



CITY OF KIRKLAND FIRE DEPARTMENT



2018 ANNUAL REPORT

OUR CITY • OUR PEOPLE • OUR DUTY • OUR COMMITMENT TO SERVE

MESSAGE FROM THE CHIEF



Chief Joseph Sanford



Since 1890, the Kirkland Fire Department has been blessed with strong, consistent support from our residents, businesses and elected leaders. Our community has remained committed to making investments in providing top notch fire engines, aid units, protective equipment, facilities and training to ensure that our mission can be carried out quickly and safely. Since those austere beginnings, the department has added Hazardous Materials, Technical Rescue, Emergency Medical Services, Emergency Management and Water Rescue to our list of services. The Fire Department is truly an “all hazards” response team. Our community is safer today because of the cumulative dedication and foresight of these and other decisions both past and present. Today, 106 firefighters wear a patch on their shoulder that reminds them of the faith and trust that has been bestowed upon each one of us.

In 2018, with City Council and community support, we completed renovation of aging Fire Station 25 on Finn Hill, and are acquiring land and designing a new Fire Station on 100th Avenue NE and NE 132nd Street to serve North Kirkland. Station construction will begin in 2020.

In 2019, we will be seeking community involvement and guidance for a possible 2020 ballot measure. The Council and community will be looking at what renovations are needed for the Rose Hill, Forbes Creek and Houghton Fire Stations and the replacement of aging Fire Station 27 in Totem Lake. When complete, these and other system enhancements will help ensure that the Kirkland Fire Department can withstand a natural disaster and maintain a deployment model that effectively serves all portions of our growing community.

This consistent support ensures that the dedicated professionals of the Kirkland Fire Department can continue to provide the professional services we have for over 100 years. Whether assigned to work in Suppression, Administrative Support, Emergency Medical Services, Training or the Bureau of Fire Prevention; on a fire truck or within the Office of Emergency Management, the men and women of the Kirkland Fire Department want to thank you for that support. We couldn't do what we do without it.

- **Joseph Sanford**, Fire Chief, Kirkland Fire Dept.

KFD MISSION

The City of Kirkland Fire Department has existed within the state of Washington since 1890. The Kirkland Fire Department is legally established as a department through RCW 35A.01.01 and RCW 35A.11.020 and Kirkland Municipal Code 3.16.037.



MISSION STATEMENT

**OUR CITY * OUR PEOPLE * OUR DUTY
OUR COMMITMENT TO SERVE**

KFD VISION

The Kirkland Fire Department is creating a safer community as a respected partner in our region and an innovative leader in the nation.

VALUES

- **SUPPORTIVE** – Working together as a team toward a common goal.
- **PROFESSIONAL** – Upholding industry standards and honoring the expectations of a professional firefighter both on and off the job.
- **INTEGRITY** – Maintaining consistency between actions and words at all times.
- **RESPECTFUL** – Treating others with understanding and compassion. Acknowledging there is strength in diversity.
- **INNOVATIVE** – Providing a supportive work environment that encourages and empowers improvement through creativity.
- **TRUSTWORTHY** – Being fair, truthful, competent and honorable; Confident that the actions of others are fair, truthful, competent and honorable.

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DEPARTMENT INFORMATION



OVERVIEW

History:

The City of Kirkland Fire Department has existed within the State of Washington since 1890.

The first fire chief was hired in 1928 and the first paid firefighters for the City were hired in 1969. Our fire chief is currently Chief Joe Sanford. As director of the fire department, Chief Sanford oversees the offices of the Deputy Chief of Administration, the Deputy Chief of Operations, and the City Emergency Manager and Administrative Services.

The City of Kirkland Fire Department provided fire service to King County Fire Protection District #41 by a contract agreement (Kirkland Municipal Code 3.24.010) from November 1969 to June 2011. In 2011 the City of Kirkland annexed all of Fire District 41 and a small portion of Fire Districts 34 and 36.

Services Provided:

The services provided to the community by the Fire Department include:

- Fire and emergency medical response (all response personnel are certified EMTs)
- Rescue operations including vehicle extrication and technical rescues including confined space, trench, structural collapse, and rope rescue
- Special operations including urban-wildland interface firefighting and surface water rescue
- Automatic response to surrounding jurisdictions
- Fire Prevention and permits
- Fire Investigation
- City Emergency Management
- Water Rescue

The Regional services provided to the community in partnership with neighboring Fire Departments include:

- Emergency dispatch and 911 services provided by North East King County Regional Public Safety Communication Agency (NORCOM) www.norcom.org.
- Hazardous Materials Response provided to the community by the Eastside HazMat Team. The Kirkland Fire Department is a member of this team and has 8 response personnel trained to the technical response level.
- Advanced life support + Medic response provided to Kirkland residents primarily by the City of Redmond Fire Department. The medic program is part of the King County Medic One Program.
- Training Division, part of the East Metro Training Group (EMTG). The EMTG is composed of the Kirkland, Northshore, Mercer Island, Bothell, Shoreline, Woodenville, Bellevue, Eastside Fire & Rescue and Redmond Fire Departments. Kirkland is one of the founding member agencies which make up this 700 plus member training group.

STAFFING PROFILE (2018)

Work Schedule

Emergency response staffing is done on a three shift platoon rotation. The schedule is a 48/96 rotation. Employees work 48 hours then are off 96 hours, working a total of a 48 hour work week.

Personnel

- Emergency response personnel – 92 Line personnel (not including Training, Admin or Prevention)
- Every day minimum on-duty strength – 20
- Prevention personnel – 6
- Training Officers – 2
- Emergency Medical Services Officer – 1
- Non-Uniformed (Civilian) personnel – 5
- City Emergency Management – 2
- Command staff – 3

Minimum Staffing for Emergency Response

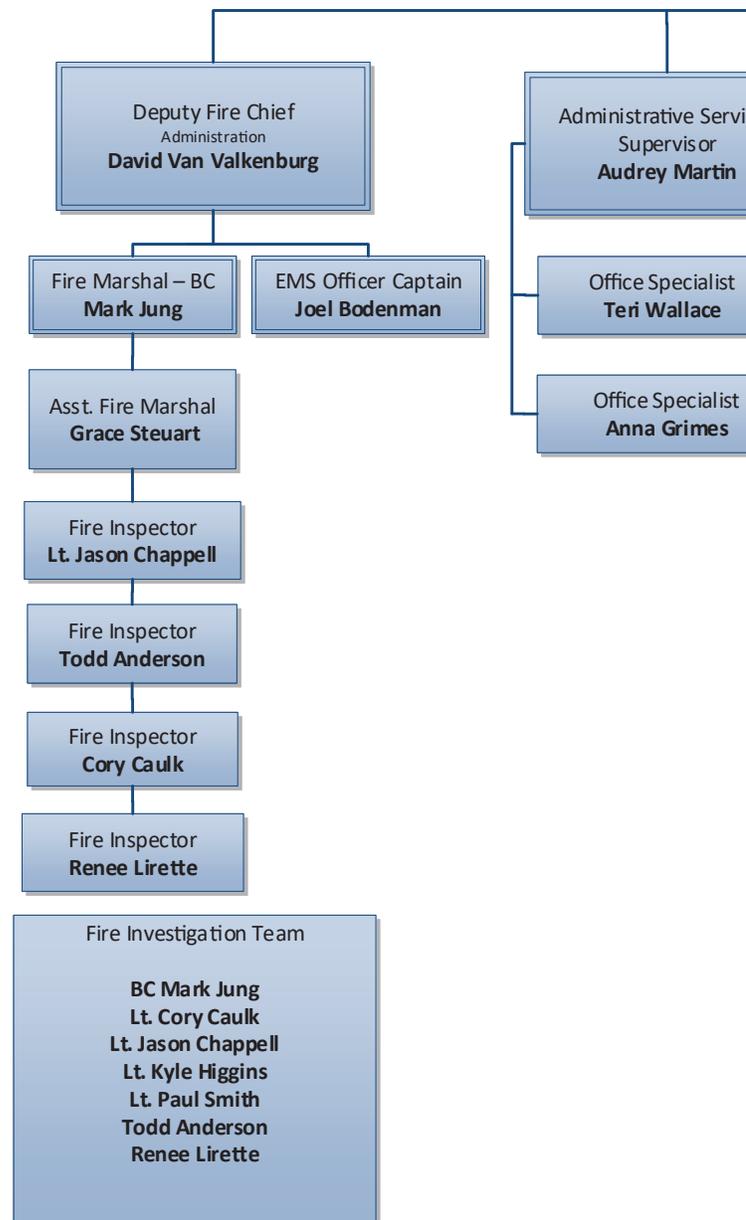
- Engine company = 3 crew members
- Aid car = 2 EMT crew members
- Ladder company = 3 crew members
- Battalion Chief = 1

Fire Station Staffing

Stations 21, 22, 25, 26, 27 are cross-staffed stations. A cross-staffed station has more than one type of apparatus, usually an aid car and fire engine. The on-duty Firefighters respond in whichever unit is dispatched. As an example, if Aid 26 is dispatched for an aid response, the engine is unavailable for subsequent responses until the aid car returns to the station.

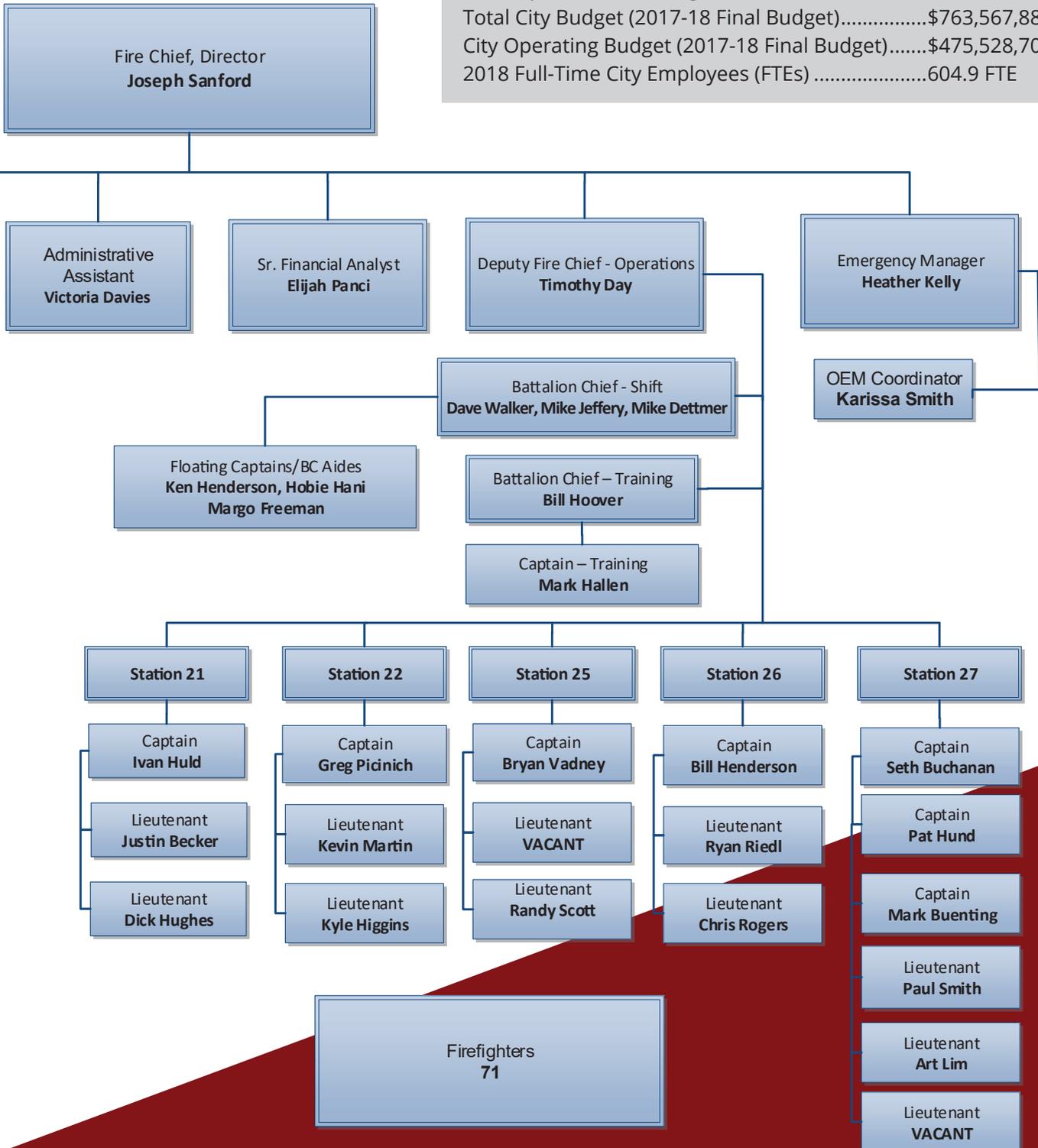
- Forbes Creek Station 21 = 3 crew members; 1 aid car, 1 engine
- Houghton Station 22 = 3 crew members; 1 aid car, 1 engine
- Finn Hill Station 25 = 4 crew members; 1 aid car, 1 engine
- Rose Hill Station 26 = 3 crew members; 1 Battalion Chief, 1 Battalion Aide Captain; 1 aid car, 1 engine, 1 Battalion Chief car
- Totem Lake Station 27 = 6 crew members; 2 aid cars, 1 engine, 1 ladder

City of Kirkland Fire Department Organizational Chart March 2019



KIRKLAND AT A GLANCE

Founded 1888
 Incorporated..... 1905
 Consolidated with Town of Houghton 1968
 Annexation of Finn Hill, N Juanita & Kingsgate June 1, 2011
 2018 Population 86,772
 Land Area 17.81 sq. miles
 Fire Department Grading Class..... 4
 Total City Budget (2017-18 Final Budget)..... \$763,567,886
 City Operating Budget (2017-18 Final Budget)..... \$475,528,708
 2018 Full-Time City Employees (FTEs) 604.9 FTE



STATION INFORMATION

Fire Department Headquarters

Kirkland City Hall

- Mailing address: 123 5th Avenue, Kirkland, WA 98033
- Dept. Main-line: **425-587-3650**
- Fire Services Website: www.kirklandwa.gov/depart/Fire_Services.htm
- Office of Emergency Management Website: www.kirklandwa.gov/depart/Fire_Services/KirklandEM.htm

STATION 21 – Forbes Creek

Location: 9816 Forbes Creek Drive

Date Built: 1997 (8,541 sq. ft.)

APPARATUS:

- **Aid 21** 2010 Ford Road Rescue Aid Vehicle 4x4 (front line)
- **Engine 21** 2005 Spartan / H&W Pumper (front line)
- **Engine 29** 1999 Spartan Pumper (reserve)

STATION 22 – Houghton

Location: 6602 108th Ave. NE

Date Built: 1980 (9,071 sq. ft.)

APPARATUS:

- **Aid 22** 2014 Ford F450 Road Rescue (front line)
- **Engine 22** 2015 Spartan / EVR Pumper (front line)
- **Air Unit 21** 2006 Spartan / H&W Special Ops Unit (front line)
- **Engine 28** 2003 Spartan / H&W Pumper (reserve)
- **1926 American LaFrance Pumper** (antique)

STATION 25 – Finn Hill

Location: 12033 76th PL NE

Date Built: 1973 (6,488 sq. ft.)

Renovated: 2018 (7,382 sq. ft.)

APPARATUS:

- **Aid 25** 2016 Ford Road Rescue Aid Vehicle 4x4 (front line)
- **Engine 25** 2003 Spartan / H&W Pumper (front line)

STATION 26 – North Rose Hill

Location: 9930 124th Ave NE

Date Built: 1994 (9,795 sq. ft.)

APPARATUS

- **Aid 26** 2014 Ford Road Rescue Aid Vehicle (front line)
- **Engine 26** 2013 Spartan Pumper (front line)
- **Battalion 21** 2008 Chevrolet Suburban (front line)
- **Aid 28** 2008 Ford Road Rescue 4x4 (reserve)
- **2000** Ford Road Rescue Aid Vehicle (reserve)

STATION 27 – Totem Lake

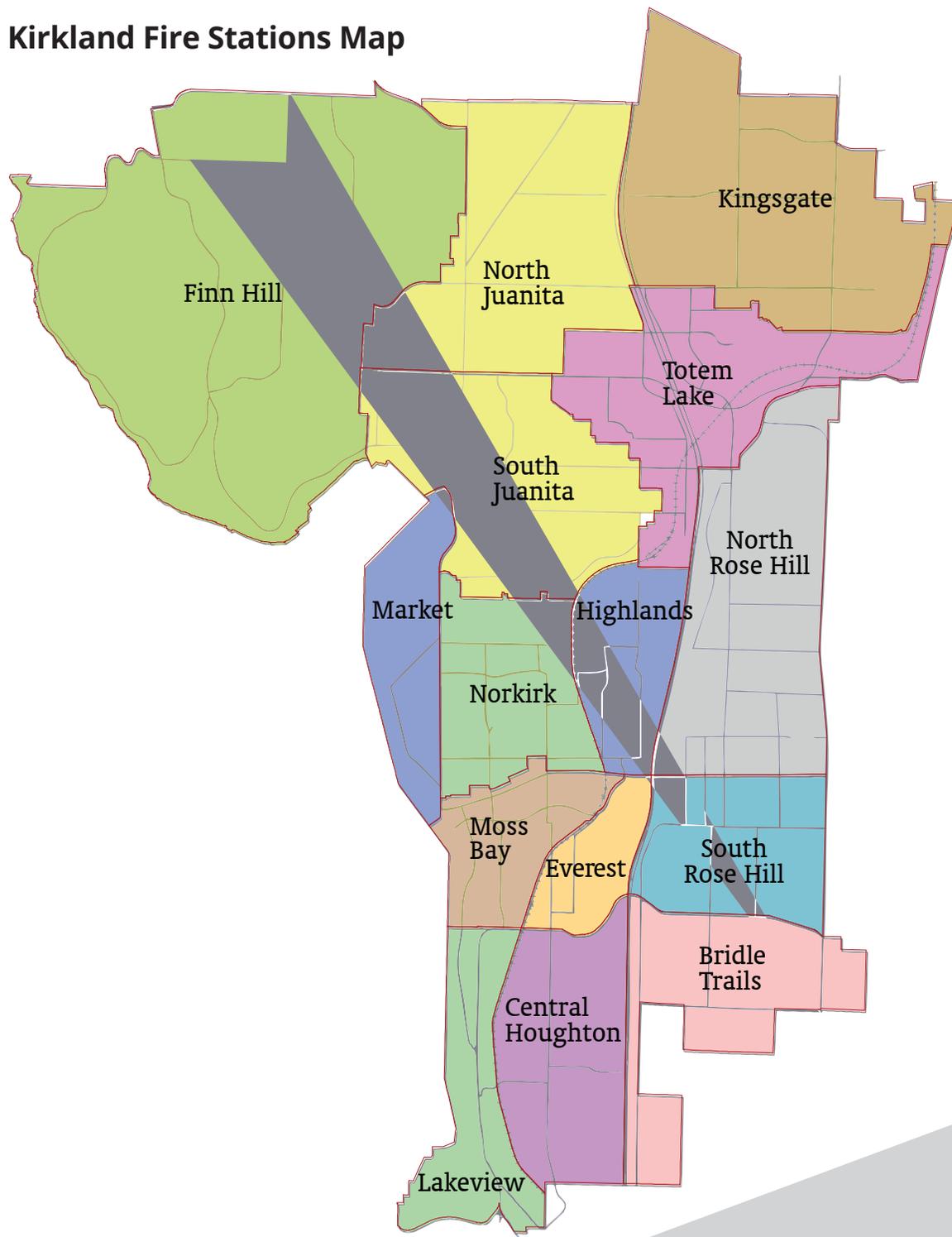
Location: 11210 NE 132nd St.

Date Built: 1974 (8,159 sq. ft.)

APPARATUS:

- **Aid 27** 2016 Ford Road Rescue Aid Vehicle 4x4 (front line)
- **Aid 29** 2012 Ford Road Rescue Aid Vehicle (front line)
- **Engine 27** 2010 Spartan / H&W Pumper (front line)
- **Ladder 27** 2016 Spartan / Crimson Aerial TDA (front line)

Kirkland Fire Stations Map



2018 FIRE DEPARTMENT BUDGET

EXPENDITURES:

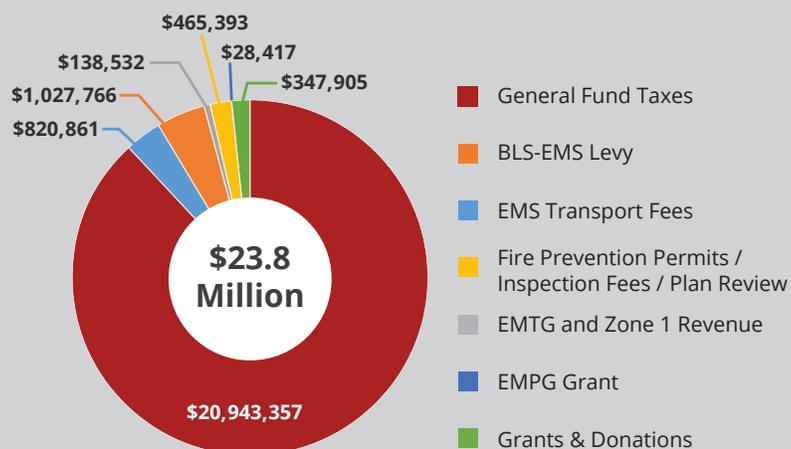
Department	Total	Personnel ¹	Internal Charges ²	Other ³
Fire Operations	\$19,743,672	\$16,373,213	\$2,392,877	\$977,583
Training	\$719,073	\$617,176	\$47,739	\$54,158
Administration	\$1,662,852	\$1,176,652	\$250,983	\$235,218
Fire Prevention	\$1,172,180	\$967,562	\$93,398	\$111,220
Office of Emergency Management (OEM)	\$474,454	\$306,940	\$29,235	\$138,279
TOTAL	\$23,772,231	\$19,441,543	\$2,814,231	\$1,516,457

1. Personnel includes: benefits, overtime, hourly wages, uniforms, and protective equipment

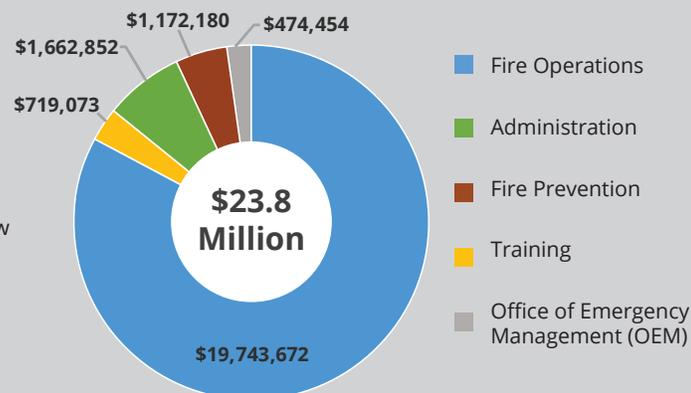
2. Internal Charges includes: Fleet, Information Technology, liability insurance and Facility charges

3. Other includes: safety gear, medical supplies, tools and supplies for fire stations and apparatus, office supplies, professional services/contracts, and all supplies in training, prevention, and administration

2018 Actual Revenues



2018 Actual Expenditures



2018 FIRE DEPARTMENT REVENUES:

	Actuals
EMS Transport Fees	\$820,861
BLS-EMS Levy	\$1,027,766
EMTG and Zone 1 Revenue	\$138,532
Fire Prevention Permits/Inspection Fees/Plan Review	\$465,393
EMPG Grant	\$28,417
Grants & Donations	\$347,905
General Fund Taxes	\$20,943,357
TOTAL	\$23,772,231

Basic Life Support (BLS) Transport User Fee Program

The BLS Transport User Fee Program was established to create a sustainable revenue source to support essential emergency medical services. Revenue from the BLS transport user fee has helped cover a portion of the cost of providing emergency medical service to the Kirkland community.

The user fees are currently used to maintain service levels; in the future, additional revenue from fees may be used to improve service, reduce response times, and provide greater EMS resources to the community.

2018 TRANSPORTS

TRANSPORT FEES: \$820,861

TOTAL REVENUE: \$2,828,874

Resident	1812	76%
Non-Resident	519	22%

City Employee at Work	<u>+ 48</u>	2%

2379

TRANSPORTS BILLED

65

**TRANSPORTS NOT BILLED
(out of jurisdiction)**

2444

TOTAL # OF TRANSPORTS:



RECOGNITION AND SERVICE

The Kirkland Fire Department recognizes our employees for their years of service to our community. The following members have reached important milestones in their careers.

YEARS OF SERVICE:

Hobart Hani	25	Jeff Childs	15
Ivan Huld	20	Brent Anderson	15
Shawn McDougall	20	Ryan Riedl	15
Jason Pierce	15	Dustin Smith	15
Eric Peterson	15		

2018 PROMOTIONS:

Emergency Manager: 6/16/18 Heather Kelly

Captain: 9/16/18 Joel Bodenman

Lieutenant: 9/16/18 Kevin Martin 11/8/18 Ryan Riedl

2018 RETIREMENTS:

Ed Ulrich - Fire Inspector, April 2018, after **40 years** of service

Keith Adams - Captain, May 2018, after **37 years** of service

Nels Petersen - Firefighter, May 2018, after **26 years** of service

Helen Ahrens-Byington - Deputy Chief, October 2018, after **25 years** of service

Troy McKinney - Firefighter, October 2018, after **29 years** of service

Dave Walker - Battalion Chief, November 2018, after **29 years** of service

Greg Rogers - Firefighter, August 2018, after **26 years** of service

Graduating Class 7:

1/10/18 Corey Hall

Graduating Class 8:

9/1/18 Nicholas Cameron

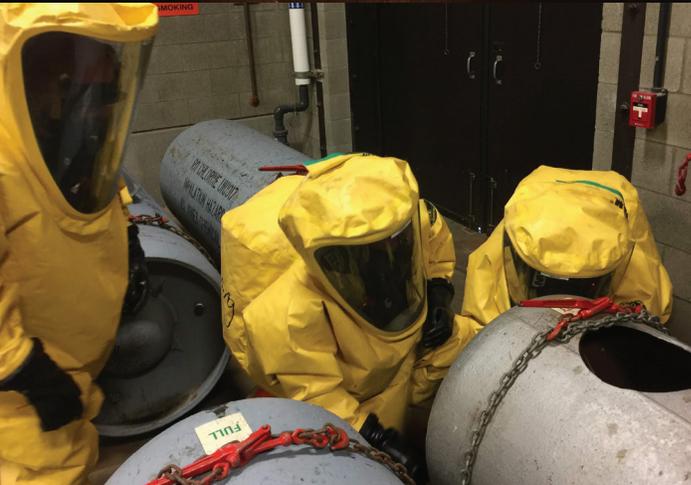
9/1/18 Andrew Mroska

9/1/18 Tyler Farrar

9/1/18 Glenn Shackatano



2018 AT A GLANCE



EMERGENCY RESPONSE



OPERATIONS OVERVIEW

Kirkland Fire's Operations Division

is responsible for ensuring that our people, equipment, and training support the safe and effective response to 911 calls. To achieve this, a minimum of 20 Firefighter/Emergency Medical Technicians are available to respond from five fire stations located throughout the City of Kirkland. This local response capability is enhanced by formal mutual aid agreements with our regional public safety partners.

The Kirkland Fire Department (KFD) is part of King County Zone 1, one of three fire zones defined in King County's Comprehensive Emergency Management Plan (the other two fire zones include Zone 3, which encompasses communities in south King County, and Zone 5 which encompasses the City of Seattle). In addition to training together, Zone 1 agencies work seamlessly across municipal boundaries to provide service to the region's citizens. This cooperation is supported through our interaction with NORCOM, the 911 dispatch center for Zone 1 located in Bellevue.

Calls for emergency medical services (EMS) continued to account for the largest percentage of KFD emergency responses in 2018. In fact, 74% of all emergency responses were for medical aid. Our EMS capabilities are enhanced by King County's Medic One paramedic providers in Redmond and supported by Shoreline and Bellevue. Advanced Life Support (ALS) is provided by the King County Medic One. In addition to EMS, Kirkland Fire maintains "all-hazards" response capabilities that match the risks in our community, including fire suppression, technical rescue disciplines such as high angle rope rescue; confined space, trench, motor vehicle, and collapse rescue; hazardous materials response; and water rescue.

In 2018, Kirkland enhanced our wildland fire response capability by training dozens of firefighters in this specialized skillset.

TRAINING OVERVIEW

The Kirkland Fire Department's Training Division is staffed by a Battalion Chief, a Captain, and an Office Specialist. KFD Training is responsible for assessing department training needs, coordinating instructional activities with other divisions, and then developing, scheduling, and delivering needed training. In doing so, KFD supports training in multiple disciplines including fire suppression, emergency medical services, technical rescue, auto extrication, wildland firefighting, and hazardous materials mitigation. KFD uses regional best practices to guide our training as well as industry standards and laws including the Code of Federal Regulations, Washington Administrative Code, and the National Fire Protection Agency standards.

In 2018, KFD's Training Division implemented a novel training program to meet the needs of our newest firefighters. This apprenticeship-style training program is conducted during the first four years of employment. In 2018 nine firefighters participated in this training; in 2019 we are anticipating 18. The focus of this training is to develop and prepare these newer firefighters to meet the challenges posed by an ever-evolving community and profession.

As part of our broader training program, Kirkland participates in the East Metro Training Group, or EMTG. EMTG is a regional training consortium comprised of eight fire departments. The goal of this regional group is to find efficiencies in the development and delivery of training and, in the process, promote interoperability amongst neighboring agencies. Together, these eight departments – which include Kirkland, Bellevue, Bothell, Mercer Island, Northshore, Redmond, Shoreline, and Woodinville – participate in periodic group training sessions and coordinate twice-yearly recruit academies. In addition to working with our neighbors via EMTG, Kirkland Fire is continually seeking opportunities to collaborate with other fire departments throughout the region.

The rapid growth of the City of Kirkland presents numerous training opportunities for the fire department. Novel building design, along with new construction materials and methods, and

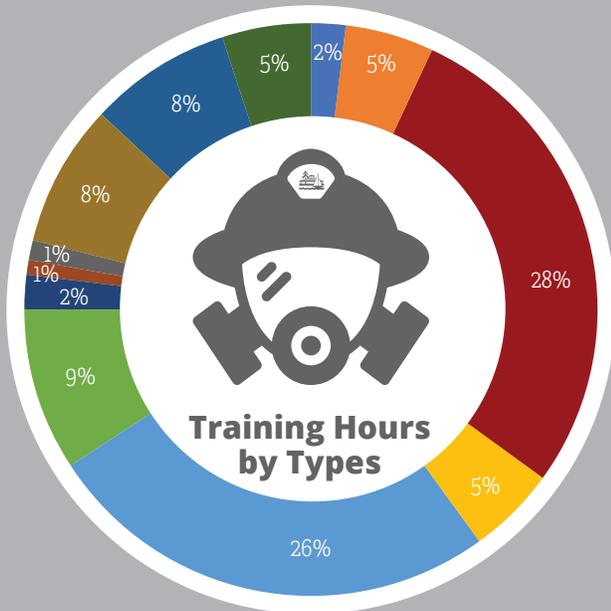
increasing population density have required our training staff to expand our training curriculum and delivery methods. Kirkland's City Council has been enormously supportive of these efforts by approving funding for initiatives that support the department's evolving training needs. These initiatives include funding for a modular training facility at one of our fire stations as well as enhanced Incident Command training tools. We are also working with our regional partners to fully implement a sophisticated learning management system that will improve the quality of online training and documentation.

In addition to coordinating training activities for the KFD, the Battalion Chief assigned to the Training Division also fills the role of department Health and Safety Officer. In this role, the BC chairs the department's Safety Committee. This committee reviews all accidents and near-misses to identify areas for improvement in policy, training, technique, and/or design. The overall goal of our safety program is to minimize the chance of accident or injury. Additionally, the Safety Officer is dispatched to significant incidents when crews are working in dangerous situations.



ADDITIONAL TRAINING HIGHLIGHTS

TRAINING FACTS



- City Procedures (2%)
- Driver Engineer (5%)
- Emergency Medical Services (28%)
- Fire Ground Operations (5%)
- Firefighter Suppression (26%)
- Hazardous Materials (9%)
- Human Resources (2%)
- Incident Command Training (1%)
- Miscellaneous (1%)
- Professional Development (8%)
- Safety (8%)
- Technical Rescue (5%)

**2018 TOTAL
TRAINING HOURS**

5,560

- Participated in EMTG regional multi-company operations (MCO) drills
- Provided program oversight for regional technical and water rescue training programs
- Participated in “Active Shooter” training with regional fire and police departments.
- Scheduled hearing tests, flu shots, and TB Quantiferon Gold Testing (Blood Draws)
- Fire Officer Academy
- Driver Operator Academy



WILDLAND 2018

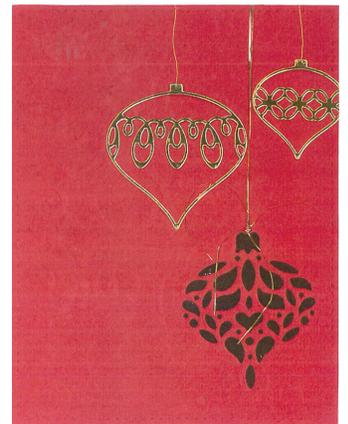


WILDLAND 2018

At the start of 2018, the City of Kirkland restored funding for the department wildland firefighting program. The program was temporarily suspended during the economic downturn. Kirkland firefighters completed 60 hours of training to earn their “red cards”. Training for red cards includes classroom sessions on fire behavior, communications, and fire line safety. Firefighters also complete a required “pack test”. The pack test consists of completing a four-mile course, with 45 pounds of protective equipment and wildland gear, in 45 minutes. As part of their training, crews participated in hands-on training days in Kirkland and Pierce County.

The department deployed resources in support of wildland fires in Washington, Oregon and California. Kirkland firefighters were sent to the Mendocino Complex fire in California, the Maple fire on the Olympic Peninsula, the Klondike and Terwilliger fires in Oregon, and the Boyd’s fire on the Washington/Idaho border. Expenses associated with the deployments, personnel costs, fuel and equipment costs, housing and meals are reimbursed by Federal and State agencies.

Kirkland Firefighters gained valuable experience during their deployments. Crews work within a large multi-agency, unified Incident Command System. All personnel were able to begin the initial training program for higher levels of certification in the wildland system. Teams were exposed to the orientation, safety and operational needs of wildland firefighting.



You
would work
is appreciated.
Happy Holidays!
-Emma

Merry Christmas and thank
you so much for your service
to others. God's blessings to
you all. Sherry

Thank you for coming & helping
to fight the fires in Nor Cal
this past summer. You are
our heroes. Merry Christmas!
Hani
(Reading, CA)

Thank you for all your hard
work! Merry Christmas!
-Hank

Merry Everything

Merry Christmas
and thank you for
everything you do!
Tiffany.

TECHNICAL RESCUE

TECHNICAL RESCUE 2018

Since the inception of the Technical Rescue Operations Group in 1999, Kirkland Fire Department has been the lead agency. The group was formed by an Inter Local Agreement (ILA) to coordinate resources and responses between the nine fire departments of Kirkland, Bothell, Duvall, Eastside, Northshore, Shoreline, Woodinville, Snoqualmie, and Bellevue in North East King County. Battalion Chief Bill Hoover has been the training and coordination lead for the group since 2016.

The Technical Rescue Operations Group coordinates the instruction and scheduling of training in each of the following disciplines: Rope Rescue; Confined Space Rescue; Trench Rescue; Structural Collapse Rescue; and Vehicle & Machinery Rescue, all of which have been provided to the residents of Kirkland for decades.

Classes are held at various locations on the Eastside and attended by firefighters from as far away as Alaska and Montana. Each discipline requires a 40-hour class that is both physically and mentally challenging.

In addition to the initial training, all rescue technicians attend annual refresher training in each level of certification, which is conducted to meet the requirements of the Washington State Administrative Code and the National Fire



Protection Agency recommendations. Refresher training entails 4 to 6 hours of ongoing training each year.

Kirkland Fire has 32 technicians who respond to calls for service. Although rescue technicians are spread throughout the city, technicians primarily serve as the crew of Ladder 27, responding from the Totem Lake Station. Also housed at this station is "Collapse 27," a trailer-based tool and equipment cache that is specifically suited for structural collapse response due to earthquakes, explosions, or other physical damage to a structure that necessitates an emergency response.



EMS 2018

Kirkland Fire Department Firefighter/Emergency Medical Technicians (EMTs) deliver Emergency Medical Services (EMS) to the residents of Kirkland. KFD firefighters are cross trained as Washington State Emergency Medical Technicians. In addition to responding to Basic Life Support (BLS) calls, such as a fractured leg, Kirkland Firefighters/EMS deliver advanced care techniques. Cardio Pulmonary Resuscitation (CPR); automatic defibrillation; oxygen therapy; and the administration of Narcan or Epinephrine are all essential skills performed by Kirkland FF/EMTs.

Supported by King County Emergency Medical Services (KCEMS) and the countywide Medic One Levy, Kirkland Fire provides Advanced Life Support (ALS) medical care in partnership with Redmond Fire Department. Paramedics from RFD are the primary ALS providers within the department's response area, and our secondary ALS providers are Shoreline and Bellevue.

Transporting patients to area hospitals is a core service of Kirkland Fire Department. Once patients are stabilized by Firefighter/EMTs and Paramedics, and further medical attention is needed, patients are transported by either Paramedics or by Kirkland Fire aid units. Patients requiring further medical care are transported by private ambulance during peak call times. Patients may also be transported by private ambulance when requesting transport to hospitals outside of our service area.

Kirkland firefighter/EMTs complete Competency Based Training (CBT) each year. Topics are rotated on a three-year continuing education cycle. Training topics range from high performance CPR skills to drug administration, paramedic interaction, splinting broken bones, and complex rescue and medical based simulations, among others.



PET OXYGEN MASKS DONATION

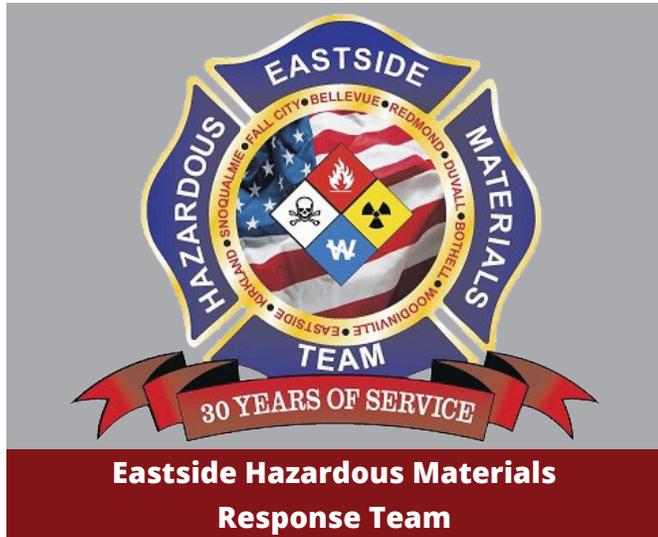


In the fall of 2018, the Kirkland Fire Department received a donation of pet oxygen masks to better assist pets suffering from smoke inhalation as a result of a structure fire. The oxygen masks were donated by Project Breathe, a program sponsored by the Invisible Fence Brand, and training for the firefighters was provided by Dr. Christine Wilford, DVM, of Island Cats Veterinary Hospital.

The Kirkland Fire Department is committed to rendering basic life support to animals when incident resources and priorities allow. While citizens should still seek veterinary care for their animals and not use 911 services for pet medical emergencies, the fire department is excited to have the new pet oxygen masks and training in place for incidents we respond to where pets are involved.



HAZARDOUS MATERIALS



Eastside Hazardous Materials Response Team

The Eastside Hazardous Materials Response Team (Hazmat) is part of the Eastside Hazardous Materials Consortium, which consists of hazardous materials technicians from the Bellevue, Redmond, Woodinville, Kirkland, Duvall, and Bothell fire departments and Eastside Fire & Rescue. The Consortium maintains equipment and personnel to staff three hazardous materials units: Hazardous Materials Unit 1 at Station 6 in Bellevue, Hazardous Materials Unit 133 at Station 33 in Woodinville, and Hazardous Materials Unit 177 at Eastside Fire and Rescue Station 71 in Issaquah. All hazardous materials units maintained and operated by the Consortium are stationed in King County Zone 1, which is the northeast section of King County.

The training and skills acquired by Hazmat team technicians render them experts in several hazmat areas. The technicians train to the National Fire Protection Agency 472 Standard and are proficient in recognizing and responding to chemical, biological, nuclear, radiological, and explosives events, in addition to a variety of fixed-use facility and transportation hazards.

Each Eastside Hazardous Response Team member is extensively trained. Individual training is facilitated by each jurisdiction, and the team comes together to train in its entirety on a quarterly basis.

Training is provided by local subject matter experts (SMEs), regional training partners, federal and state agencies, and through public-private

partnerships within the communities served by the team. Hazmat team training partners include:

- WA State Department of Ecology
- Federal Bureau of Investigation (FBI), Seattle Office
- US Army National Guard, 10th Civil Support Team (CST)
- East Metro Training Group (EMTG)
- Dave Kummerlowe, CADRE, Inc.

Training addresses a variety of topics, to fulfil training objectives mandated by the Code of Federal Regulations (CFR) 1910.120 for Hazardous Materials Response, Technician level. Some of the required training topics include, but are not limited to:

- Hazardous Materials Incident Command
- Radiological Emergencies
- Chemical Emergencies
- Biological Emergencies
- Clandestine Laboratories
- Hazardous Materials Transportation Incidents
- Hazard Pre-planning
- Tier 2 Reporting
- Chemistry
- Special Event Mitigation
- Hazard Analysis
- Decontamination

The five-year Zone 1 Hazardous Materials Work Plan is based on strategies and objectives identified in the following:

- Zone 1 Hazardous Materials Strategic Plan 2017-2022
- Zone 1 Hazmat Capital Expenditures Plan 2012-2031

The work plan reflects the progress of goals and objectives outlined in the Zone 1 Hazardous Materials Strategic Plan and incorporates the strategic priorities identified in the Zone 1 Hazardous Materials Capital Expenditures Plan.

The Zone 1 Hazmat Fire Chiefs unanimously approved the 2017 amended budget. They also unanimously approved the five-year Hazardous Materials Strategic Plan and agreed to the addition of two F550 Hazmat units, new SCBAs and new Ion Mobility Spectrometry (IMS) instrumentation, all of which came online in 2018. Additionally, all Hazmat

team technicians were outfitted with a Personal Protective Equipment (PPE) pack containing tools and other equipment to be used in the event of a Hazmat incident.

Kirkland Hazmat team members responded to a wide range of hazardous materials calls in 2018, including natural gas leaks, carbon monoxide alarms, gasoline spills, chemical spills, hazardous materials spills in Lake Washington, and a full-team deployment to a suspicious container placed on a Metro bus requiring a multiagency response.

The Kirkland Hazmat team acquired several new training props at its training facility to train technicians and operations personnel. These props included tanks for spill mitigation training, including plugging and patching, and damming, diking and diverting of hazardous materials. Other training equipment included chlorine kits used to stop the leaking of chlorine gas from containers, radiation sources used for radiation detection training, and nuclear sources with various related equipment to practice techniques specific to the decontamination of tools and hazmat personnel.

Kirkland technicians were trained as specialists in the dry-decontamination technique, a method of removing contaminants that requires no water or other liquids. They were also trained in secondary

screening for detecting radiological materials, advanced use of the department's gas detection equipment and sampling techniques for biological and chemical agents. Additionally, the team worked with the FBI to learn evidence collection techniques for use at crime scenes.

Kirkland Hazmat team members conduct a variety of services for the Kirkland Fire Department. These include:

- Operations Training for all fire department personnel
- Maintenance of KFD hazard monitoring equipment, including five gas monitors, radiation monitors and carbon monoxide monitors
- Coordination between the KFD and the Kirkland Public Works spill response unit
- Active shooter training and mass casualty incident terrorism training
- Special events monitoring
- Providing Zone 1 recruit academy hazardous materials operations training

The ESHMT and the members of the Kirkland Hazmat team are committed to continued specialty training and skill-building activities in 2019.



WATER RESCUE

In 2018 the Water Rescue Team responded to 56 water related accidents/incidents. Kirkland's water rescue teams responded to nine requests by our surrounding agencies to provide water rescue resources/support utilizing the water rescue craft (WRC), Rapid Dive teams and rescue swimmers for extended searches both day and night. For the fourth year in a row the Kirkland Fire Department did not have a single water related fatality in our City limits. Multiple victims saved were perilously close to death. Due to the quick actions by responding crews, extensive training and top of the line equipment, Kirkland Firefighters were able to safely remove everyone from the water. Kirkland continues to be the regional leader for water rescue training and operations. KFD personnel continue in providing Operations level and Rescue Swimmer training to Firefighters from across the state. Over one hundred forty individuals took part in classes taught by KFD's twelve water rescue instructors.

A special thanks to our water rescue instructors. These personnel were responsible for writing policies; developing and delivering training; creating response plans; and ensuring that the water rescue craft and equipment were appropriately maintained and operationally ready.

- Lieutenant Justin Becker
- Lieutenant Cory Caulk
- Lieutenant Ryan Riedl
- FF Cliff Oleszko
- FF Travis Braddock
- FF Bill Barnes
- FF Moe Kelsey
- FF Jon Hernandez
- FF Brett Christiansen
- FF David Lilleness
- FF Doug Tomczak

2018 TRAINING SYNOPSIS

- Operations Level – All Personnel
- Rescue Swimmers – 60
- Rapid Divers – 32
- WRC Driver Operators - 58



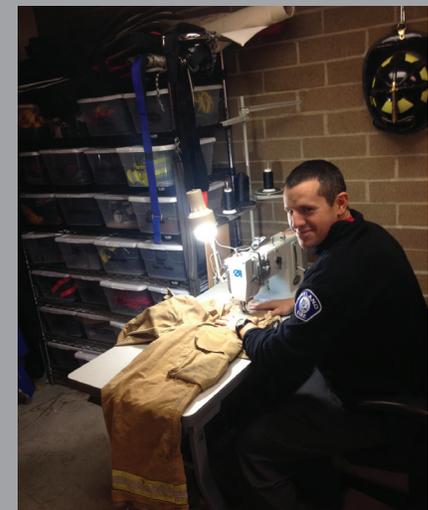
PERSONAL PROTECTIVE EQUIPMENT

PERSONAL PROTECTIVE EQUIPMENT (PPE) PROGRAM:

The Kirkland Fire Department remains only one of two fire departments in the United States that holds an NFPA Independent Service Provider (ISP) certification. This certification represents years of training along with an annual verification/certification process conducted by an outside agency. This certification allows trained personnel to perform inspections and/or repairs to the 3,400+ pieces of Fire Department Personal Protective Equipment (PPE). Over four thousand repairs to zippers, vapor barriers, Kevlar shells, and miscellaneous protective equipment were performed in 2018. The addition of a specialized heat press and a new serger sewing machine allowed the repair specialist to perform repairs on department wetsuits and drysuits in support of the water rescue program. The cost savings for these inspections and repairs had a net total of over \$109,000 dollars for the City of

Kirkland. Additionally, the PPE team continued the tradition of repairing bunker gear during recruit academies for surrounding jurisdictions. These outside agencies are billed for the inspection and repair services provided. Our regional assistance allows the recruit academies to continue to train without interruption.

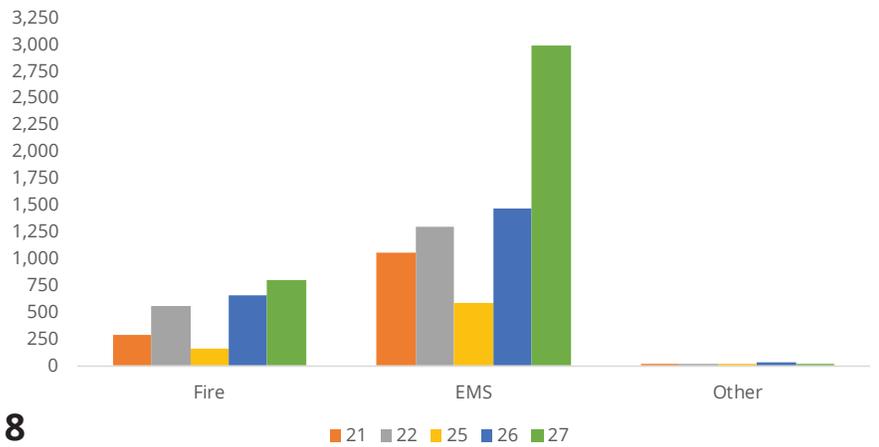
Our two repair specialists, Firefighters Cliff Oleszko and Jesse Disch, also manufacture items to assist in carrying, securing or storing equipment. Utilizing recycled fire hose, bunker gear fabric and straps, Firefighters Oleszko and Disch created SCBA bottle carrying straps, flashlight holders, rescue saw webbing slings, Large Diameter Hose (LDH) securing straps, and SCBA mask bags to better protect our breathing apparatus. Repurposing of materials allows the department to meet operational needs, reduce waste, and create savings for the organization.



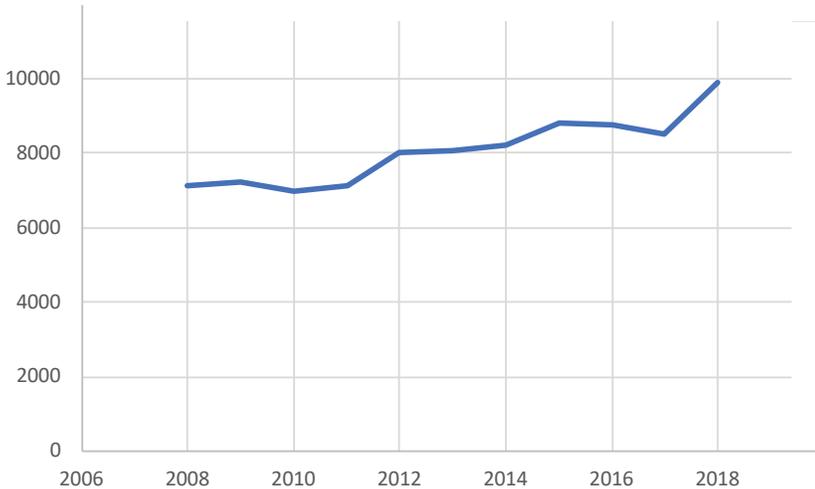
TOTAL CALL LOG

2018 Total Calls for Service

CALL TYPE	STATIONS					Total
	21	22	25	26	27	
Fire	287	553	158	654	799	2,451
EMS	1,051	1,297	584	1,470	2,985	7,387
Other	10	11	5	26	25	77
Total	1,348	1,861	747	2,150	3,809	9,915



Total Calls for Service 2008-2018



Automatic Aid Received 2014-2018

	2014	2015	2016	2017	2018
Bellevue	118	133	138	157	166
Bothell	40	46	41	40	39
Northshore	46	47	44	45	29
Redmond	84	101	128	92	98
Woodinville	56	78	70	72	73
Other	3	3	7	4	-
Medic	1,144	1,324	1,582	1,693	1,544
Total	1,491	1,732	2,010	2,103	1,949

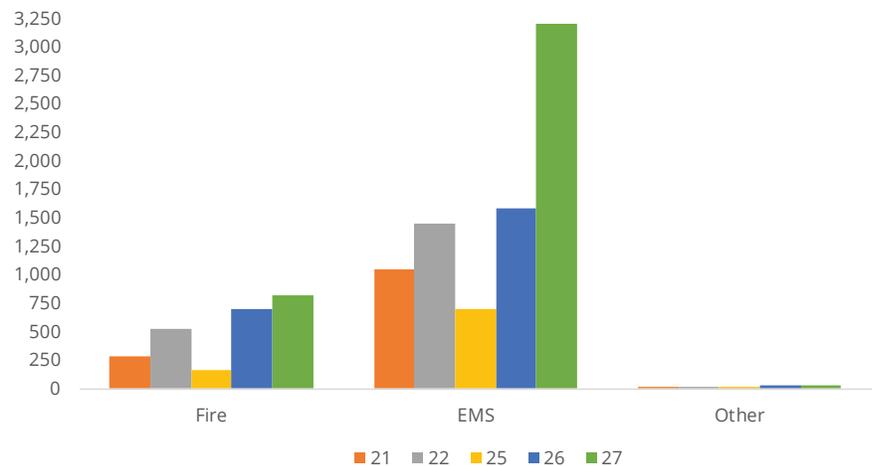
Emergency Response Totals by Unit 2014-2018

	2014	2015	2016	2017	2018
Aid 21	892	890	951	970	967
Aid 22	1,216	1,286	1,320	1,182	1,274
Aid 24	124	*	*	*	*
Aid 25	533	609	606	588	546
Aid 26	959	1,074	1,071	1,120	1,104
Aid 27	2,033	2,223	2,011	1,511	1,633
Aid 29	447	483	659	1,105	1,039
Engine 21	388	449	460	428	389
Engine 22	729	727	785	755	718
Engine 25	206	214	190	188	340
Engine 26	601	626	652	578	629
Engine 27	730	726	679	642	566
Engine 28	6	7	*	*	11
Ladder 27	798	914	903	460	819
Battalion 21	570	582	642	550	539
Air Unit 21	55	38	57	53	36
Totals	10,287	10,848	10,986	10,130	10,610

*Ladder 26 was moved to Station 27 in June of 2011. This eliminated L26 and created L27. In addition, Station 27 went from one dedicated Aid Unit to two cross staffed Aid units.

2018 Total Emergency Responses

CALL TYPE	STATIONS					Total
	21	22	25	26	27	
Fire	291	532	162	695	825	2,505
EMS	1,055	1,446	705	1,584	3,208	7,998
Other	11	14	19	31	32	107
Total	1,357	1,992	886	2,310	4,065	10,610



2018 RESPONSE TIME GOALS AND OBJECTIVES

Kirkland Fire Department Response Goals

The Kirkland Fire Department response standards specify the criteria for response times to effectively deliver fire suppression and emergency medical services. KFD response times are designed to protect our community. The basis for our response time standard are the National Fire Protection Association's Standard 1710-The Standard for Organizing and Deployment of Fire Suppression Operations; the Kirkland Fire Department Strategic Plan; and Kirkland Standards of Coverage.

FIRE Calls Meeting Travel Standard

	All Calls	In Response Area	Out of Response Area
2014	59%	72%	25%
2015	58%	70%	27%
2016	58%	70%	27%
2017	57%	67%	53%
2018	48%	65%	18%

EMS Calls Meeting Travel Standard

	All Calls	In Response Area	Out of Response Area
2014	72%	80%	36%
2015	71%	78%	40%
2016	71%	78%	37%
2017	71%	77%	67%
2018	65%	74%	34%

2018 Response Data

Kirkland Fire Department Adopted Objective From 911 Call Pick-up to Arrival On Scene

- **EMS: 5:00** We meet this 57% of emergency incidents.
- **Fire: 5:30** We meet this 46% of emergency incidents.

Actual Total Response Time to EMS 90% of the Time – 7:56

Actual Total Response Time to Fires 90% of the Time – 9:56



ADVANCED LIFE SUPPORT (ALS) & NORCOM

Advanced Life Support response is provided in Kirkland by King County EMS through a contract with the City of Redmond Fire Department.

Medic response time standards are established by King County Medic One.

Medic Response Time Standard

The King County Medic response time objective is average unit response times less than 10 minutes, and 80% of calls in less than or equal to 14 minutes.

RESPONSE ANALYSIS

Incident Year	Call Volume
2018	1,544
2017	1,879
2016	1,644
2015	1,633



TOTAL 2018 MEDIC
CALLS IN KIRKLAND

1,544

Norcom 2018 data

The core mission of the North East King County Regional Public Safety Communication Agency (NORCOM) is to provide high quality emergency service communication to the public for emergency medical services, fire and police. We will carry out this mission by receiving calls for service; dispatching resources in response to such calls; tracking and coordinating information flow and resources to assist responders; initiating records for all emergency events; and enhancing effectiveness, efficiency, coordination and interoperability of emergency service providers.

www.norcom.org

- The City of Kirkland is represented on the executive board of NORCOM by the City Manager.
- Kirkland police and fire serve on the NORCOM operations board.
- In 2018 NORCOM received a total of 96,589 non-emergency calls for services and 175,923 emergency calls for service.
- In 2018 NORCOM added "text to 911" allowing 911 calls to be reviewed by text messaging. While calling 911 is always the quickest method to request help, texting can be very useful in situations where making a 911 phone call may not be practical.

NORCOM dispatch 2018 Performance Measures:

90% of 9-1-1 telephone calls will be answered within 10 seconds or less (barring major disasters or other extraordinary events)

- NORCOM answered 911 calls within 10 seconds or less 98.00% of the time in 2018

GOAL: 90% of emergency Fire/Medical (EMS) calls are dispatched within 60 seconds.

NORCOM processes Fire/EMS calls in under 60 seconds 86% of the time.



COMMUNITY RISK REDUCTION



FIRE PREVENTION BUREAU

The Kirkland Fire Prevention Bureau

contributes to the safety of those who live, work and play in Kirkland through five primary fire prevention functions:

- New-construction plan review and inspection
- Existing-building inspection and operational permits
- Fire investigation
- Local Code and Policy development
- Fire safety education

The Prevention Bureau currently has staffing of 5-1/2 members. Staff include the Fire Marshal, Assistant Fire Marshal, three Fire Inspector/Investigators and a half-time office specialist.

Among the bureau's accomplishments in 2018 is gaining approval for an additional inspector who will join the team in January of 2019.

Fire Plan Review of New Construction

Fire Prevention personnel review plans to confirm compliance with the International Fire and Building Codes, applicable local codes, ordinances, standards and regulations. This includes review of building sites for adequate fire department access, hydrant locations, adequate firefighting water supply, and proposed location of connections for firefighting systems. Furthermore, at this stage of review, fire protection systems are identified as required to be installed as a structure is completed. These include fire sprinkler systems, fire alarm systems, smoke control systems, and in-building emergency-responder-radio systems.

Fire Prevention personnel work closely with the Kirkland Building Services Division, as well as other City Departments, to ensure comprehensive and consistent enforcement of the International Codes and the Kirkland Municipal Code.

Year	Plan reviews SFR* new and additions	Plan Reviews Commercial	Plan Reviews Grading (LSM)	Plan Reviews Short Plats
2014	375	40	57	52
2015	438	39	57	58
2016	452	41	79	123
2017	454	18	69	31
2018	448	106	62	43
Year	Plan Reviews Zoning and Design	Plan Reviews Mechanical	Pre application conferences	Solar (PV)
2014	15	2	150	17
2015	10	3	170	38
2016	12	2	173	3
2017	8	1	156	4
2018	15	2	161	1

*SFR: Single-Family Residential

FIRE PREVENTION BUREAU

Fire Inspections of New Construction

Once permits are issued, Fire Prevention personnel perform inspections to ensure that the required fire protection features are installed correctly and as designed. Just as during the plan review process, we work cooperatively with the Building Division and other City departments such as Public Works to ensure a seamless inspection process for the developers and contractors.

Issuance of Operational (IFC) Permits

Some types of use, storage or activities have extra potential to create risk in the community. To manage and reduce this additional risk, conditions and special rules for these hazardous operations are defined and memorialized in the form of an operational permit. Commonly issued operational permits are for fireworks displays, hazardous materials, large commercial tents, bonfires, hot work and a variety of other hazardous activities.

Year	Fire system Permits issued	Fire Protection System Inspections	IFC Permits issued	IFC Inspections
2014	291	1157	26	28
2015	283	1966	48	91
2016	345	1193	65	87
2017	333	2034	48	71
2018	376	2418	49	39

Annual Fire Safety Inspection Program

Fire Prevention personnel are responsible for managing the annual fire safety inspection program. Occupancies in the City receive a fire and life safety inspection annually. Citizens will often see their firefighters around Kirkland conducting inspections. Firefighters focus on discovering and correcting conditions likely to cause a fire or life safety hazard. In 2016, Prevention paused normal inspections procedures to purchase and install new inspection software. The new software allows firefighters to more accurately track completed inspections, occupancy contact information and required corrections. With the efficiencies gained by implementing new software, our firefighters will be able to complete inspections faster and eliminate redundancy. Throughout 2018, milestones have been reached in the implementation of the improved inspection program. More than 9,000 occupancy records were organized, scrubbed, and uploaded to the new software application; training was developed and delivered to test crews; and nearly 100 test inspections were completed to prepare for roll out to operations crews early in 2019.

Fire Investigations

The Fire Prevention Bureau is mandated to conduct fire investigations to determine the origin and cause of all fires which occur within the City of Kirkland. Fire Investigators work closely with the Kirkland Police Department in the event that a fire is suspicious or is determined to be arson.

All investigators are trained to national standards, attending the National Fire Academy in Emmitsburg, Maryland, gaining certification through the

Washington State Patrol, and from the International Association of Arson Investigators (IAAI). Kirkland is an active member of Zone 1 Fire Investigators and Zone 1 Fire Marshals.

Year	Company Level Fire inspections	Company Officer Investigations reviewed	Investigator reports
2014	1551	90	57
2015	1164	115	48
2016	0	131	22
2017	0	127	18
2018	94	126	21

Code and Policy Development and Publication

The Fire Marshal is responsible for developing and publishing policies related to established fire prevention goals. These policies are technical in nature and geared towards assisting developers and contractors in site and system design. In addition, the Fire Marshal is responsible for code and policy interpretations. The Fire Marshal coordinates with Fire Marshals in neighboring jurisdictions so that code interpretations and requirements are standardized throughout the region as much as possible.



WAYS TO IMPROVE LIFE SAFETY AND REDUCE PROPERTY LOSS

1

ANNUALLY TEST FIRE ALARMS, SPRINKLER SYSTEMS, HOOD AND DUCTS, AND FIRE EXTINGUISHERS.



2

ORGANIZE STORAGE AND KEEP ITEMS 18-24" BELOW THE CEILING



3

KEEP ELECTRICAL, MECHANICAL AND FIRE ACCESS ROOMS CLEAR OF STORAGE



4

REPAIR ELECTRICAL HAZARDS AND AVOID PIGGYBACKING EXTENSION CORDS



5

KEEP EXIT AND FIRE DOORS IN WORKING ORDER



City of Kirkland Fire Prevention Bureau
Life Safety & Property Loss Reduction
Questions? Call Fire Prevention at 425-587-3661



OFFICE OF EMERGENCY MANAGEMENT



OEM

2018 was a year of transition

and growth for the Office of Emergency Management (OEM). In June Heather Kelly was appointed the City Emergency Manager. In December the Council funded a full time Emergency Preparedness Coordinator position that was filled by Karissa Smith. Karissa began working with the City on January 2, 2019.

The Emergency Operations Center (EOC) tested staff and capability with an all-day exercise focusing on supporting the needs of the community when infrastructure is unavailable. This was followed by a City leadership exercise and a City council study session to round out the coordination of response at all levels.

Emergency Management and Kirkland Police staff traveled to Anniston, Alabama to train and exercise with Evergreen Medical Center leadership building skills and relationships that will benefit the community in a disaster.

OEM delivered training to City and regional participants on Incident Command, Public Information, and disaster operations. In partnership with the City GIS team, a windshield survey application was developed to assist the City in assessing damage following a major incident to allow for effective use of limited resources to support the community.

The dedicated volunteers of Emergency Management have been busy in 2018 as well. The Community Emergency Response Team (CERT) program held two eight-week long classes to add an additional 44 CERT graduates to the hundreds already trained. The volunteer presentation team staffed preparedness tables at DennyFest, Crossing Kirkland, Hermosa Vista Neighborhood Party, and the Norkirk Neighborhood/Lake Washington Christian Church preparedness event. The Map Your Neighborhood (MYN) program added 11 new neighborhoods to the program, trained 21 facilitators, and now has 34 MYN locations in Kirkland. Great work and effort by volunteer community members.

The Kirkland Emergency Communications Team (KECT) added several new participants to the team in 2018, supported the Crossing Kirkland event, and continues to build capability through training and drills.

OEM is looking forward to an active year of building and development for 2019.

CHAPLAIN'S REPORT

For 30 years the Chaplain's program in Kirkland has been a service to our citizens under unimaginable situations of pain and heartache.

The role of your Chaplain is twofold.

1. As requested by an on-scene commander, Chaplain Vince Armfield helps relatives and friends of people caught in crisis process the situation. The Chaplain takes care of these people and allows first responders to do their jobs with minimal distraction. The family is briefed on the protocols that are unfolding around them, offered comfort and help through what many times seems like chaos to them.
2. The Chaplain is a listening ear, a presence and a source of encouragement to first responders both on scene and at any time they need. Vince serves as a member of the Kirkland Police Dept. Peer Support Team.



Chaplain Vince Armfield

Chaplain Armfield meets people where they are and provides care and assistance wherever needed.

DEPARTMENT DIRECTORY 2019

GENERAL INFORMATION 425-587-3650

Headquarters - 123 Fifth Avenue, Kirkland 98033

Fire Administration

- Joe Sanford, Fire Chief 425-587-3602
- Tim Day, Deputy Chief 425-587-3601
- Dave Van Valkenburg, Deputy Chief..... 425-587-3605
- Joel Bodenman, EMS Captain..... 425-587-3663
- Audrey Martin, Administrative Services Supervisor..... 425-587-3658
- Victoria Davies, Administrative Assistant..... 425-587-3638
- Elijah Panci, Financial Analyst 425-587-3425
- Jim Fink, Mechanic 425-587-3880

Fire Prevention

- Mark Jung, Battalion Chief/Fire Marshal 425-587-3623
- Grace Steuart, Assistant Fire Marshal..... 425-587-3660
- Jason Chappell, Lieutenant/ Fire Inspector..... 425-587-3655
- Cory Caulk, Lieutenant/Fire Inspector 425-587-3657
- Todd Anderson, Fire Inspector..... 425-587-3639
- Renee Lirette, Fire Inspector..... 425-587-3653
- Teri Wallace, Office Specialist..... 425-587-3634

Training

- Bill Hoover, Battalion Chief 425-587-3698
- Marc Hallen, Captain..... 425-587-3697
- Anna Grimes, Office Specialist 425-587-3641

Office of Emergency Management

- Heather Kelly, Emergency Manager 425-587-3670
- Karissa Smith, Emergency Preparedness Coordinator 425-587-3691

PLAN OF ACTION

- Participate in citywide discussions on Phase II of the Public Safety Initiative in preparation for 2020 bond measure.
- Plan, design and begin construction of a new Station 24 in the Juanita neighborhood.
- Institute hiring plan to support staffing of new Station 24.
- Evaluate and purchase thermal imaging cameras for all Kirkland Fire Department response vehicles.
- Establish work plan for Mobile Integrated Health (MIH) program for delivery of alternative service to at-risk and vulnerable populations in the City.
- Design and build training prop at Station 26 in support of improved training opportunities within city limits.
- Develop sustainable wildland/urban interface program to support statewide firefighting efforts.



THANK YOU CARDS

To The Kirkland Fire Department,

Thank you so much for coming to our school and letting us on to your fire truck. We all loved it!

Love from

The kids, staff and PTA at Franklin Elementary

Auto Presorted
First-Class Mail
U.S. Postage Paid
Permit 4987
Phoenix, AZ



This photo was taken on 1 Oct 2018 in Kirkland, WA, USA. Sent using TouchNote.

DEPUTY CHIEF DAVE VAN
VALKENBURG
123 5TH AVE
KIRKLAND FIRE DEPT
KIRKLAND, WA 98033-6121





CITY OF KIRKLAND FIRE DEPARTMENT