numerous skill based workshops and training to enhance the members of the THFD and surrounding cooperators in performance of duties related to emergency response



- All regulatory and compliance testing of fleet, emergency equipment and personal protective equipment was completed
- CERT UAV Unit created and training on flight missions and deployment protocols established
- Continuation of training exchange agreements with regional agencies providing opportunities for THFD personnel to receive complex training not available in Tuolumne County
- THFD assisted the greater fire service with superior training delivery across the state utilizing the ventilation prop trailer and THFD staff who are State Fire Training Certified Instructors
- Another successful community based Christmas Parade and pictures with Santa hosted at the Firehouse open to the public
- Graduation of another CERT Basic Training Class
- Fire Captain Nathaniel successfully became a Registered State Fire Training Instructor

- Twain Harte Area CERT delivered multiple trainings for the community to help increase individual preparedness
- Numerous improvements to the Firehouse were completed making the building safer and more efficient
- THFD continued participation in the Fire and First Responder Study with the intent of improving the overall performance of emergency services in Tuolumne County
- Continued assistance and direction was provided to the Strawberry Volunteer Fire Department through the administrative agreement
- THFD sponsored two families for a total of 9 children during Christmas receiving donations to purchase

gifts and deliver them along with a meal as a surprise on Christmas Day.

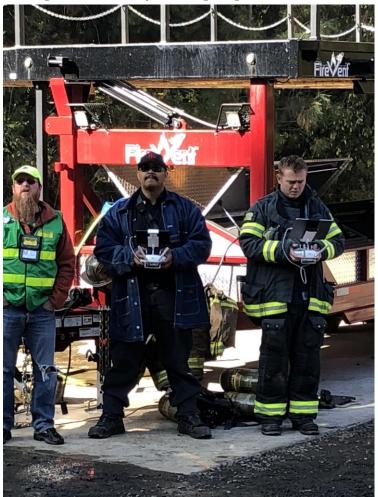
- Grant application submitted to FEMA for a replacement of the existing Tuolumne County Firefighter Rehabilitation Vehicle to be operated by THFD/CERT
- Numerous improvements made of live fire training facilities to increase safety and realism



- Tablet based emergency response enhancing equipment installed in every THFD apparatus as a part of a Department of Homeland Security Grant
- A generous grant awarded to the Twain Harte Volunteer Firefighter Association from PG&E for the acquisition of two UAVs
- New GIS application was implemented and all fire prevention data migrated to enhance data management and recall while at emergencies
- Numerous CA Mutual aid assignments were filled with excellent experience and training opportunities for participating THFD personnel

Training

In the training year of 2018, THFD continued to be a local and regional leader in the provision of hyper-realistic training. This exceptional training opportunity was not only realized by THFD staff and volunteers, but also by local and regional cooperators. THFD personnel collectively participated in over three thousand hours of training from a diversity of firefighting, technical rescue, emergency medical services and UAV systems topics.



THFD continued to collaborate with Fire Nuggets in hosting premier instructors from all over the USA delivering high caliber training right here at our THFD facility. THFD staff continued our dedication to our Interns by providing training and experience development on a daily basis and the opportunity to participate in statewide wildland responses. Collectively THFD staff, Interns and Reserves completed all of the State and Federal mandated training during 2018. One of the major achievements for the THFD Training Division in 2018 was integration of THFD and the CERT UAV Unit in cooperative flight training. Through this integration both THFD and CERT are more capable of providing UAV assets when responding to community emergencies or requests from other agencies in the county. The THFD Training Program continues to be one of the major reasons for students of the Columbia College Fire Academy to choose to voluntarily participate in our Intern Program. These students are exposed to the THFD training program and facilities numerous times during their academy training and s witness firsthand the passion, dedication of THFD instructors but also

the quality of our response and training equipment. THFD maintained and exercised the standing training agreement with Chabot College Fire Academy by continuing to provide instructors for their live fire training which provides opportunities for THFD Interns to participate and assist. Through this cooperative arrangement, a THFD cadre delivers live fire and manipulative skills training for the Chabot Fire Academy and gives THFD the opportunity to showcase the Intern and Reserve Programs available at THFD.

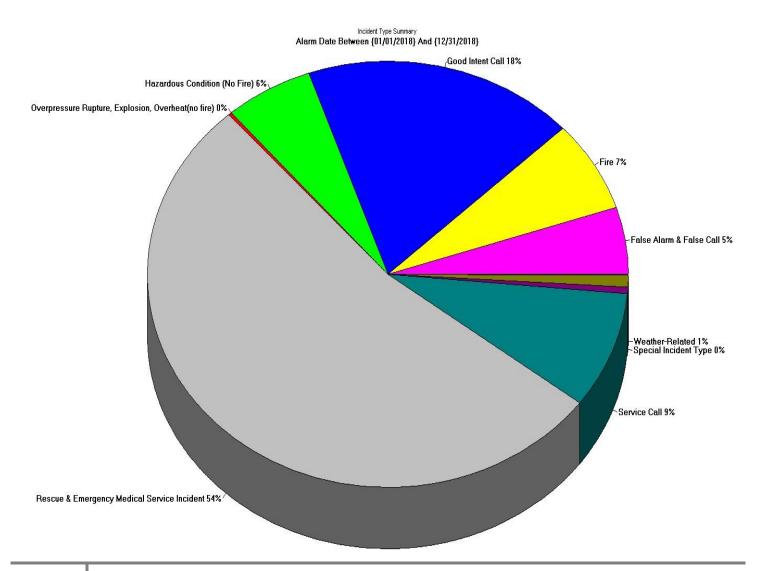
Training on a consistent and daily basis is of critical importance to the safety and success of a fire department. In 2018, THFD displayed our commitment to the importance of, participation in, and delivery of critical firefighter training by creating an open environment and providing the only live fire capable training facility in Tuolumne County.

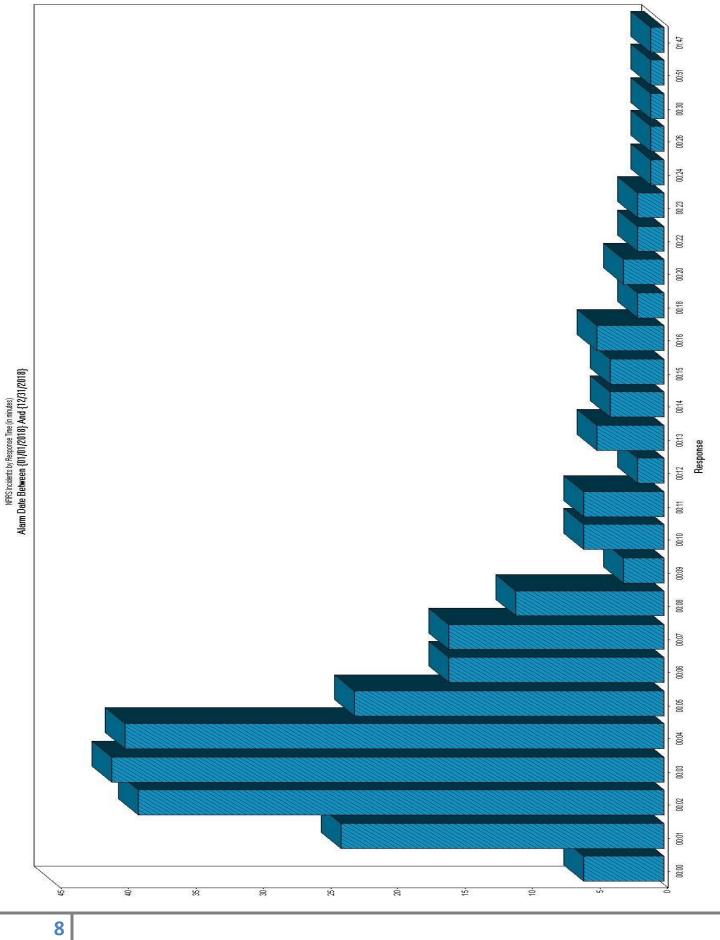
Annual Call Statistics

For the year of 2018, THFD responded to 316 calls for service which is an approximate 19.5% decrease over 2017. The decrease is attributed to an improvement in the Tuolumne County Response plans which included a more appropriate number of responding resources to a call for service. In 2018 72% of THFD calls for service were located in the Twain Harte District.

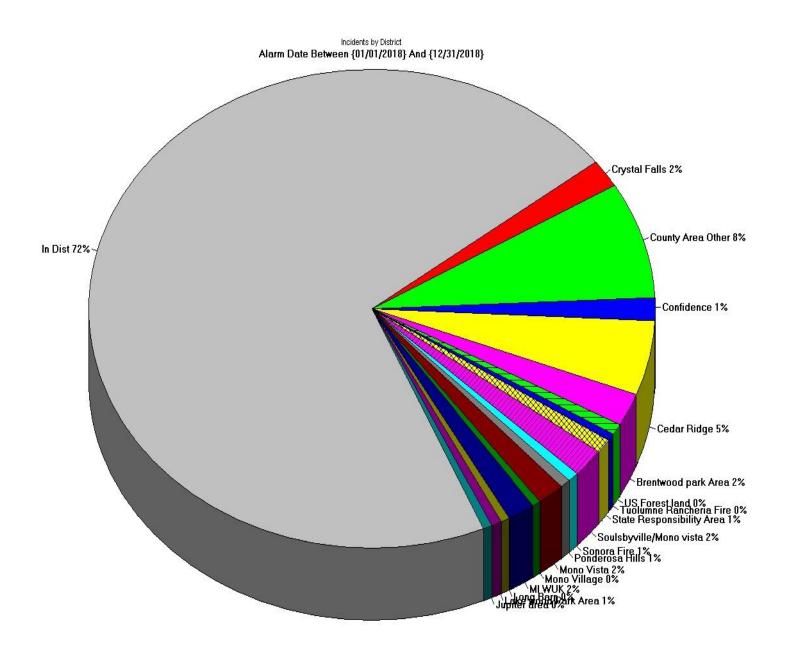
The breakdown by call type is depicted in the graph below with 54% of the THFD's emergency calls being of a medical nature for a 10% increase over 2017. The graph on page 8 displays a majority of our response times are in the 2-5 minute range which is typical standards in any major metropolitan area. The last graph depicts the locations that THFD responded, by district and surrounding areas. The included annual summary table, starting on page 10, displays the percentages of incident types and specific response categorization.

2018 Incident Type Summary Chart





2018 Incident Location Summary Chart



Twain Harte Fire

Incident Type Report (Summary)

Alarm Date Between {01/01/2018} And {12/31/2018}

Incident Type	Count	Pct of Incidents	Total Est Loss	Pct of Losses
1 Fire				
100 Fire, Other	1	0.32%	\$356 , 000	39.46%
111 Building fire	3	0.95%	\$500 , 000	55.42%
112 Fires in structure other than in a building	1	0.32%	\$0	0.00%
114 Chimney or flue fire, confined to chimney of		0.95%	\$4,000	0.44%
118 Trash or rubbish fire, contained	1	0.32%	\$1,100	0.12%
131 Passenger vehicle fire	3	0.95%	\$41,000	4.54%
140 Natural vegetation fire, Other	2	0.63%	\$0	0.00%
141 Forest, woods or wildland fire	3	0.95%	\$0	0.00%
142 Brush or brush-and-grass mixture fire	1	0.32%	\$0	0.00%
143 Grass fire	1	0.32%	\$2	0.00%
150 Outside rubbish fire, Other	1	0.32%	\$0	0.00%
151 Outside rubbish, trash or waste fire	1	0.32%	\$0	0.00%
<pre>2 Overpressure Rupture, Explosion, Overheat(no fi 243 Fireworks explosion (no fire)</pre>	1	0.32%	\$0	0.00%
	22	6.96%	\$902,102	99.99%
	1	0.32%	\$0	0.00%
3 Rescue & Emergency Medical Service Incident				
300 Rescue, EMS incident, other	1	0.32%	\$0	0.00%
311 Medical assist, assist EMS crew	1	0.32%	\$0	0.00%
320 Emergency medical service, other	1	0.32%	\$0	0.00%
321 EMS call, excluding vehicle accident with i	_	45.57%	\$0	0.00%
322 Motor vehicle accident with injuries	11	3.48%	\$0	0.00%
324 Motor Vehicle Accident with no injuries	12	3.80%	\$0	0.00%
	170	53.80%	\$0	0.00%
4 Hazardous Condition (No Fire)				
400 Hazardous condition, Other	2	0.63%	\$0	0.00%
412 Gas leak (natural gas or LPG)	3	0.95%	\$0	0.00%
444 Power line down	10	3.16%	\$0	0.00%
445 Arcing, shorted electrical equipment	3	0.95%	\$0	0.00%
	18	5.70%	\$0	0.00%

		Pct of	Total	Pct of
Incident Type	Count	Incidents	Est Loss	Losses
5 Service Call				
510 Person in distress, Other	1	0.32%	\$0	0.00%
512 Ring or jewelry removal	1	0.32%	\$0	0.00%
531 Smoke or odor removal	5	1.58%	\$0	0.00%
550 Public service assistance, Other	9	2.85%	\$0	0.00%
551 Assist police or other governmental agency	2	0.63%	\$0	0.00%
553 Public service	2	0.63%	\$0	0.00%
554 Assist invalid	6	1.90%	\$0	0.00%
	28	8.86%	\$0	0.00%
6 Good Intent Call				
600 Good intent call, Other	5	1.58%	\$0	0.00%
611 Dispatched & cancelled en route	51	16.14%	\$0	0.00%
622 No Incident found on arrival at dispatch add		0.32%	\$0	0.00%
631 Authorized controlled burning	1	0.32%	\$0	0.00%
	58	18.35%	\$0	0.00%
7 False Alarm & False Call				
700 False alarm or false call, Other	10	3.16%	\$0	0.00%
733 Smoke detector activation due to malfunction	2	0.63%	\$0	0.00%
735 Alarm system sounded due to malfunction	1	0.32%	\$0	0.00%
736 CO detector activation due to malfunction	2	0.63%	\$0	0.00%
740 Unintentional transmission of alarm, Other	1	0.32%	\$0	0.00%
	16	5.06%	\$0	0.00%
8 Severe Weather & Natural Disaster				
800 Severe weather or natural disaster, Other	1	0.32%	\$0	0.00%
812 Flood assessment	1	0.32%	\$0	0.00%
	2	0.63%	\$0	0.00%
9 Special Incident Type 900 Special type of incident, Other	1	0.32%	\$0	0.00%
	1	0.32%	\$0	0.00%

Total Incident Count: 316 Total Est Loss: \$902,102

Fire Prevention and Public Education

In the year of 2018 THFD implemented new technology in the form of a UAV program. In conjunction with the newly formed UAV Unit of CERT, THFD has leveraged this modern technology to augment the Fire Prevention Program. One example of the immense power of this new technological capability is the systematic capture of high resolution images of each of the commercial and multi-family occupancy buildings within the District. These images are attached to the THFD Emergency Pre-Plans for each of these buildings that are digitally accessed by responding units, providing critical site data in seconds. The intent of these images is capture the layout and location of all the equipment and potential hazards to THFD and cooperator personnel, for recall when it is dark or the roof is covered in snow. This simple but effective method of using UAV technology directly contributes to a safer and more situationally aware Incident Commander.

In 2018, THFD continued the annual Fire Safety Inspection Program in the building occupancies required per the California Fire Code and the new Twain Harte Community Services District Fire Ordinance. This inspection program provides numerous benefits for both THFD personnel and the business owner and focusses on reducing loss and damage from fire in our community. During this customer service oriented interaction with the business owners of our community, THFD develops strong and lasting relationships, builds trust, and demonstrates the professionalism. The tangible results of this important inspection program are; increased resiliency to fire damage through updated pre-plans, familiarity with the building construction and interior layout, more efficient responses to incidents at those buildings, reduced delay in notifying building owner/occupant of an incident involving their



building. This direct interaction with the business owners builds support and advocacy for THFD from the citizens we serve.

In 2018, the Twain Harte Area CERT conducted several critical trainings in conjunction with the THFD personnel that enhanced the team's ability to respond when activated and increased the total number of trained CERT members. CERT also provided free preparedness workshops for the community to help each interested person become better prepared and self-sufficient during any type of emergency.

THFD continued the cooperative effort with Cal Fire performing hazardous fuels inspections in our community. The THFD Fire Prevention Program strives for compliance through education rather than harsh enforcement. For it is through voluntary compliance rooted in knowledge and understanding that we have the most significant impact in the prevention and reduction of fire related incidents within our community.