



PRESCOTT FIRE DEPARTMENT AND CENTRAL ARIZONA FIRE AND MEDICAL AUTHORITY

2024

COMMUNITY RISK ASSESSMENT/ STANDARDS OF COVER



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Prescott Fire Department and Central Arizona Fire and Medical Authority

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Executive Summary

We are pleased to introduce this joint Risk Assessment and Standards of Cover (CRA/SOC) to our local communities. This innovative planning approach represents a strategic partnership between the Prescott Fire Department and the Central Arizona Fire and Medical Authority as it is the first time two jurisdictions have authored a CRA/SOC from a regional perspective in the State of Arizona.

The concept for this approach arose from leveraging the response model tailored to our respective communities. Both agencies routinely dispatch the nearest appropriate resource, regardless of organizational boundaries, to



Fire Chief Holger Durre

promptly address incidents in the community. Therefore, it is important to conduct a comprehensive evaluation of the performance of this approach. It is equally important to recognize that the risks we collectively manage transcend political boundaries. For instance, wildfire threats affect both agencies and may be geographically contiguous. Because of this, a collaborative assessment of the factors influencing and guiding our programs should be founded on a shared evaluation to facilitate the development of impactful initiatives in response.



Interim Fire Chief John Feddema

Both agencies are currently grappling with challenges stemming from rapid community growth, heightened service demands, limited funding, and escalating costs. These challenges have hindered our ability to consistently meet the elevated expectations of our stakeholders. Consequently, both departments have adopted a more reactive stance, which is not as effective in addressing these issues.

The CRA/SOC holds significant importance in reorienting each department towards a more proactive approach. In response to this, we are introducing several initiatives centered on community risk reduction, particularly in wildfire mitigation, emergency management, and addressing low-acuity calls. Additionally, we are investing in technology to increase efficiency and prioritize the well-being of our firefighters.

We look forward to implementing the numerous recommendations outlined in this CRA/SOC and using this approach as a blueprint to develop enduring, impactful solutions for our community. Thank you for joining us on this

journey!

Holger Durre Fire Chief Prescott Fire Department John Feddema Interim Fire Chief Central Arizona Fire & Medical Authority

A. Description of Community Served

Introduction

Both agencies collectively serve several key communities in central Yavapai County, in the heart of northern Arizona. This region is situated at the edge of the Arizona Highlands and features diverse topography and a rich history. It encompasses lush forests, rolling hills, and a high desert landscape formed through volcanic activity.

At the core of Central Yavapai County lies the historic city of Prescott, renowned for its charming downtown square, Victorian architecture, and lively arts scene. For outdoor enthusiasts, Central Yavapai County is a playground of adventure. Hiking trails wind through stunning landscapes, while kayaking and fishing opportunities abound along the Verde River. Prescott National Forest provides endless opportunities for camping, mountain biking, and horseback riding amidst towering ponderosa pines and crystalline lakes.

Throughout the region, a strong sense of community prevails, fostered by local festivals, farmers' markets, and cultural events that celebrate the region's heritage and diversity. Whether exploring the great outdoors, immersing oneself in history and culture, or simply savoring the small-town charm, Central Yavapai County invites visitors to experience the magic of Arizona's heartland.

The Prescott Fire Department (PFD) and the Central Arizona Fire and Medical Authority (CAFMA) have had a close automatic aid partnership for several decades. This partnership has led to collaboration in almost every aspect of both organizations. To accurately assess community risk and their collective response system, the two organizations have decided to jointly prepare a Community Risk Assessment and Standards of Cover as outlined by the Commission on Fire Accreditation International (CFAI). While each agency can present its risk and performance specific to each jurisdiction, this collective approach allows for a more accurate representation of the service that both agencies provide to their residents. Through a robust automatic-aid contract, the risk within the region is shared. Resources from either jurisdiction often find themselves working outside of their regular response zones, creating a dynamic where the agencies collectively understand, train, and respond to identified all-risk hazards regionally. Seamlessly, a CAFMA resource could find itself in PFD's jurisdiction and vice versa. In addition, resources could be working in tandem on incidents.



Prescott, in the central region of Arizona, is often called "Everybody's Hometown." It is a charming location that boasts unique features and characteristics. These include:

- 1. **Historic Downtown**: Prescott is renowned for its well-preserved historic downtown area. Whiskey Row, a block of old saloons and shops dating back to the 1800s, is a major attraction. The Courthouse Plaza, surrounded by Victorian-era buildings, hosts events, festivals, and farmers' markets throughout the year.
- 2. **Natural Beauty**: The city is set amidst the stunning landscapes of the Bradshaw Mountains and Prescott National Forest. Lakes like Watson Lake and Lynx Lake offer opportunities for fishing, boating, and hiking, while Thumb Butte and Granite Mountain provide scenic hiking trails with panoramic views.
- 3. **Mild Climate**: Prescott enjoys a mild four-season climate, with cool winters and comfortable summers. Its elevation of around 5,000 feet contributes to cooler temperatures compared to lower desert areas in Arizona.
- 4. **Cultural and Artistic Scene**: Prescott has a vibrant arts and culture scene, with numerous art galleries, theaters, and museums. The Phippen Museum celebrates Western art, while the Smoki Museum focuses on Native American history and culture.

- 5. **Education and Healthcare**: The city is home to Prescott College, a liberal arts institution known for its environmental and social justice programs. It also has reputable healthcare facilities, including Yavapai Regional Medical Center.
- 6. **Outdoor Recreation**: Prescott is a paradise for outdoor enthusiasts. Besides hiking and water activities, the area offers opportunities for mountain biking, rock climbing, and golfing. The nearby Prescott National Forest provides extensive trails for exploration.
- 7. **Events and Festivals**: Prescott hosts several annual events, such as the World's Oldest Rodeo, the Prescott Bluegrass Festival, and the Frontier Days Parade. These events showcase the city's Western heritage and community spirit.
- 8. **Quality of Life**: With its small-town charm, friendly community, and low crime rates, Prescott offers a high quality of life. It is a popular destination for retirees, families, and young professionals alike.
- 9. **Real Estate**: The real estate market in Prescott includes a mix of historic homes, modern developments, and properties with scenic views. The diverse housing options cater to various preferences and budgets. Overall, Prescott's blend of history, natural beauty, cultural richness, outdoor recreation, and a strong sense of community makes it a beloved destination for residents and visitors seeking a balanced and fulfilling lifestyle in Arizona.

Overall, Prescott's blend of history, natural beauty, cultural richness, outdoor recreation, and a strong sense of community makes it a beloved destination for residents and visitors seeking a balanced and fulfilling lifestyle in Arizona.



Prescott Valley, located in north-central Arizona, is a thriving community known for its family-friendly environment, outdoor recreational opportunities, and scenic beauty. Here's a detailed description of Prescott Valley:

- 1. **Residential Communities**: Prescott Valley is characterized by a variety of residential neighborhoods, including single-family homes, townhouses, and retirement communities. The town's real estate options cater to a diverse range of lifestyles and preferences.
- 2. **Outdoor Recreation**: The area surrounding Prescott Valley offers abundant opportunities for outdoor activities. Residents and visitors can enjoy hiking, mountain biking, camping, and picnicking in nearby national forests and parks. Watson Lake and Lynx Lake are popular destinations for fishing, boating, and kayaking.
- 3. **Sports and Entertainment**: The town is home to the Prescott Valley Event Center, a multipurpose arena that hosts sporting events, concerts, and community gatherings. The nearby Findlay Toyota Center also offers entertainment options, including concerts, comedy shows, and sporting events.
- 4. **Educational Facilities**: Prescott Valley is served by the Humboldt Unified School District, providing quality education from elementary to high school levels. Additionally, Yavapai College offers higher education and vocational training programs in the area.
- 5. **Shopping and Dining**: The town features a variety of shopping centers, restaurants, and cafes. Residents have access to major retailers, grocery stores, and local boutiques, making it convenient for daily necessities and leisure activities.
- 6. **Healthcare Services**: Prescott Valley has medical facilities and healthcare providers, ensuring access to quality healthcare services for residents. The Yavapai Regional Medical Center is a prominent healthcare facility in the region.

- 7. **Community Events**: Throughout the year, Prescott Valley hosts community events, festivals, and cultural activities. These events bring the community together and showcase the town's vibrant spirit and sense of community pride.
- 8. **Scenic Surroundings**: Prescott Valley enjoys picturesque surroundings, with views of the Bradshaw Mountains and the Prescott National Forest. The town's elevation provides cooler temperatures and refreshing mountain air, especially during the summer months.
- 9. **Growing Economy**: The town's economy has diversified over the years, with sectors such as healthcare, retail, hospitality, and professional services contributing to its growth. Prescott Valley offers opportunities for employment and entrepreneurship.

Overall, Prescott Valley combines a welcoming community atmosphere, outdoor recreational amenities, educational resources, and economic opportunities, making it a desirable place to live for individuals and families seeking a balanced and fulfilling lifestyle in Arizona.



Chino Valley, nestled in the high desert of north-central Arizona, is a tranquil and picturesque town renowned for its rural charm, natural beauty, and rich history. Here's a detailed description of Chino Valley:

- 1. **Scenic Landscape**: Chino Valley is surrounded by panoramic views of rolling hills, juniper, and piñon pine forests, and the distant peaks of the Bradshaw and Mingus Mountains. The area's natural beauty is accentuated by wide-open spaces and a serene atmosphere.
- 2. **Rural Charm**: The town retains its rural character with vast expanses of farmland, ranches, and open fields. You'll often see horses grazing and agricultural activities like hay production, cattle ranching, and farming, which reflect Chino Valley's agricultural heritage.
- 3. **Historic Roots**: Chino Valley has a deep history dating back to Native American settlements and early pioneer days. The town's historical sites, such as the Chino Valley Historical Society Museum, offer insights into its past through exhibits, artifacts, and preserved buildings.
- 4. **Community Spirit**: The town fosters a strong sense of community, where neighbors know each other, and local events and gatherings are cherished. Community activities, including farmers' markets, festivals, and volunteer initiatives, contribute to the close-knit atmosphere.

- 5. **Outdoor Recreation**: Chino Valley offers ample opportunities for recreation for Outdoor Enthusiasts. The nearby Prescott National Forest offers hiking, biking, camping, and wildlife viewing experiences. Lakes like Granite Basin Lake and Willow Lake are popular for fishing and boating.
- 6. **Education and Services**: The Chino Valley Unified School District serves Chino Valley, providing educational opportunities from elementary to high school. The town also has essential services such as healthcare facilities, grocery stores, and small businesses to meet residents' needs.
- 7. **Real Estate**: Chino Valley's real estate landscape includes a mix of properties, from sprawling ranches and horse properties to residential neighborhoods with single-family homes. The town's real estate market appeals to those seeking a peaceful rural lifestyle.
- 8. **Quality of Life**: Residents enjoy a high quality of life in Chino Valley, with clean air, low crime rates, and a relaxed pace of living. The town's proximity to larger cities like Prescott offers conveniences while maintaining its small-town charm.
- 9. **Economic Opportunities**: While agriculture remains significant, Chino Valley's economy has diversified with small businesses, retail establishments, and services catering to both residents and visitors. The town's economic stability contributes to its appeal as a residential destination.

Overall, Chino Valley's blend of natural beauty, historical significance, community spirit, and outdoor recreation opportunities makes it an inviting and idyllic place to call home for those seeking a peaceful and authentic Arizona experience.

Dewey-Humboldt, located in central Arizona, is a charming town known for its small-town atmosphere, scenic surroundings, and rich mining history. Here's a detailed description of Dewey-Humboldt:

> Historical Background: Dewey-Humboldt has a fascinating history tied to mining and early settlement. The area was once a bustling mining town, and remnants of this heritage can still be



seen in the historic buildings and artifacts preserved throughout the town.

- 2. **Rural Charm**: The town's rural charm is evident in its wide-open spaces, agricultural areas, and panoramic views of the surrounding mountains. Residents appreciate the slower pace of life and the sense of community that comes with living in a smaller town.
- 3. **Scenic Beauty**: Dewey-Humboldt is surrounded by scenic landscapes, including the Bradshaw Mountains to the south and the Prescott National Forest to the north. Outdoor enthusiasts can explore numerous hiking trails, enjoy wildlife viewing, and take in breathtaking vistas.

- 4. **Outdoor Recreation**: The town offers ample opportunities for outdoor recreation. Residents and visitors can hike, bike, camp, and ride horseback in nearby natural areas. The nearby Agua Fria National Monument is a haven for outdoor adventures.
- 5. **Community Events**: Dewey-Humboldt hosts various community events and festivals throughout the year, fostering a strong sense of community spirit. These events often celebrate the town's history, culture, and natural surroundings.
- 6. **Education and Services**: The town is served by the Humboldt Unified School District, providing educational facilities for people from elementary to high school levels. Essential services such as healthcare, shopping, and dining options are available within the town and nearby areas.
- 7. **Real Estate**: Dewey-Humboldt offers a mix of housing options, including single-family homes, ranch properties, and acreages. The real estate market caters to different preferences, from those seeking a quiet rural lifestyle to others looking for modern conveniences.
- 8. **Mining Heritage**: The town's mining history is evident in its museums, historic sites, and miningrelated attractions. Visitors can learn about the area's mining legacy and its impact on the town's development.
- 9. **Quality of Life**: Residents of Dewey-Humboldt enjoy a high quality of life with clean air, scenic beauty, and a close-knit community. The town's proximity to larger cities like Prescott provides access to additional amenities and services.

Overall, Dewey-Humboldt offers a blend of historical charm, natural beauty, outdoor recreation, and a strong sense of community, making it an appealing destination for those seeking a peaceful and authentic Arizona experience.

Pauldenis primarily known for its rural charm and beautiful natural surroundings. While it may not be famous for any specific landmark or attraction, it offers a serene and picturesque environment for those who appreciate small-town living and outdoor activities.Here are a few aspects for which Paulden is known:

> 1. Scenic Beauty: Paulden is nestled in the stunning landscape of northern Arizona, surrounded by



rolling hills, vast open spaces, and panoramic mountain views. Its natural beauty attracts nature lovers, photographers, and outdoor enthusiasts.

2. **Rural Lifestyle**: The community embodies a slower pace of life and a close-knit, small-town atmosphere. Residents and visitors alike enjoy the simplicity and tranquility of rural living.

- **3. Outdoor Recreation**: The area around Paulden offers numerous opportunities for outdoor recreation, including hiking, camping, horseback riding, and off-roading. The nearby Prescott National Forest provides access to miles of trails and scenic spots.
- 4. **Agriculture and Ranching**: Paulden's economy has a significant agricultural component, with several ranches and farms in the area. It is known for its ranching heritage and agricultural production, contributing to the local economy and culture.
- **5. Gateway to Northern Arizona**: While Paulden itself is a small community, its proximity to larger cities like Prescott and Flagstaff makes it a convenient stop for travelers exploring northern Arizona. It serves as a gateway to the region's attractions, including national parks, historic sites, and outdoor adventures.

Overall, Paulden offers a peaceful retreat and a taste of rural Arizona life for both residents and visitors.

Community and Department Legal Basis

Prescott

Prescott exists legally as a home-rule city within the state of Arizona. It follows a typical municipal model of governance, with a mayor, city council, and administrative departments. The city operates under a charter that outlines its powers, responsibilities, and decision-making mechanisms.

The city council, elected by the residents, serves as the legislative body responsible for enacting ordinances, approving budgets, and setting policies. The mayor elected separately, acts as the city's ceremonial head and often plays a key role in representing Prescott's interests to external entities. The mayor and six city council members are elected at large. The mayor serves a two-year term, and council members serve overlapping four-year terms.

Prescott's legal framework encompasses zoning regulations, building codes, and other ordinances designed to maintain the city's character, promote public safety, and ensure sustainable growth. Also, the city operates within the broader legal framework established by Arizona, adhering to state laws and regulations governing matters such as taxation, land use, and public services.

The council, by City Ordinance #25 dated February 9, 1882, and a nearly identical City Ordinance #25 dated March 3, 1885, formally and legally established and constituted the city of Prescott Fire Department. The state of Arizona is authorized to review and approve city charters throughout the state and promulgate the authority contained therein through powers granted to the governor of Arizona. These powers are described and vested in the legislature of Arizona, in Constitutional Article XIII, Section 5, and Section 9-281 through 9-284, et seq., as amended.

CAFMA

The Central Yavapai and Chino Valley Fire Districts are legally formed and organized under Arizona Revised Statues (A.R.S. Title 48 – Special Taxing Districts, Chapter 1 – General Provisions, Article 10 – District Creation and Boundary Changes, §48-261, and Chapter 5 – Fire Districts, Article 1 – General Provisions. Subsequently, the Central Arizona Fire and Medical Authority is legally formed and organized through a Joint Powers Authority Agreement, as per A.R.S. §48-805.01, and as confirmed by the State of Arizona Office of the Attorney General Opinion No. 118-003 (R17-021).

A.R.S. §48-802 through A.R.S. §48-824 defines the powers and duties of the Board of Directors, including authorizing the Fire Districts to levy taxes and expend funds to employ personnel and provide services deemed necessary for fire protection, for the preservation of life and for carrying out its other powers and duties.

The Authority has established policies and guidelines to address operational and administrative structure and practices, and Board Policy Manuals for the governing boards. Central Yavapai Fire District (CYFD) and Chino Valley Fire District (CVFD) are both governed by a five-member non-partisan board elected at large by the registered voters of the district. Board members are elected to alternating four-year terms so there are at least two members elected every two years. The Board establishes policy, sets tax rates, and approves the annual budget. As a special district of the State, the Fire District must comply with all applicable Arizona Revised Statutes, including Open Meeting Laws. The Central Arizona Fire Medical Authority consists of a five-member board drawn from each fire district board.

History of the Community

Prescott

Prescott has a long and unique history. The original town site was selected in 1864 along the eastern bank of Granite Creek, a tributary of the Verde River, and was officially incorporated in 1881. Early economy included cattle ranching and mining for gold, copper, and silver; Prescott soon became the economic and political center for this part of the state. The wooden buildings in the town's commercial district were largely destroyed by fire in 1900. Most of the buildings were rebuilt with brick and masonry and are still standing. Today, Prescott is home to many historic buildings, Whiskey Row, and the oldest frontier saloon in Arizona.

Chino Valley

The town's name, "Chino," is derived from the Spanish word for "curly," referring to the curly grasses that grow abundantly in the region. The establishment of a stagecoach stop and a post office in the late 1800s further solidified Chino Valley's position as a hub for trade and transportation in the region.

Throughout the 20th century, Chino Valley continued to grow and evolve, becoming known for its strong agricultural heritage and close-knit community. In recent decades, the town has experienced residential and commercial development, attracting new residents drawn to its small-town charm, affordable housing, and scenic surroundings.

Prescott Valley

The history of Prescott Valley dates to the late 19th century when settlers began to establish homesteads in the area, attracted by the fertile land and opportunities for agriculture. The town's development gained momentum in the mid-20th century with the construction of the Prescott Valley Irrigation Project, which provided water for farming and residential use, further stimulating growth in the region.

Incorporated as a town in 1978, Prescott Valley experienced rapid expansion in the late 20th century, fueled by its proximity to the larger city of Prescott and its reputation as a desirable place to live, work, and raise a family. The town's strategic location along major transportation routes, including Interstate 17 and State Route 69, has contributed to its accessibility and economic success.

Dewey-Humboldt

The history of Dewey-Humboldt traces back to the late 19th century when the area was primarily inhabited by ranchers and miners attracted by the region's natural resources. The town of Dewey was established in the late 1800s as a stagecoach stop along the Prescott-to-Phoenix route, providing essential services to travelers and settlers moving through the area.

Mining played a significant role in the early development of Dewey-Humboldt, with several mines operating in the surrounding mountains, extracting minerals such as gold, silver, and copper. The establishment of the Bradshaw Reduction Works in nearby Humboldt further bolstered the town's economy, providing employment opportunities and contributing to its growth.

In the 20th century, Dewey-Humboldt evolved into a thriving agricultural community, with farms and ranches dotting the landscape and producing crops such as cotton, alfalfa, and vegetables. The town's picturesque location and mild climate also attracted retirees and outdoor enthusiasts seeking a peaceful retreat amidst the beauty of the Arizona countryside.

Paulden

Paulden, Arizona, situated in Yavapai County, has a rich history deeply tied to the development of the American West. The area that would become Paulden was originally inhabited by Native American tribes, including the Yavapai and Apache peoples, who lived there for centuries before European settlers arrived. The town itself was founded in the late 19th century as a stop along the historic Santa Fe, Prescott, and Phoenix Railway, which played a significant role in the region's development. The railroad facilitated the transportation of goods and people, spurring economic growth in the area. Paulden was named after John S. Paulden, a pioneer settler who arrived in the area around 1880. The town grew slowly at first, primarily serving as a small trading post and agricultural hub.

Agriculture has been a central part of Paulden's economy since its early days. The fertile land in the surrounding area proved ideal for farming and ranching, and crops like alfalfa, corn, and hay became mainstays of the local economy. In more recent times, Paulden has experienced growth and development, particularly as a residential area for those seeking a quieter, rural lifestyle within commuting distance of larger cities like Prescott and Flagstaff. Despite this growth, Paulden has retained much of its small-town charm and rural character.

Like many small towns in the American West, Paulden has a close-knit community with a strong sense of local pride. Residents often participate in community events, local fairs, and agricultural activities that celebrate the town's heritage. Today, Paulden continues to be a small but vibrant community, embracing its Western roots while adapting to the demands of the modern world.

Community Financial Basis

Prescott¹

The City of Prescott government uses various funding sources to support municipal operations and meet its community's needs. These sources include taxes, fees, grants, and other revenue streams. The city's budgeting process involves strategic planning and allocation of resources to prioritize essential services, infrastructure investments, and strategic initiatives aimed at enhancing the quality of life for both residents and visitors.

Prescott, along with other municipalities in Arizona, relies heavily on sales tax and state-shared revenues to finance their General Fund. Property taxes contribute less than 5% of the city's tax revenues. The total 2022 property tax rate, which includes primary and secondary rates, is 6.437 per \$100 assessed value for City residents. However, the City of Prescott's 2022 rate is significantly lower, at only 0.2281 per \$100 assessed value, representing just 3.5% of the total property tax for residents. The remaining property tax is levied by other entities, including Yavapai County (33.0%), Prescott Unified School District (39.4%), Yavapai College (23.3%), and Mountain Institute (.8%).

Additionally, the combined Privilege and Use Tax (sales tax) rate in the City of Prescott for most taxable activities is 8.35%. This combined rate comprises 5.6% for the State of Arizona, 0.75% for Yavapai County, and 2.00% for the City of Prescott. It is worth noting that the City's sales tax and property tax rates are the lowest in the Greater Prescott area.

Transaction Privilege (Sales) Tax

¹City of Prescott FY 2024 Budget

Most revenues for city operations come from sales tax. Cities and towns in Arizona have the power to establish certain taxes for revenue purposes. The local sales tax, also known as the transaction privilege tax, is a significant source of local taxes. The City of Prescott is authorized to levy a local sales tax under Article VI, Section 7 of its charter, and requires voter approval for a local rate exceeding 1%.

The combined sales tax rate for all taxable activities in the City of Prescott is 8.35%, consisting of 5.6% for the State of Arizona, 0.75% for Yavapai County, and 2.00% for the City of Prescott. Of the city's 2% rate, 1% is allocated for Streets, and 1% is for the General Fund. The local sales tax also includes taxation of residential and commercial rentals, utilities, communications, construction activities, restaurants, and bars.

Property Tax

According to Arizona Revised Statutes §42-17151(A), a municipality has the legal authority to impose a property tax. In Arizona, there are two types of property tax - primary and secondary. The primary property tax can be used for any general city operations, while a secondary property tax can only be levied to serve voter-approved General Obligation bonds. The revenue generated from the secondary property tax goes to the Debt Service fund, while the primary property tax is a source of revenue for the General Fund. It is essential to note that the primary property tax levy provides less than 5.4% of General Fund revenue and only allows minimal annual increases as per state law. In the City of Prescott, residents contribute a total of 3.5% to the City of Prescott, while the remaining tax collections go to Yavapai County.

Franchise Taxes

Franchise taxes in the city are based on utility franchise agreements. Unisource Gas and Arizona Public Service provide gas and electric services in the city, and the franchise fee rates are set at 2% of their gross revenues. Cable One has been granted the cable TV license for the City of Prescott, and the franchise fee rate, which is negotiated in the contract, is set at 5.0% of their gross revenues.

Intergovernmental Revenues - State-Shared Revenues

The State of Arizona collects and subsequently distributes revenue to incorporated cities and towns, including income tax (urban revenue sharing), transaction privilege tax (state shared sales tax), state gasoline tax (Highway User Revenue Fund (HURF)), and vehicle license tax (VLT). It is important to note that all these revenues, except for HURF, are classified as General Fund revenue. HURF is restricted for transportation and is included in the Streets Fund. State-shared revenues are subject to fluctuations in economic activity and changes in Prescott's population relative to the population in the county and state. Unfortunately, the proportional share of State Shared Revenue of the City of Prescott is decreasing due to its slower growth rate compared to other communities.

State Sales Tax (Transaction Privilege Tax): Prescott's citizens and visitors contribute to the State's revenue by paying a sales tax of 5.6% on taxable transactions at local businesses. A percentage of this tax is refunded to the city based on the ratio of Prescott's population to the combined population of all incorporated cities and towns in the State.

State Income Tax: The State of Arizona collects income taxes and shares that revenue with incorporated cities and towns based on population. The portion of the State income tax that will be distributed to cities and towns represents individual and corporate income tax collections by the State two years ago.

Vehicle License Tax (Auto Lieu Tax): Twenty-five percent of the net revenues collected for the licensing of motor vehicles by the State in a particular county are distributed back to incorporated cities and towns within that county based on its population in relation to the total incorporated population of the county.

Other Revenues Licenses and Permits

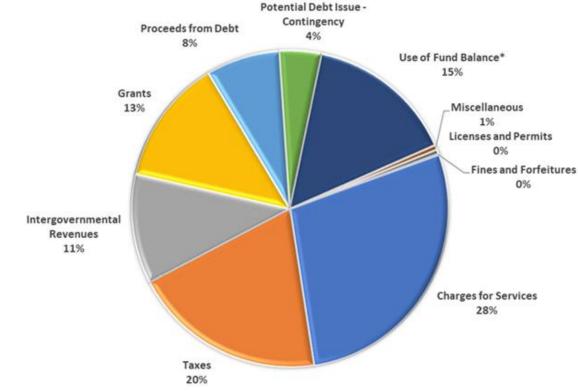
This revenue classification is primarily comprised of revenue generated from building permit fees. Other sources of revenue in this category include transaction privilege tax license fees, business license fees, dog licenses, blasting permits, and film permits. The city has experienced a notable upswing in building activity. On September 24, 2019, the Council decided to rescind the business license fee implemented on January 1, 2017.

Service Charges

These revenues primarily come from partner contributions for the Regional Communications Center, a joint dispatch facility, a contract with the Yavapai Prescott Indian Tribe for fire protection services, rental fees for facilities, as well as recreation fees for parking and programs.

Fines and Forfeitures

This category covers fees paid to the City of Prescott for fines assessed by the Police Department, City Court, Legal Department, and Library.



The following chart shows the funding mechanisms that were described above:

Figure 1: Revenue Sources

CAFMA

The financial basis of the Central Arizona Fire and Medical Authority (CAFMA) is primarily derived from property taxes; however, a small portion of the budget is funded by alternate funding sources.

Property Taxes: CAFMA receives funding through property taxes levied within the communities it serves. Property tax revenue constitutes a significant portion of the authority's budget and is crucial for maintaining essential services and infrastructure.

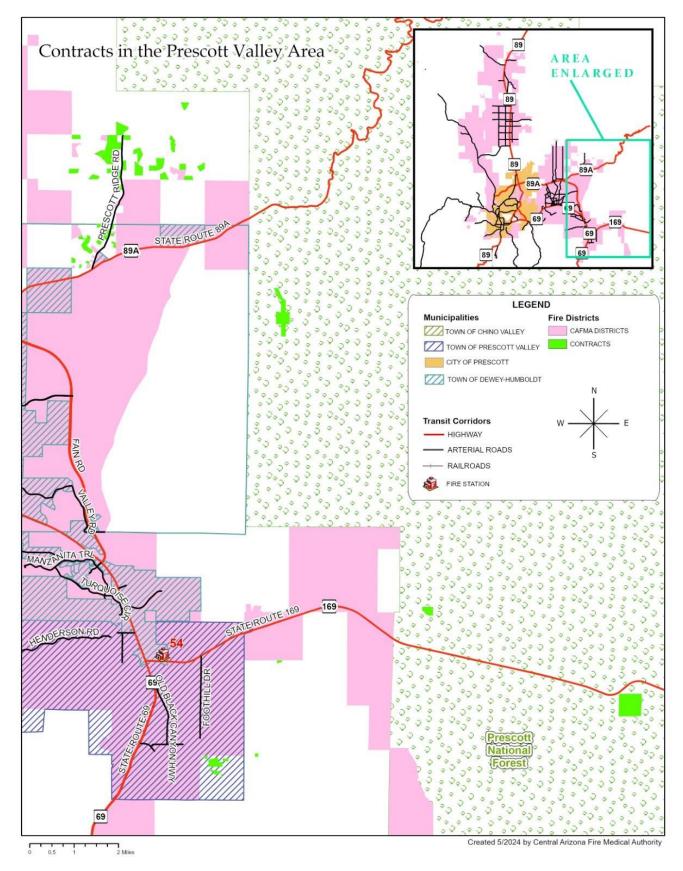
Government Grants and Aid: CAFMA may also receive grants and financial aid from local, state, and federal government agencies. These grants can be used to fund specific programs, purchase equipment, or improve emergency response capabilities.

Service Fees: CAFMA charges fees for fire protection outside of jurisdictional boundaries, and other services provided to residents and businesses. These fees help offset operational costs and ensure sustainable funding for ongoing operations.

Community Contributions: Additionally, CAFMA may receive contributions and donations from community members, businesses, and organizations. These contributions can provide supplemental funding for special projects, equipment purchases, or community outreach initiatives.

Intergovernmental Agreements: CAFMA may enter into agreements with other local government entities or agencies to share resources, services, or funding. These partnerships can help optimize resources and reduce costs while enhancing emergency response capabilities.

Map 1: Service Fee Area



Overall, CAFMA's financial basis is built on a combination of property taxes, government funding, service fees, community contributions, investment income, and intergovernmental agreements. While largely dependent on property tax revenue, by effectively leveraging these additional funding sources, CAFMA can fulfill its mission of providing high-quality fire protection and emergency medical services to the communities it serves in central Arizona.

Community Boundaries

The community boundaries for CAFMA and PFD are defined by district and municipal limits, which encompass a specific geographical area within Yavapai County, Arizona. These boundaries are established by legal and administrative processes, including annexation, zoning, and land use regulations.

CAFMA and PFD are fire and emergency medical services providers serving several communities in central Arizona. Below are some of the communities within their service area:

- Prescott
- Prescott Valley
- Chino Valley
- Paulden
- Williamson Valley
- Dewey-Humboldt

These communities are in Yavapai County, Arizona, and CAFMA serves both incorporated cities and unincorporated areas within its jurisdiction. PFD serves the municipality of Prescott. However, it is worth noting that fire department jurisdictions can change over time due to various factors such as population growth, annexation, or intergovernmental agreements.

Community Transportation Systems

The road network is well-developed and designed to provide efficient transportation throughout the community boundaries and its surrounding areas. Fire stations are placed strategically to provide an effective response within each planning zone. Here's an overview of the road network:

1. Highways:

- State Route 89: This major highway runs through Prescott, connecting it with other cities and towns in Arizona, including Chino Valley to the north and Prescott Valley to the south.
- State Route 69: State Route 69 intersects with State Route 89 in Prescott, providing a route to nearby communities such as Dewey-Humboldt, Mayer, and Interstate 17 to the east.
- Fain Road: This highway is an outer loop that connects to the south end at Highway 69, loops around the north end of Prescott Valley, and ties into State Route 89 in north Prescott.

2. Arterial Roads:

- Willow Creek Road: A significant north-south arterial road, Willow Creek Road serves as a major thoroughfare connecting Prescott's northern and southern parts.
- Gurley Street: Gurley Street is one of the main east-west arteries in downtown Prescott, lined with shops, restaurants, and historic buildings.
- Iron Springs Road: Iron Springs Road runs west from downtown Prescott, connecting residential areas with recreational areas in the Prescott National Forest.
- Glassford Hill Road: Running north-south, Glassford Hill Road is a significant arterial route in Prescott Valley. It intersects with SR 69 and provides access to various residential and commercial areas within the town.
- Viewpoint Drive: Another important north-south arterial road, Viewpoint Drive, intersects with SR 89A to the south and extends northward through Prescott Valley, providing access to neighborhoods, schools, and businesses.
- Lakeshore Drive: This road runs along the eastern edge of Prescott Valley, parallel to State Route 69. It provides access to residential areas and some commercial developments.
- Robert Road: Robert Road is an arterial road that runs north-south through the eastern part of Prescott Valley. It intersects with SR 69 and Lakeshore Drive and serves various neighborhoods and businesses.

3. Local Streets:

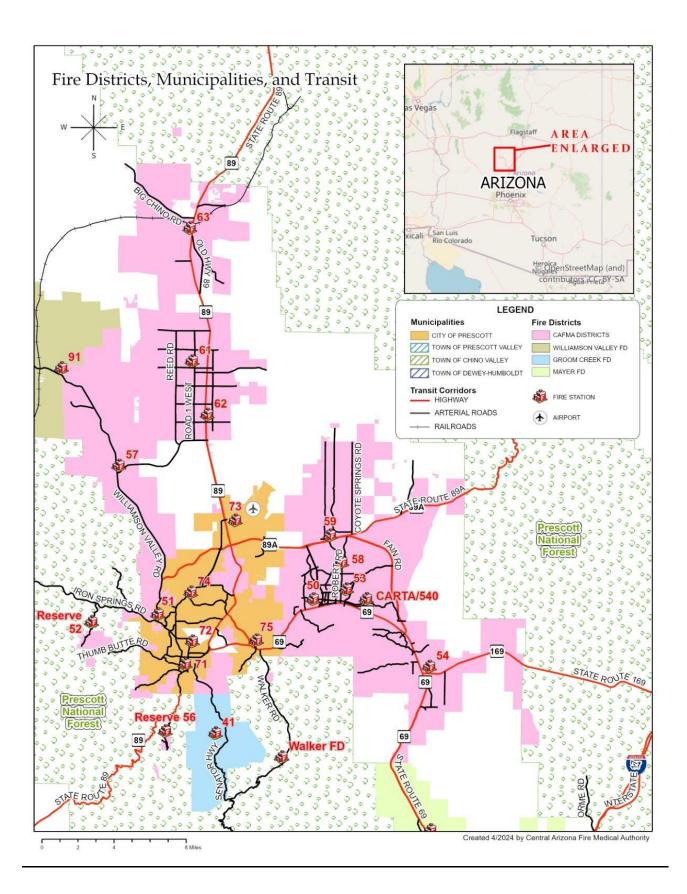
• The towns of Prescott Valley and Chino Valley have a grid layout with various local streets that provide access to residential areas, commercial spaces, and public facilities. However, the City of Prescott has a more complex road network due to its location in a topographically diverse region. It has many winding streets that join the more straightforward grid systems found in the center of each of the primary communities.

4. MountainRoads:

• Due to the region's location in the central highlands of Arizona, there are mountain roads leading to scenic areas and recreational sites in the surrounding mountains, such as Thumb Butte Road, Senator Highway, Ponderosa Park, and Highland Pines.

Overall, the region's road network is designed to accommodate its population, tourism, and commerce, providing residents and visitors with efficient travel options while preserving the natural beauty and historic character. Regular maintenance and improvements help ensure the road network continues to meet the area's evolving needs.

Map 2: Community Boundary and Transportation Systems



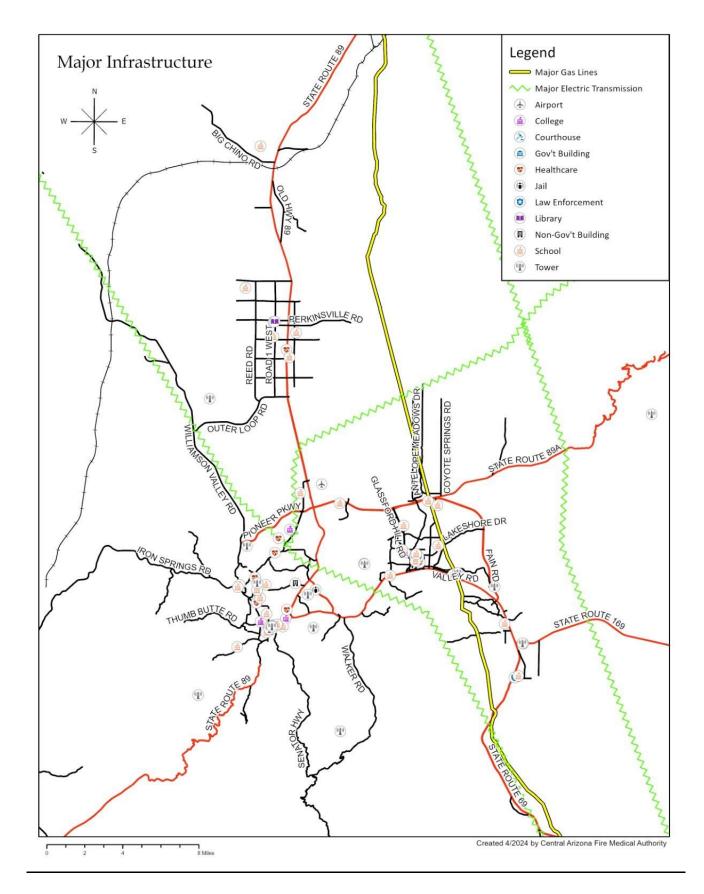
Community Critical Infrastructure

The region has several vital infrastructure components. These include:

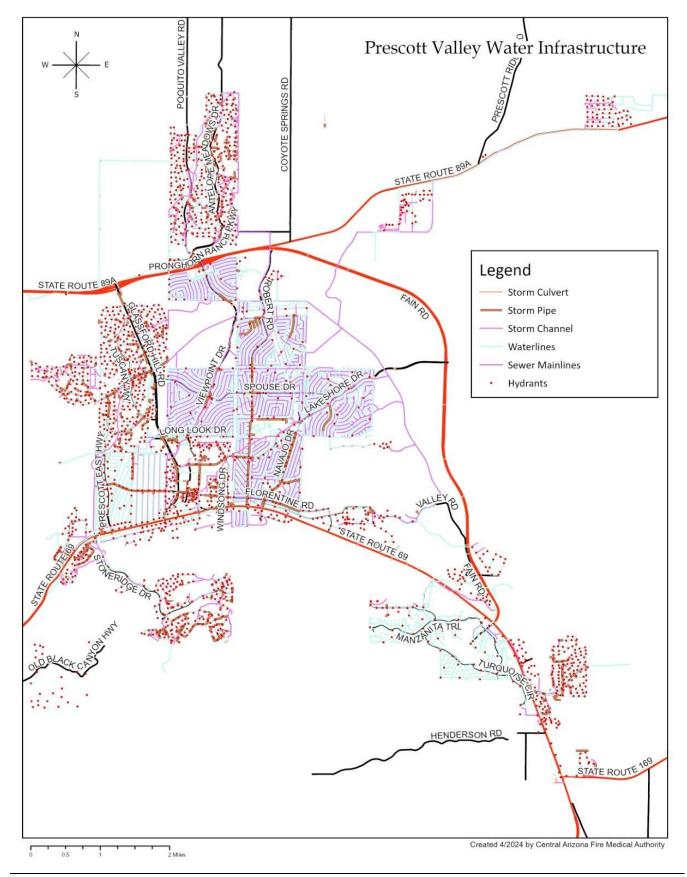
- 1. **Transportation**: The region has highways, roads, and bridges critical for transportation within the county and connecting it to other regions. This infrastructure supports the movement of goods, services, and people.
- 2. **Utilities**: Critical utilities such as water supply systems, wastewater treatment plants, electrical grids, and natural gas pipelines are essential for the region's residents, businesses, and institutions.
- 3. **Communication**: Infrastructure supporting communication networks, including telephone lines, internet connectivity, radio towers, and cellular networks, is vital for residents to stay connected and for emergency services to function effectively.
- 4. **Healthcare**: Hospitals, clinics, and medical facilities are crucial infrastructure components, especially in times of emergencies or public health crises.
- 5. **Emergency Services**: Police stations, fire stations, and emergency response facilities ensure public safety and provide rapid assistance during crises.
- 6. **Government Facilities**: Administrative buildings, courthouses, and other government facilities are essential for the functioning of local government services.
- 7. **Education**: Schools, colleges, and educational institutions are critical for the county's future workforce and societal development.
- 8. **Financial Institutions**: Banks and financial institutions provide essential services for individuals and businesses, supporting economic activities within the county.
- 9. **Food and Agriculture**: Infrastructure supporting agriculture, including farms, ranches, and food processing facilities, is critical for food production and distribution.
- 10. **Energy**: Infrastructure related to energy production, such as power plants and transmission lines, ensures a reliable energy supply for residents and businesses.

These critical infrastructure components play a vital role in maintaining the overall well-being and functionality of the region and its communities. Protecting and ensuring the resilience of these systems is crucial for the county's continued growth and prosperity.

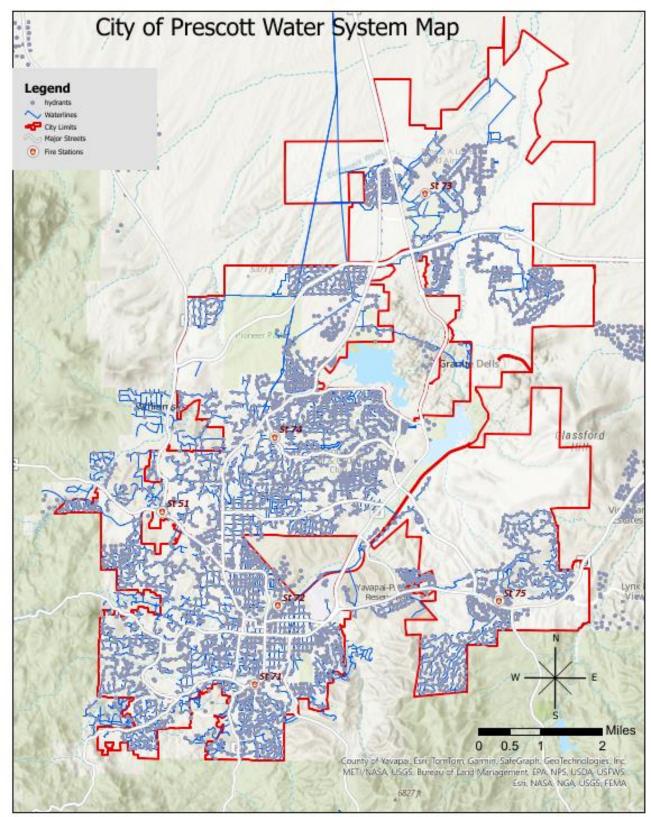
Map 3: Community Infrastructure



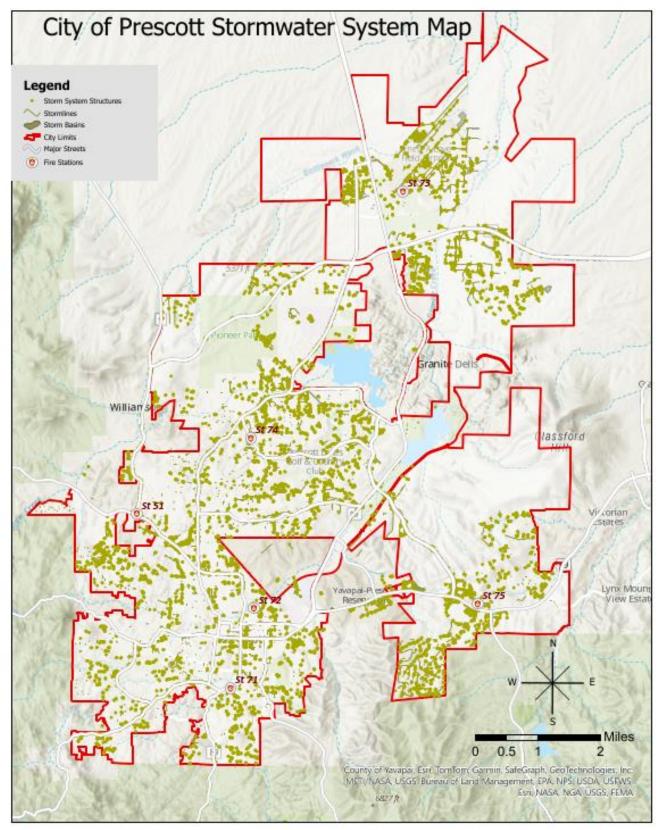
Map 4: Prescott Valley Water, Stormwater, Wastewater Infrastructure



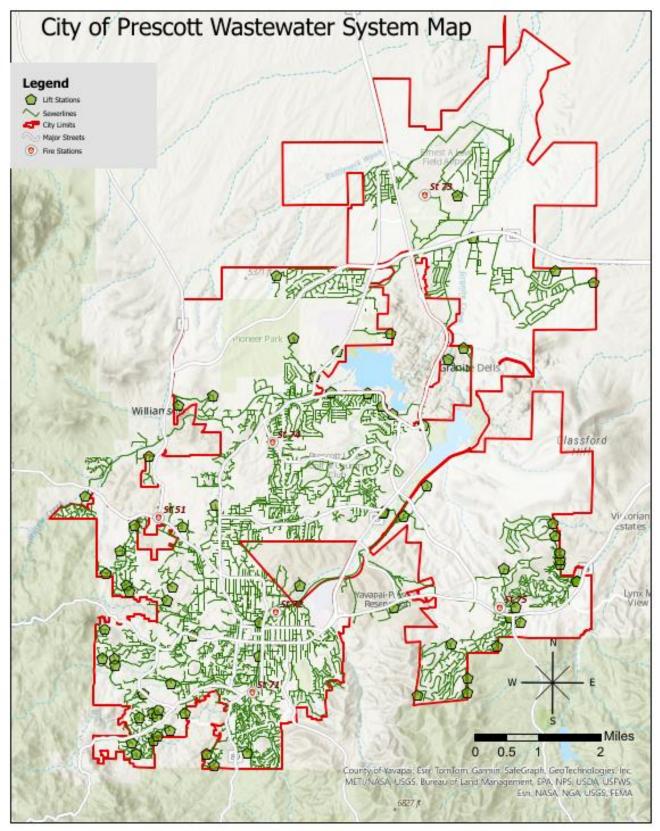
Map 5: Prescott Water Infrastructure



Map 6: Prescott Stormwater Infrastructure



Map 7: Prescott Wastewater Infrastructure



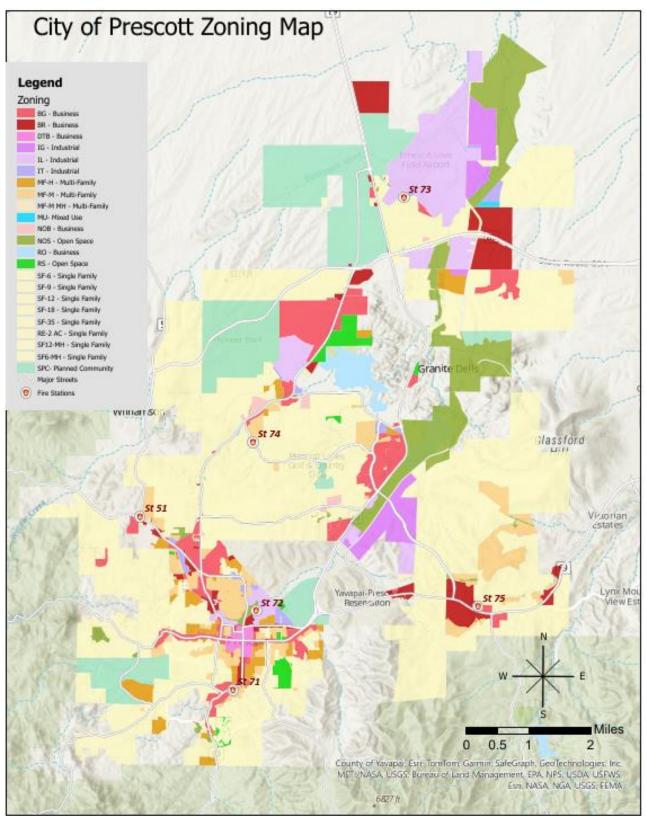
Community Land Use and Zoning

Land use and zoning affect planning zones in the following manner:

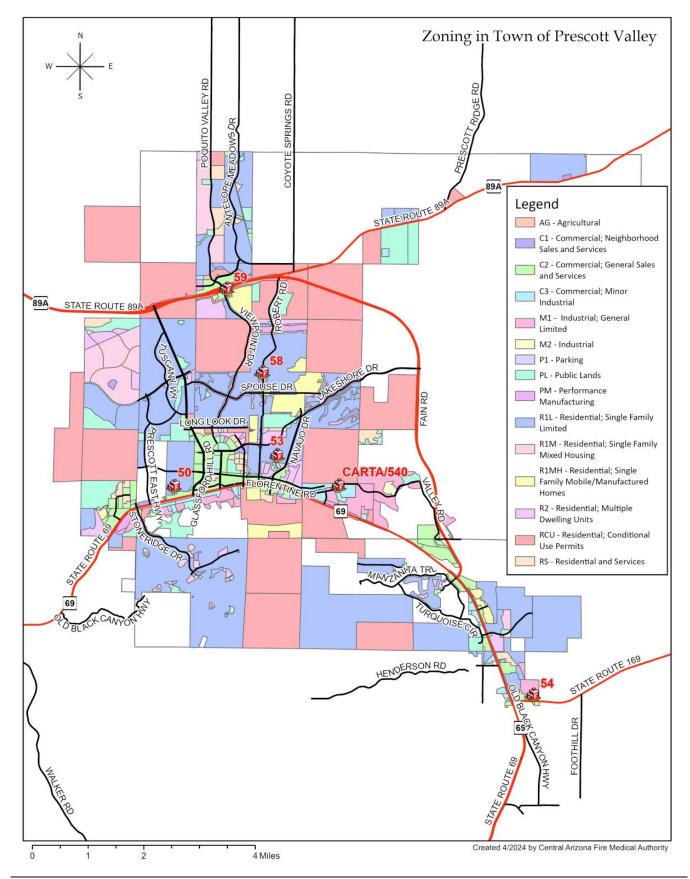
- 1. **Wildfire Risk**: The region is significantly prone to wildfires. Zoning regulations that restrict development in high-risk wildfire areas or require fire-resistant building materials can enhance public safety by reducing the likelihood of catastrophic fires and protecting lives and property.
- 2. **Flood Risk**: Zoning regulations dictate where development can occur in flood-prone areas. By limiting construction in floodplains and requiring appropriate drainage infrastructure, zoning can mitigate the risk of flooding and safeguard public safety.
- 3. **Emergency Response Access**: Zoning influences the layout of roads and infrastructure, affecting emergency response times. Proper zoning ensures that fire stations, police stations, and medical facilities are strategically located and easily accessible to all areas of the region, improving emergency response capabilities.
- 4. **Hazardous Materials**: Zoning regulations govern the location of facilities handling hazardous materials, such as chemical plants or storage facilities. Proper zoning prevents these facilities from being situated near residential areas, reducing the risk of accidents and chemical exposure to the public.
- 5. **Building Codes and Standards**: Zoning ordinances include building codes and standards that dictate construction requirements for safety, such as structural integrity, fire resistance, and accessibility. Enforcing these standards through zoning regulations helps ensure that buildings are safe for occupants and emergency responders.
- 6. **Infrastructure Resilience**: Zoning influences the resilience of critical infrastructure, such as power lines, water treatment plants, and communication networks, to natural disasters and other emergencies. Zoning requires the placement of infrastructure away from high-risk areas and mandates measures to protect them from damage.
- 7. **Evacuation Planning**: Zoning supports effective evacuation planning by designating evacuation routes, establishing emergency assembly areas, and ensuring that new development does not hinder evacuation efforts during emergencies such as wildfires or floods. The region uses the Genasys Evac System through the county emergency management office and the City of Prescott.https://genasys.com/genasys-protect-evac/
- 8. **Public Health**: Zoning impacts public health by regulating the location of facilities such as hospitals, clinics, and waste treatment plants. This prevents the concentration of health hazards in certain areas and ensures equitable access to healthcare services.

In summary, land use and zoning directly affect public safety by influencing wildfire risk, flood risk, emergency response access, hazardous materials exposure, building safety, infrastructure resilience, evacuation planning, and public health considerations. Planning zone methodology related to this will be developed.

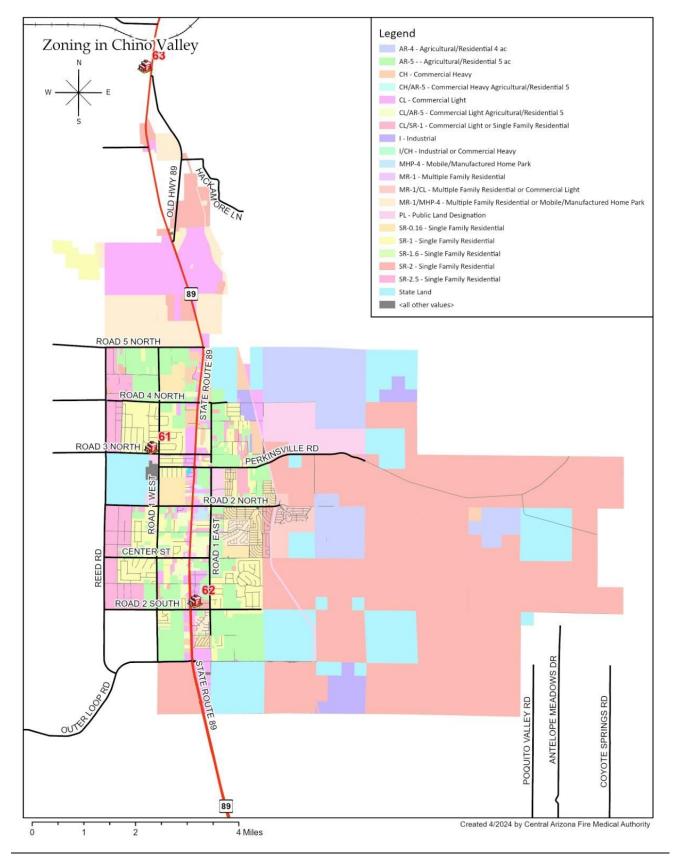
Map 8: Prescott Zoning



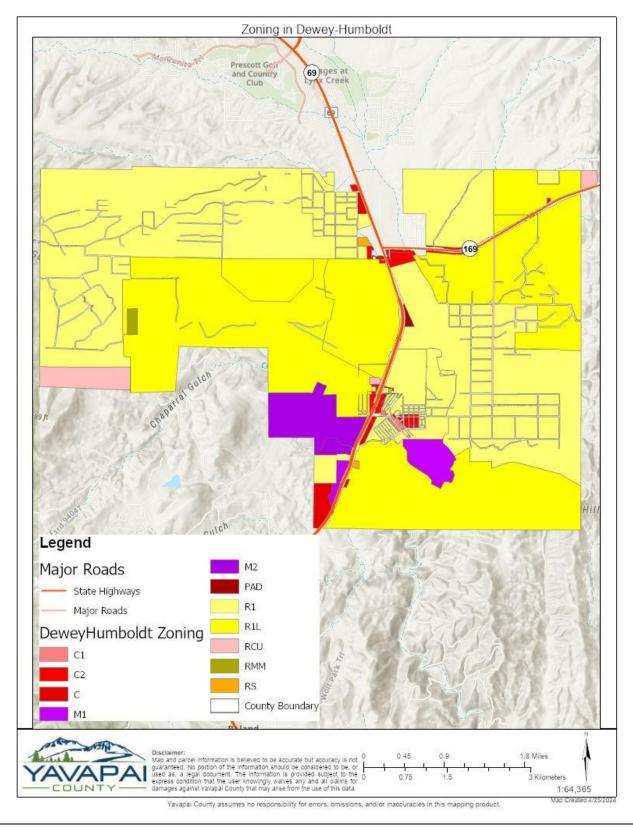
Map 9: Prescott Valley Zoning



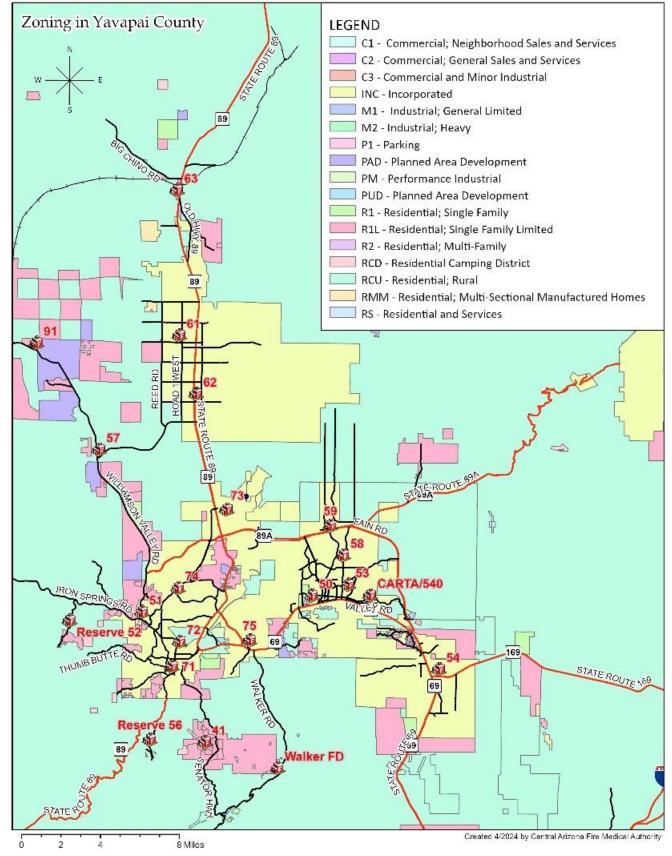
Map 10: Chino Valley Zoning



Map 11: Dewey-Humboldt Zoning



Map 12: Unincorporated Yavapai County Zoning



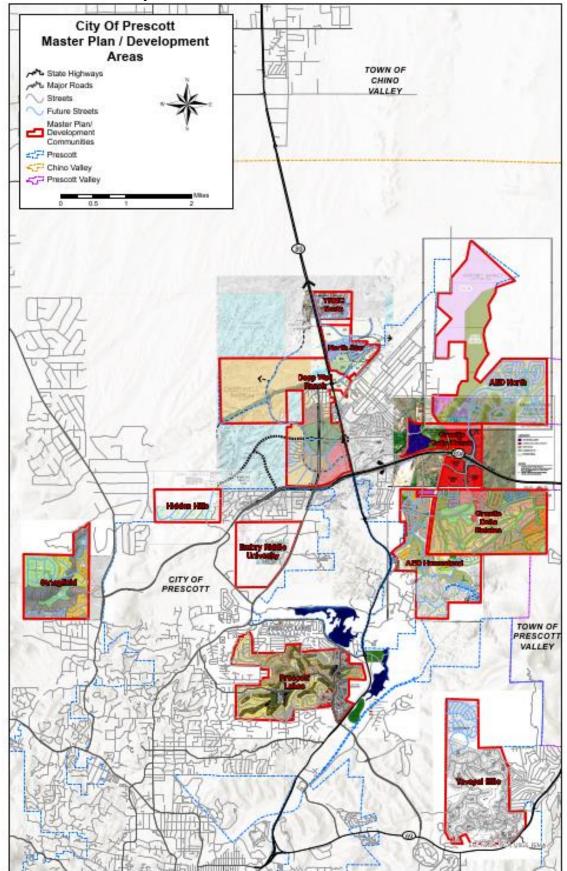
Community Planning Areas

A community planning area (CPA) is a designated region within a city, town, or municipality where specific plans and policies for land use, development, and community resources are developed and implemented. These areas are often created to facilitate organized growth and ensure that community needs, such as housing, transportation, and public services, are effectively addressed.

CPAs typically involve input from residents, stakeholders, and government agencies to create a vision for the area's future. This can include zoning regulations, transportation planning, parks and recreation, and infrastructure development. This is to facilitate sustainable and vibrant communities that reflect the needs and desires of those living there.

The following maps reflect the community planning areas within the service boundary except for Dewey Humboldt and Paulden which do not have formalized community planning areas currently.

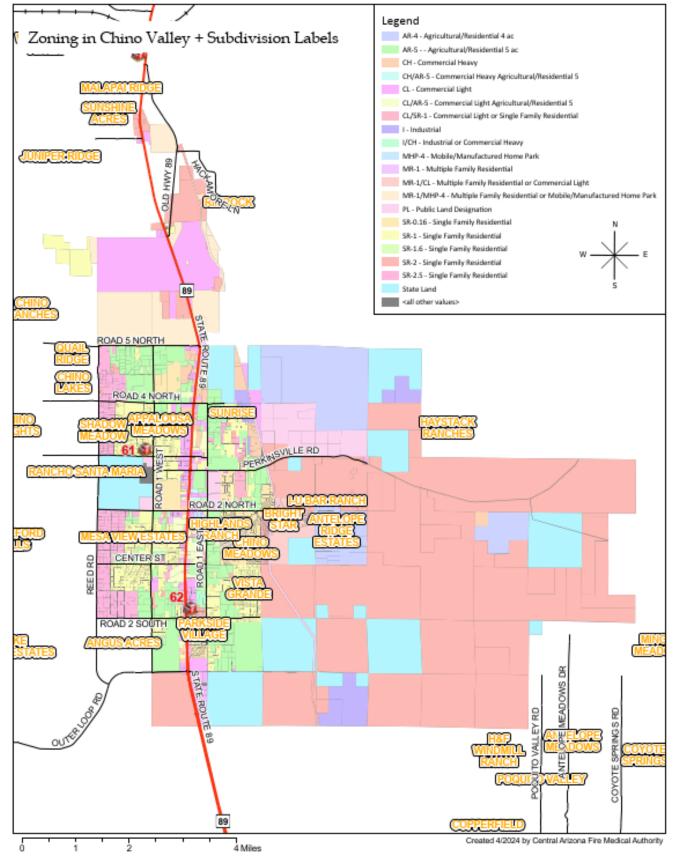
Map 13: Prescott Mast Plan/Development Areas



this is size That's Viewpoint Mingus West 640 Acres 300 Acres **Pronghorn Ranch** 2,600 Dwelling Units 466 Dwelling Units 640 Acres 1,475 Platted 273 Platted 1,440 Dwelling Units 5,616 Platted Antelope Park 89 08 In Development beger **189 Platted** Point of View In Development 32 Platted Granville 89 1,243 Acres 3,400 Dwelling Units PRESCOTT 4,186 Platted VALLEY Jasper 1,018 Acres 3,587 Dwelling Units 652 Platted Quailwood Meadows 540 Acres 1,191 Dwelling Units 1,191 Platted 69 BRADIERAN REP Stoneridge 1,880 Acres 3,043 Dwelling Units 1,279 Platted **Town of Prescott Valley Residential Development** 0.5 1 2 Miles Projects 2022 RESCOTT VALUE

Map 14: Prescott Valley Residential Development Projects (2022)

Map 15: Chino Valley Zoning



Community Topographyand Geology

The region is in a basin in the Bradshaw Mountains and has an average elevation of 5,400 feet above sea level. The area's mountain peaks include Mt. Union, about nine miles southwest of the city and tall at 7,979 feet. The region's underlying geology is characterized by Precambrian granite, gneiss, and schist – a combination of igneous and metamorphic rocks formed during periods of high temperature and pressure. Due to the topography and geology of the region, there is little drainage through the soil itself, but rapid gravity-draining through low-lying areas. This makes flash flooding a potential risk in low-lying areas, especially during severe weather conditions, heavy rain, and snowmelt. The highest risk is along the creeks that flow predominantly to the north-northeast.

Mountainous Terrain:

- The region is surrounded by several mountain ranges, including the Bradshaw Mountains to the southwest, the Mingus Mountain range to the west, and the Prescott National Forest to the south and east.
- These mountains contribute to the region's stunning natural scenery and provide opportunities for outdoor recreation such as hiking, camping, and wildlife viewing.

Valleys and Plateaus:

- While mostly known for its mountainous terrain, the region is in a valley surrounded by rolling hills and plateaus.
- The valleys and plateaus offer a mix of grasslands, scrub vegetation, and pockets of dense vegetation, creating a varied and visually appealing landscape.

Granite Dells:

- Located just north of Prescott, the Granite Dells are a unique geological formation characterized by massive granite boulders, rocky outcrops, and winding canyons.
- The Granite Dells provide opportunities for hiking, rock climbing, and scenic exploration, offering breathtaking views of the surrounding landscape.

Lakes and Reservoirs:

- Several lakes and reservoirs dot the landscape in the region, including Watson Lake, Willow Lake, Fain Lake, and Lynx Lake.
- These bodies of water are nestled amidst the mountains and provide recreational opportunities for fishing, boating, and picnicking.

Elevation Variation:

- The elevation varies greatly throughout the area, with downtown Prescott at about 5,400 feet (1,646 meters) above sea level.
- The surrounding mountains and plateaus can reach elevations exceeding 7,000 feet (2,134 meters), providing panoramic views of the surrounding landscape.

Overall, the topography is characterized by its rugged beauty, with mountains, valleys, plateaus, and unique geological formations contributing to its appeal as a destination for outdoor enthusiasts and nature lovers. The varied terrain offers diverse recreational opportunities and adds to the charm and character of the region. Planning zone methodology is important for topography. Stations are staffed and equipped with certain apparatus that specifically deal with the topographic features in each planning zone. For example, stations in mountainous areas require all-wheel drive capability and wildland apparatus. Stations in the flat areas of Prescott, Prescott Valley, Chino Valley, and Dewey-Humboldt are more apt to be served with standard Type I apparatus. Technical rescue resources are strategically placed in geographic areas that have high levels of recreation as this is the draw to many of the citizens and visitors of the region. In addition, it is noted that the topography and geography of the region create a significant risk for wildland fires.

Topography of CAFMA and Prescott Region Wrkins Abra Juniper St 63 O den Mountains Miles 2 6 0 1 4 Antes 3 Sullivan Legend Sutter Del No streams CAFMA - Chino Area CAPMA- Central Yavapai Area Prescott Fire Area lakes Major Streets St 61 () Fire Stations TEN # 0 St 62 neguel St 57 Mingu E Mounta М Granit Mountain St 59 Granit e Tasin Summer Homes st/58 St 50 0 St 53 IRON SI e St 52 St 54 洲西方 St 56 Sources Esri TomTori Gautin, FAO NOVA USGS - OpenStreetMap contributors CNSS Airbus DS Indeestap, NASA/METH, NASA/NOS and the GS Function Horonet. User Continunity m same Ridge

Map 16: Community Topography

Community Geography

The region features diverse geology shaped by millions of years of geological processes. Here's an overview:

- 1. **Granite Dells**: One of the notable geological features in the region is the Granite Dells, a unique area characterized by exposed granite formations. These rugged outcrops were formed by the slow erosion of softer surrounding rock, leaving behind spectacular granite cliffs, boulders, and tors.
- 2. **Bradshaw Mountains**: The region includes parts of the Bradshaw Mountains, a rugged mountain range known for its complex geology. The Bradshaw Mountains are composed of various rock types, including granite, schist, and volcanic rocks, shaped by tectonic forces and erosion over millions of years.
- 3. **Verde Formation**: The Verde Formation, which underlies much of central Yavapai County, consists of sedimentary rocks such as sandstone, shale, and limestone. These rocks were deposited in ancient seas and river systems and are often rich in fossilized marine life, providing valuable insights into the region's geological history.
- 4. **Mineral Deposits**: The region is known for its rich mineral deposits, including gold, silver, copper, and other metals. These deposits have been exploited for centuries and have played a significant role in the region's economy and history.
- 5. **Alluvial Deposits**: The valleys and floodplains of the region are often characterized by alluvial deposits, which consist of loose sediments such as sand, gravel, and clay deposited by rivers and streams. These deposits are important for agriculture and groundwater recharge but can also pose hazards such as flooding.
- 6. **Volcanic Features**: The region contains volcanic features such as cinder cones, lava flows, and volcanic ash deposits, indicating past volcanic activity in the region. These volcanic rocks add to the geological diversity of the area and provide insights into past geological processes.
- 7. **Faults and Folds**: The region is also influenced by various faults and folds resulting from tectonic forces associated with the uplift of mountain ranges such as the Bradshaw Mountains. These geological structures can influence the distribution of mineral deposits, groundwater flow, and landscape morphology.

Overall, the region's geology is characterized by a complex interplay of geological processes, including erosion, deposition, tectonic activity, and volcanic eruptions, which have shaped the landscape over millions of years. Understanding this geology is crucial for various activities, including mineral exploration, land use planning, and natural hazard mitigation. The geography of the area is considered in the planning zone methodology. For example, technical rescue resources are strategically placed in geographic areas that have high levels of recreation as this is the draw to many of the citizens and visitors of the region.

Community Physiography

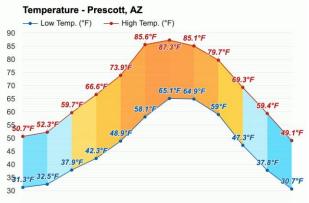
The region is characterized by diverse physiographic features due to its varied terrain. Here are some key aspects of the physiography of Yavapai County:

- 1. **Mountain Ranges:** The region is home to several mountain ranges, including the Bradshaw Mountains, Mingus Mountain, and the Black Hills. These ranges contribute to the rugged and mountainous landscape of the county.
- 2. **Plateaus:** The county also includes plateaus such as the Verde Valley, which is situated along the Verde River and is known for its fertile soil and agricultural activities.
- 3. **Canyons and Valleys:** The region features numerous canyons and valleys carved by rivers and streams, including the famous Oak Creek Canyon and Sycamore Canyon. These areas are known for their scenic beauty and recreational opportunities.
- 4. **Desert Terrain:** The region has desert terrain, especially in the western and southern regions. This includes areas with sparse vegetation, sandy soils, and desert flora and fauna adapted to arid conditions.
- 5. **Water Bodies:** The county contains several water bodies, including the Verde River, Lynx Lake, Watson Lake, and Willow Lake. These bodies of water provide important habitats for wildlife and support recreational activities such as fishing, boating, and hiking.
- 6. **Volcanic Features:** Some areas exhibit volcanic features, such as lava flows and volcanic cones, which are remnants of past volcanic activity in the region.

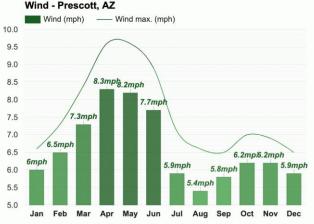
Overall, the physiography showcases a mix of mountainous terrain, plateaus, canyons, deserts, and water bodies, contributing to its diverse natural environment and outdoor appeal.

Community Climate

The area around Prescott is generally temperate, even during winter months, for a region that is 5,400 feet above sea level. The region experiences four distinct seasons, with a typical low temperature in winter of 25 degrees F and a high of 87 degrees F in the summer. July is the hottest month; December and January are the coldest. Relative humidity is significantly lower than the U.S. average, about 35 percent year-round, and reaches only 50 percent in winter months. The area receives about 28 inches of rainfall annually, with August being the wettest month, followed by July. The average monthly rainfall is about two inches per month; however, this number can be significantly lower from April through June; snowfall can begin as early as mid- to late-October and reaches its peak of 18 to 20 inches in January and can persist at high levels as late as March.



Jan Feb Mar Apr May Jun Jul Aug Sep Oct Nov Dec

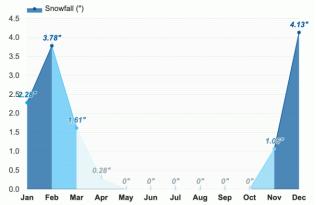


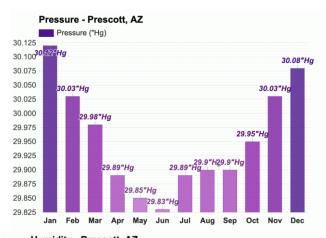
Rainfall days - Prescott, AZ



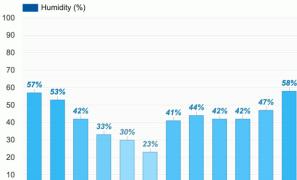


Snowfall - Prescott, AZ





Humidity - Prescott, AZ

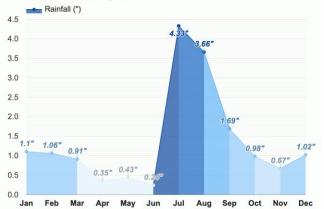


Rainfall - Prescott, AZ

Feb Mar Apr May Jun

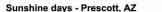
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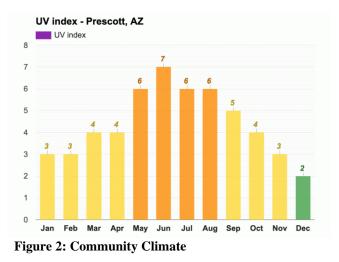


Jul Aug Sep

Oct Nov Dec







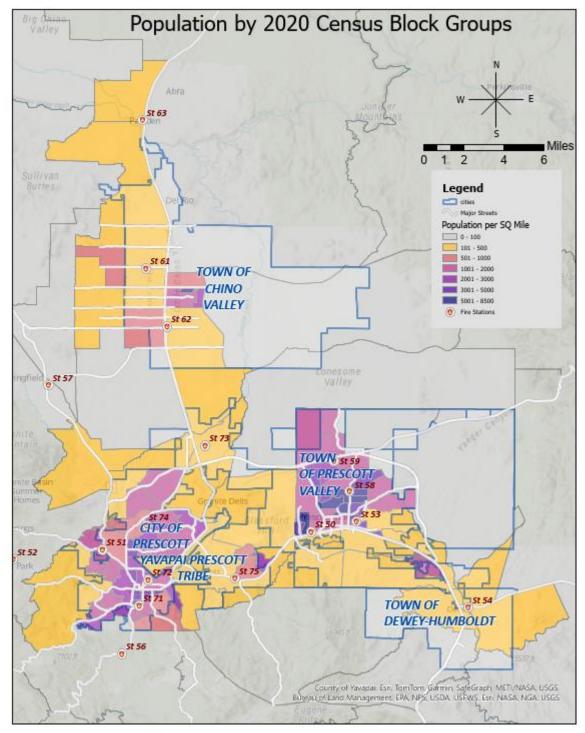
Community Population/Population Densities

The population of Prescott, Arizona, is estimated to be around 49,149 residents. However, please note that population figures may have changed since then due to natural population growth, migration patterns, and other factors. Due to commerce and tourism, this population can double daily, which is considered in the planning methodology. The population of Prescott Valley, Chino Valley, Dewey-Humboldt, and unincorporated areas such as Paulden and Williamson Valley was estimated to be around 106,500 residents. The overall population of the service area is 155,649 residents.

In population density, PFD covers about 41 square miles. Therefore, based on the estimated population figures, the population density would be 1,198.7 people per square mile. In population density, CAFMA covers about 369 square miles. Therefore, based on the estimated population figures, the population density would be 288.6 people per square mile. Due to the vast area covered by CAFMA, planning methodology is in place to allocate resources effectively. The overall population density of the region with both jurisdictions combined is 379.6 people per square mile.

It is important to keep in mind that population densities can vary with more densely populated urban areas contrasted with less populated rural areas. Also, population figures and densities may change over time due to factors such as urban development, zoning changes, demographic shifts, tourism, and commerce. For the most current and accurate population data, it is advisable to consult the latest census figures or official population estimates from relevant authorities. Planning zone methodology is directly related to population density. It is noted that the higher the population density is, the higher the requests for service will be. Staying in tune with demand for service, unit reliability, and types of service are all factors that relate to resource allocation.

Map 17: Community Population Density



Community Demographic Features

The region is known for its rich history, outdoor recreational opportunities, and vibrant community. As of the last available data, the region had a population of around 155,649 people. This number may have changed slightly since then due to population growth.

Each community, including Prescott, Prescott Valley, Chino Valley, Paulden, and Dewey-Humboldt, possesses unique demographic characteristics:

Prescott: Prescott, the largest city in Yavapai County, is home to a diverse population of families, retirees, and young professionals. This city is renowned for its rich history, vibrant downtown area, and numerous cultural attractions, making it an attractive destination for residents looking for a mix of urban amenities and natural beauty. Prescott also serves as the county seat of Yavapai County.

Currently, Prescott is experiencing an annual growth rate of 1.6%, and the population has increased by 6.71% since the last census. The average household income in Prescott is \$96,801, while the poverty rate stands at 11.34%. The median age in Prescott is 60.5 years, with 59.8 years for males and 61.3 years for females.

In the 19th century, Prescott served as the capital of the Arizona Territory for a few years before the capital was relocated to Tucson. It later regained its status as the capital before being moved again, this time to Phoenix. Despite being a smaller city, Prescott's population has been steadily growing since the late 19th century, with a significant increase by 1960.

Overall, Prescott's rich history, cultural attractions, and natural beauty make it an ideal destination for various individuals and families.

Prescott Valley: Prescott Valley is a rapidly growing town known for its affordable housing options, excellent schools, and suburban lifestyle. The town boasts a diverse population consisting of families, retirees, and young professionals who are attracted to the expanding amenities and recreational opportunities. As of 2021, the town has a median age of 47.1 and a median household income of \$60,033. The five largest ethnic groups in Prescott Valley, ARIZONA, are White (Non-Hispanic) (75.1%), White (Hispanic) (10.7%), Two+ (Hispanic) (5.27%), Other (Hispanic) (3.22%), and two+ (non-Hispanic) (2.84%). The median home value, as of April 2024, is \$467,800.

Chino Valley: Chino Valley is a town that takes pride in its rural charm and agricultural heritage. This community offers a slower pace of life and a strong sense of togetherness. It is home to a diverse population, including families, retirees, and individuals drawn to the town's open spaces, agricultural activities, and welcoming atmosphere. As per the latest data, White (Non-Hispanic) (76.8%), White (Hispanic) (11.8%), Two+ (Hispanic) (4%), Two+ (non-Hispanic) (2.75%), and Other (Hispanic) (1.94%) are the five largest ethnic groups in Chino Valley, ARIZONA. It is noteworthy that none of the households in Chino Valley, Arizona, reported speaking a non-English language at home as their primary shared language. However, this data only accounts for the primary self-reported language spoken by all members of the household and does not encompass potential multilingualism within households. Furthermore, a significant number of Chino Valley residents, totaling 96.5%, are U.S. citizens. As of April 2024, the median home value in Chino Valley, Arizona, stands at \$515,000.

Dewey-Humboldt: Nestled amidst the Bradshaw Mountains, Dewey-Humboldt attracts residents seeking a close-knit community and a connection to nature. The population includes longtime residents

and newcomers drawn to the town's small-town charm, panoramic views, and outdoor recreational opportunities.

Each of these central Arizona communities offers its unique blend of demographics, lifestyles, and attractions, contributing to the diverse and vibrant tapestry of the region. The median home value is \$403,000 as of April 2024.

Paulden: A rural community located northwest of Prescott, Paulden offers a tranquil lifestyle amid scenic landscapes and wide-open spaces. The population is smaller compared to neighboring towns, with residents embracing a quieter, more laid-back way of life. No median home value was available as of April 2024.

Response Area Demographics

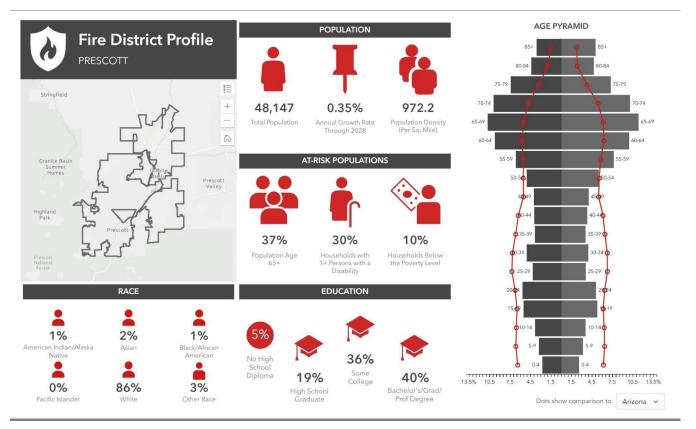


Figure 3: Response Area Demographics - Prescott

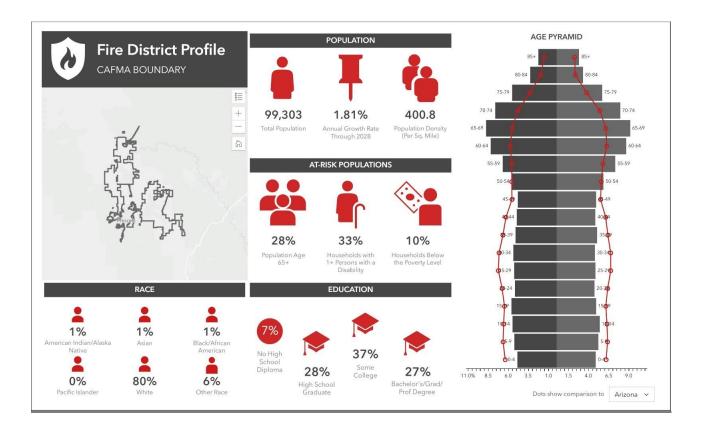


Figure 4: Response Area Demographics – CAFMA

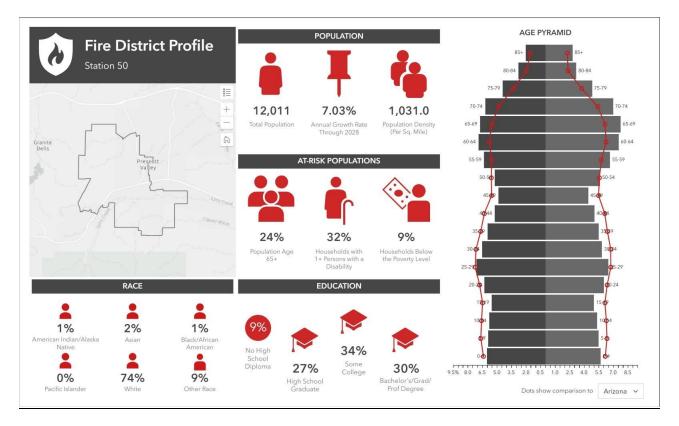


Figure 5: Response Area Demographics - Station 50

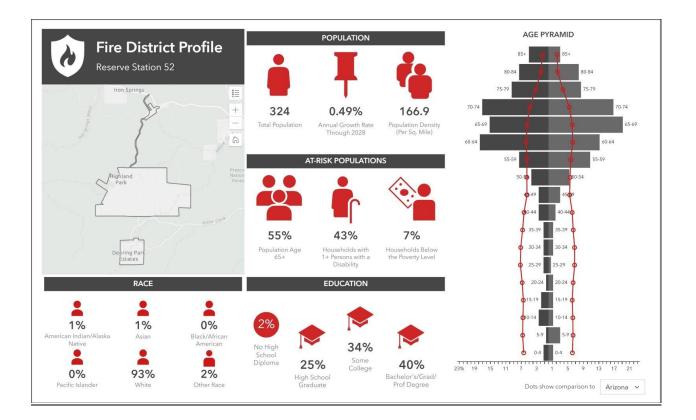


Figure 6: Response Area Demographics - Station 52

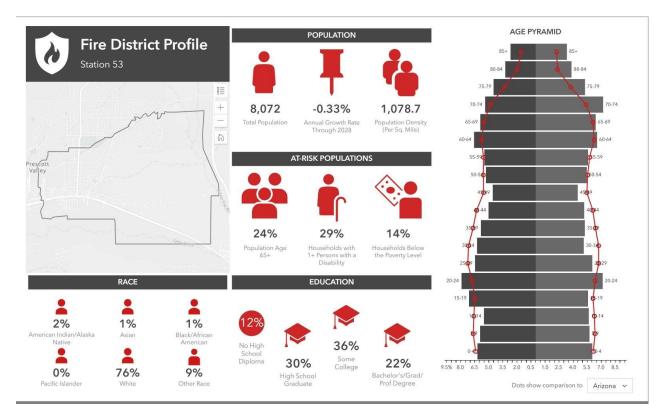


Figure 7: Response Area Demographics - Station 53

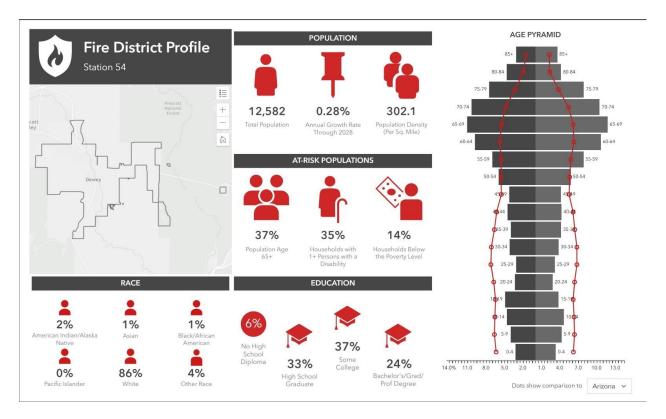


Figure 8: Response Area Demographics - Station 54

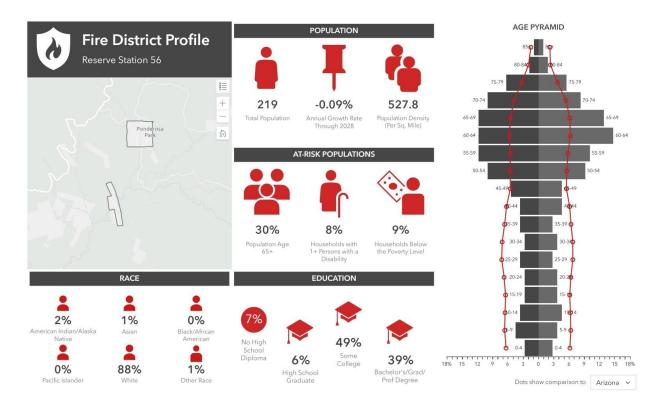


Figure 9: Response Area Demographics – Reserve Station 56

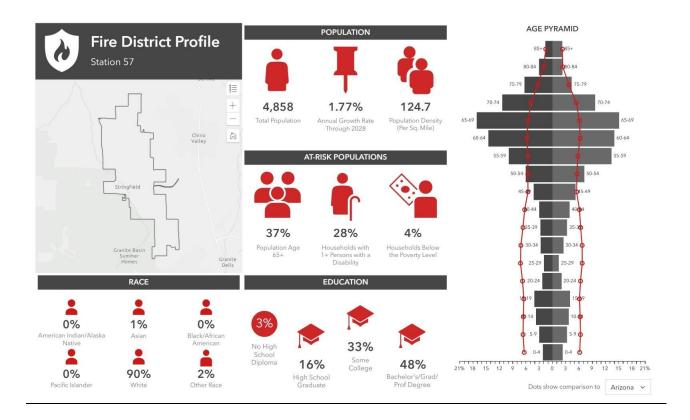


Figure 10: Response Area Demographics - Station 57

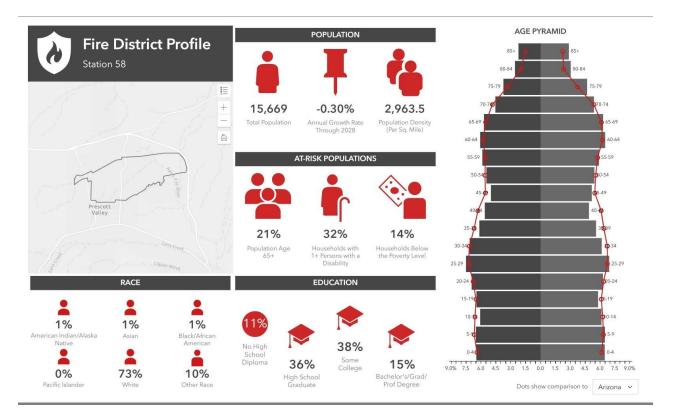


Figure 11: Response Area Demographics - Station 58

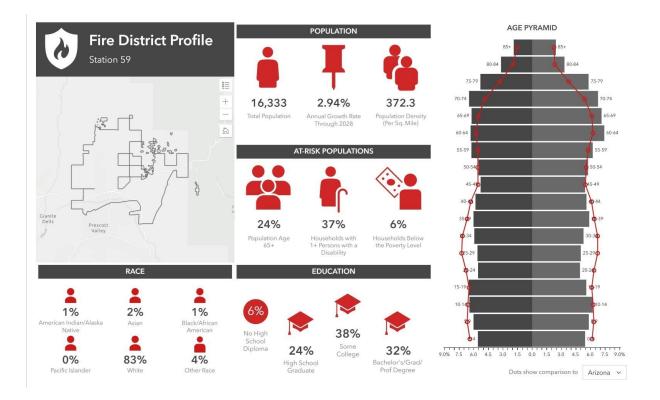


Figure 12: Response Area Demographics - Station 59

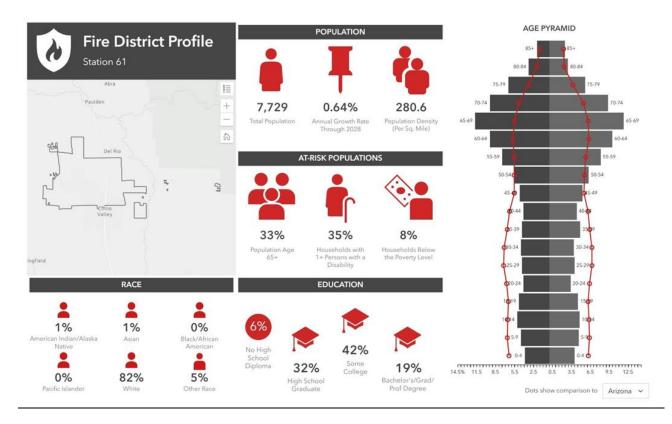


Figure 13: Response Area Demographics - Station 61

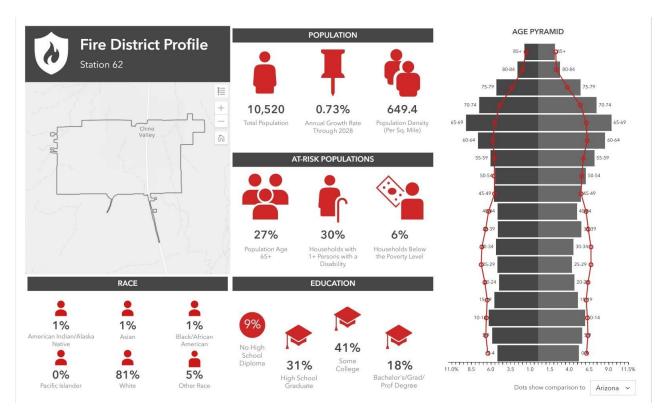


Figure 14: Response Area Demographics - Station 62

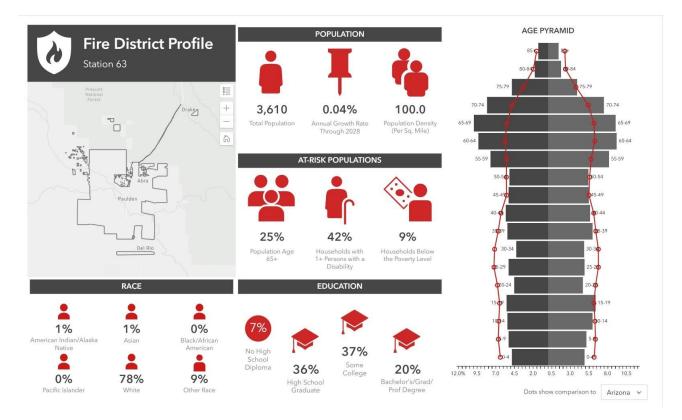


Figure 15: Response Area Demographics - Station 63

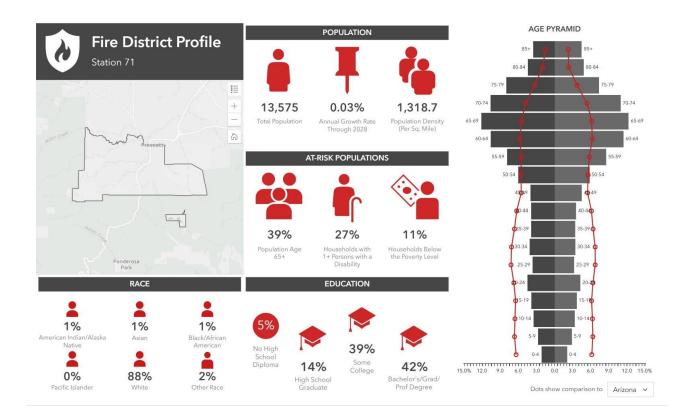


Figure 16: Response Area Demographics - Station 71

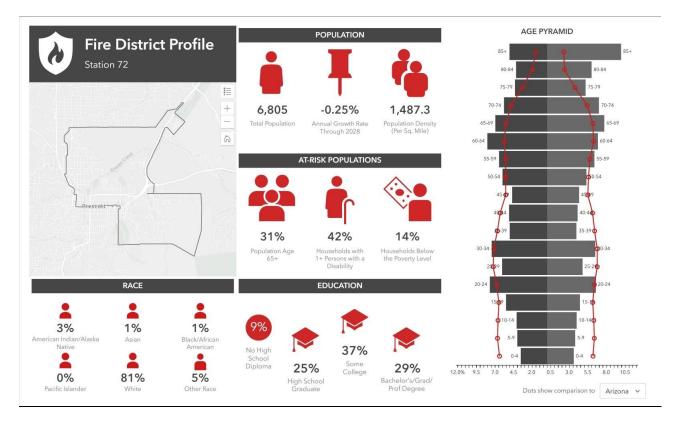


Figure 17: Response Area Demographics - Station 72

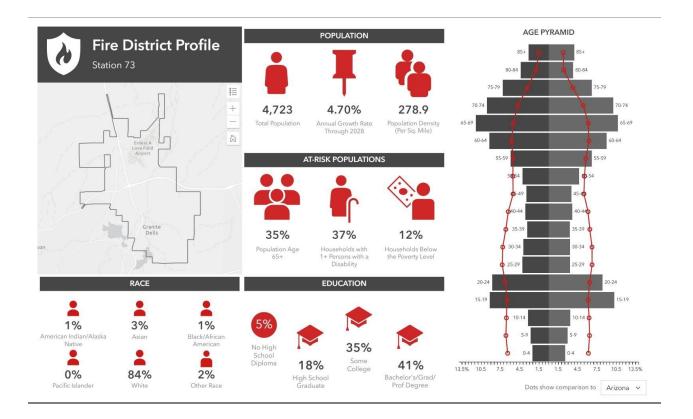


Figure 18: Response Area Demographics - Station 73

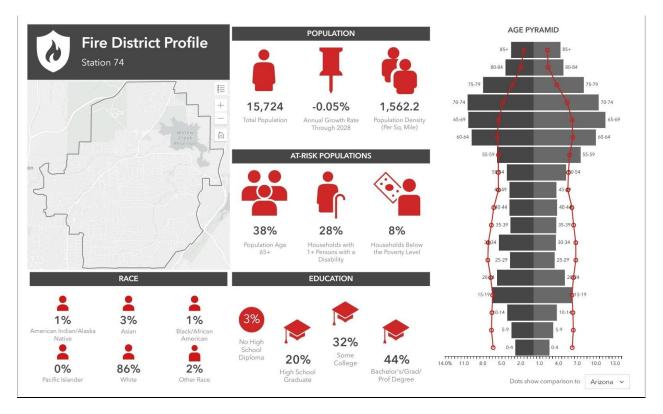


Figure 19: Response Area Demographics - Station 74

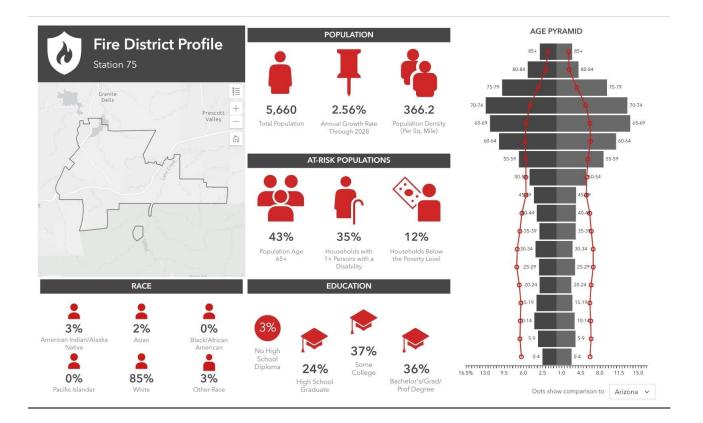


Figure 20: Response Area Demographics - Station 75

B. History of the Agency

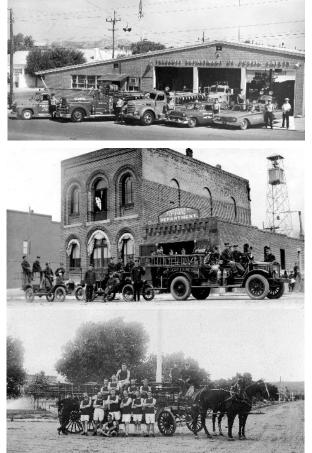
Major Historical Milestones of the Department/Authority

PFD

The PFD was officially established in 1885. Initially, the department was comprised entirely of volunteers and consisted of four distinct companies, each with a complement of 25 firefighters, as well as hose carts and wagons. These companies were close to the city's main courthouse plaza. In 1906, the four separate companies were consolidated into a single firehouse equipped with a

horse-drawn wagon. In 1915, the department transitioned to using two Model T vehicles for the transportation of equipment and personnel. In 1922, a Velie Chemical Wagon was procured by the department. The first pumping engine was added to the department's fleet in 1926 in the form of an American LaFrance vehicle, and a Seagrave Ladder Company truck was added in 1931.

In 1956, the department went through a significant transformation by transitioning to paid positions. Initially, there was a chief and five firefighters who were paid, while the volunteer team was reduced to thirty-five individuals. As the city grew, the department increased its paid positions, which included the addition of stations and apparatus over time. In 1975, the department introduced a third platoon, and as a result, the volunteer component was discontinued.



The first appointed chief expanded the prevention program, leading to a noteworthy reduction in the number of fires, from 104 to 21, in his first year of service. In 1979, six intermediate paramedics were added to the Basic Life Support (BLS) firefighters' team, and currently, every engine is equipped with at least one paramedic. This Department is the primary aircraft rescue and firefighting (ARFF) coverage provider for the Prescott Regional Airport, and it has a dedicated Engineer to operate an ARFF response vehicle 24/7. In the late 1970s, a regional joint technical rescue team (TRT) was established, while one station was designated for TRT response, equipped with a Zodiac watercraft, rappel gear, trench rescue, and backcountry response materials. In 1974, a hazardous materials (HazMat)team was established and is currently operated as a regional joint team, with a station designated for hazardous materials response, equipped with air monitoring devices, unknownsubstance identification equipment, toxic environment entry gear, and decontamination systems.

The Central Arizona Fire and Medical Authority (CAFMA) was officially formed as the first fire authority in Arizona on July 1, 2016. A.R.S. 48-805 outlines the fire district, powers and duties, and definitions. Section 48-805.01 stipulates how fire authorities are formed in Arizona. To understand the origins of CAFMA, one must review the history of the two underlying fire districts, i.e., the Chino Valley Fire District and Central Yavapai Fire Districts.

Chino Valley Fire District

On September 28, 1961, a group of 33 community-oriented citizens and business owners held a meeting in which they elected the first board members and hired Gomer Stalhut as their first fire chief. Chief Stalhut served as chief from 1961 to 1963. Their first fire engine was a 1942 GMC Jimmy with a water tank and small farm pump purchased for \$1,545 in April 1962. The initial dispatch system consisted of a phone tree and an old air raid siren acquired from the Civil Defense Corps.

The fire department became an official tax district prior to 1963. Around the same time, a fire station was built on donated land to house the engine at 238 N Highway 89 (Station #64). Before that, the engine was stationed in a private Quonset hut barn at 1203 N Highway 89. In 1964, a new modern fire engine was purchased and housed at the same location (Station 64). The new engine was a 1963 Boardman with a two-stage fire pump on a Ford chassis. In the early 1970s, a Ford F250 brush truck was purchased as an auxiliary engine to assist crews when responding to grass fires in the Big Chino prairie.

As the population and needs of the community changed, so did the level of service provided by the local volunteers. In the late 1970s, Molly Walters, a volunteer firefighter and emergency medical technician (EMT), worked with Fire Chief Jim Edwardson to develop a basic emergency medical response team.

During the 1980s the department realized the need for more water storage as well as the expansion of services and personnel. A used 4,000-gallon Diamond Rio water truck with a small industrial pump was acquired by the district, and a large bay was built to house it at 1133 W Road 3 North. That bay is the general apparatus Bay at the present Fire Station #61. Due to the expanded need for a 24-hour response, the Fire District Board hired the first paid firefighters, Captain John Ginn, Captain Mark Ducote, Captain Larry Adams, and Firefighter Jack Miller on July 1, 1987. The firefighters slept on surplus military cots in the apparatus bay until a crew quarter's expansion was completed the following year. A new E-One fire engine with modern medical equipment was purchased to update the fleet, and the 1964 Boardman was moved to a reserve position.

In the 1990s, the greater Chino/Paulden area saw a dramatic increase in population. The increase in call volume, residential structures, and an influx of light to medium industrial complexes required an increase in career staffing and training. During this time, the fire district increased the level of patient care they provided by adding the first certified emergency paramedic. The advanced cardiac life support role became the minimum standard for all CVFD engine companies. CVFD's involvement in out-of-district wildland response contracts with the State of Arizona also became a supplemental source of revenue for the district.

In 1998, Chief Ray Skipper, the first career fire chief in Chino Valley, worked with the Board of Directors to complete the construction of Fire Station #63 at Sweet Valley Road and N Highway 89 in Paulden. Station 63 allowed the district to provide more rapid response times and a higher level of service to the citizens of Paulden. The rolling green pastures and the distance from Station #61 inspired the station's nickname, "The Land of OZ." The new engine, a 1998 Central States Tail Pump Freightliner, became the pride of Paulden until its retirement.

In 2003, a Fire District Bond was approved by the citizens of the district to fund overdue capital improvements, including the construction of a new Station at the south end of town, a headquarters building, a reserve apparatus bay with an adjacent light maintenance facility, and replacement of aged apparatus. Under the direction of Fire Chief Chuck Tandy and with the acquisition of early bond funds, the Fire Station 62 project was started. The Project required the temporary re-opening of Station 64 just north of Center Street. When Station 62 was completed in 2006, the crews were relocated to their new quarters, and Station 64 was repurposed as a storage facility. The Station 64 site was sold around 2014-2015 to a private investor.

In 2005, Engineer Bryan Dalton began to lay the groundwork for an interagency TRT. With commitment from the Central Yavapai Fire District and the Prescott Fire Department, along with thousands of hours of training, the TRT program was started. Today, CAFMA and Prescott Fire work collaboratively as a regional TRT.

In 2013, Fire Chief Scott Freitag was hired to lead CVFD. By December 2013, talks were underway between Chief Freitag and the staff of CYFD regarding the possibility of combining the two agencies, starting with a Joint Management Agreement (JMA).

Central Yavapai Fire District

The Central Yavapai Fire District (CYFD) started as an idea for better insurance premiums and fire coverage for the areas outside of the City of Prescott boundaries. Bill Pierce, Ed Stark, and George Goodwin collectively worked with the Miller Valley Fire Control and the Mountain Club Volunteers to gather the necessary signatures to officially form the CYFD on March 11, 1965.

The Fire Board consisted of the trio, and though they were officially in existence, they did not have a budget until 1966. According to Bill Pierce, they did not have "turnouts." They were still having to recruit volunteers for the three rotational "engine companies," but they were proud of their Dodge 1,500-gallon water truck (used for construction purposes) from the Mountain Club that "Red" Higley – the fleet mechanic for the Prescott Fire Department had obtained for them. This first 'fire truck' was equipped with a pump that was inadequate and did not provide enough pressure to extinguish a structure fire.

In the first few years of existence, they moved from an old garage across from the current Salvation Army on Gurley Street to the fire station they built and purchased on 6th Street (still in existence today); purchased three new pieces of apparatus (a water tender, and two Howe Engines – one was a four-wheel drive); and obtained safety equipment. Retired chief officer from Apache Junction, Ed Stark, was the first fire chief, and they negotiated mutual aid agreements with the Prescott National Forest (PNF) and the Prescott Fire Department for assistance. Pierce stated that the mutual aid agreements were a key to their success "because no one agency could do it all." Prescott Fire, the CYFD and the PNF were all able to assist one another in mitigating fires with the limited resources that they individually had at the time.

In October 2013, the fire chief of CYFD parted ways with the agency. Assistant Chief Scott Bliss assumed the role of interim fire chief until the creation of the Joint Management Agreement (JMA) with Chino Valley. In July 2014, Scott Freitag officially became the fire chief of the CYFD and the CVFD agencies. Assistant Chief Scott Bliss moved over to lead the Planning and Logistics division; interim Assistant Chief Jeff Polacek was officially promoted to assistant chief of operations. Assistant Chief Dave Tharp remained the assistant chief of administration.

Central Arizona Fire and Medical Authority

The Central Arizona Fire and Medical Authority (CAFMA) was officially formed on July 1, 2016. The actual agreement was officially signed on October 15, 2015. The formation of the agency was the result of 18 months of research and work conducted by the staff of CYFD and CVFD under the joint management agreement (JMA). A white paper was created for the board and community outlining options to bring the two agencies under one name and organizational structure. Because of the disparate tax rates, a merger or consolidation was not possible, leaving the concept of a joint powers authority (JPA) as the only option. There is a plan to merge the two entities into one merged fire district in July 2025.

In 2018, CAFMA added a 40-hour engine into the system and placed it at the training center. Data at the time indicated the need for an additional resource, but only in a limited capacity. Based on the data used, it was determined that a 40-hour peak engine running 10 hours per day, Monday through Thursday, would be the best option. When CAFMA and Prescott conduct live fire night drills, the



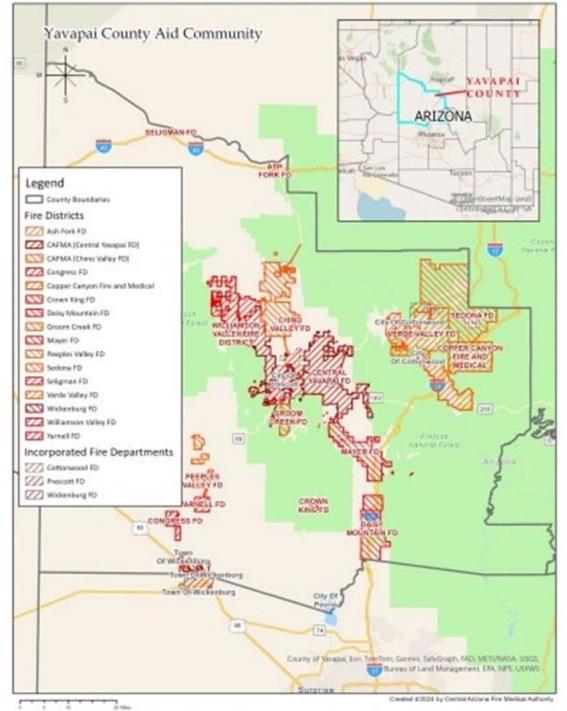
hours for the crew are shifted to ensure coverage until 2100 hours rather than 1700 hours when their regular shift ends. They maintain the 10-hour day by simply adjusting their start time. There are four personnel assigned to the engine, at least three on duty each day. Mandatory overtime is not used when short on operational personnel for the day. Instead, the remaining personnel are shifted to complement other resources or use them for special projects. The plan is to maintain the 40-hour engine as additional 24-hour units are added to the system.

In 2015, CAFMA purchased the current administrative building and had 9,000 square feet of the total 14,000 square feet remodeled to meet needs. The building opened in August 2016. Prior to being in the current location, administration shared a building with Station 53. Because of the limited size of the admin side of the building, prevention was in a single-wide manufactured structure on the property, some admin staff were in different locations, a closet was used as an office, and the kitchen was used for another office. Overall, the space was highly inefficient. As of 2024, the finished 9,000 square feet is filled, and CAFMA is planning to expand into the other 4,000 square feet by 2028.

In April 2024, CAFMA was awarded the Certificate of Need (CON), allowing staffing of transport ambulances or rescues. Rescues will be staffed with at least one firefighter/paramedic and one firefighter/EMT, 24/7, starting with two rescues and scaling up as necessary. CAFMA's primary private ambulance partner serving the community is priority ambulance.

Current Legal Boundary of Service Area

Map 18: Community Legal Boundary



Current Organization, Divisions, Programs and Services

The PFD is a municipal city department. The fire chief is the administrative head of the department. As such, the fire chief is a senior executive of the city who (1) serves under the general supervision and direction of the city manager and (2) has the general authority to supervise and direct the administrative and operational activities of the fire department. The department is organized into four branches: Administration, Emergency Services, Professional Services, and Community Risk Reduction Services - each under the command of a battalion or division chief.

CAFMA is a fire authority consisting of two fire districts. The fire chief is the administrative head of the department. As such, the fire chief is the senior executive of the fire authority who (1) serves under the general supervision of a fire board consisting of five members and (2) has the general authority to supervise and direct the administrative and operational activities of the fire authority. The department is organized into four branches: Administration, Operations, Planning and Logistics, and Fire Prevention, each under the command of an assistant chief.

PFD and CAFMAhave an intergovernmental agreement (IGA) adopted by the Prescott City Council and the CAFMA Board of Directors. This IGA covers carrying out mutual responsibility as it relates to the provision of services or for joint or cooperative action. It sets forth the agreement to cooperate with each other to more effectively and economically provide joint services for emergency response and hazard mitigation within our defined service area boundary. It includes the benefits in shared resources not limited to facilities, personnel, equipment, training, services, joint purchasing, operations and management of public safety areas for mutual benefit of the public.

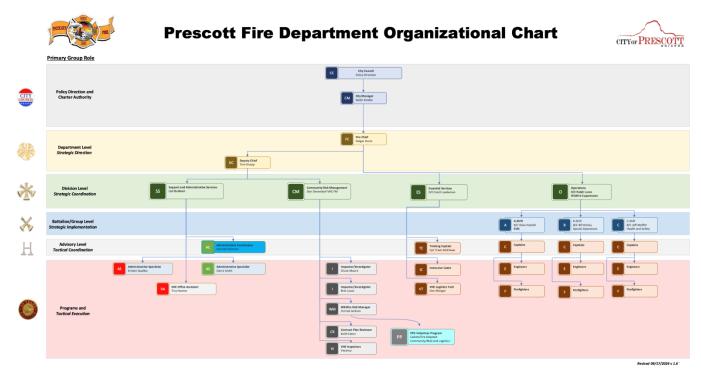


Figure 21: PFD Organizational Chart

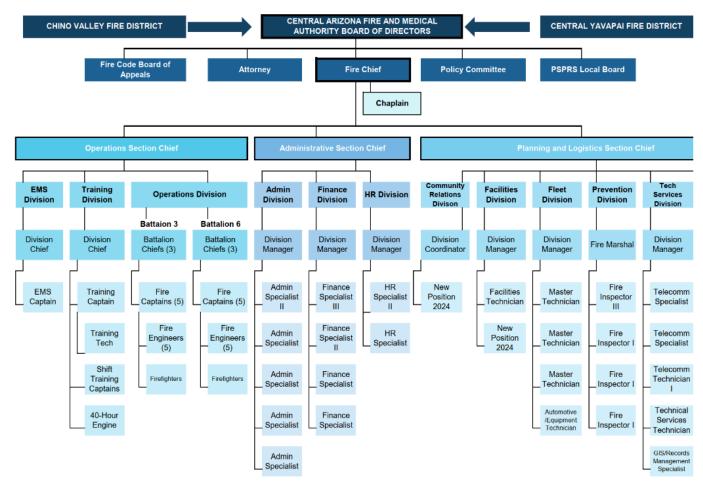


Figure 22: CAFMA Organizational Chart

Fire Stations, Training Facilities, Apparatus, Equipment, and Staffing

Central Prescott

Prescott Fire Department Station 71 333 White Spar Road Prescott, Arizona 86303



EQUIPMENT:

One engine company (three personnel minimum) and a cross-staffed ladder*

One battalion chief (one person minimum)

One Type 6 brush engine for wildland response (cross-staffed)

Additional cross-staffed support apparatus includes one utility for fire scene support, an ATV, a 6×6 Ranger for backcountry response, and a structure protection trailer for wildfire response.

*Cross-staffing means that the crew who usually operate the engine can also work on this apparatus if the specific capability of this apparatus is needed.

RESPONSE AREA: 9 square miles, including the City of Prescott, Prescott National Forest, Hwy 89, and rural areas surrounding the city.

Prescott Fire Department Station 72 530 6th Street Prescott, Arizona 86301



EQUIPMENT:

One engine company (three personnel minimum) and a cross-staffed ladder*

One Type 6 brush engine for wildland response (cross-staffed)

Onerescue ambulance for special events and system backfill (cross-staffed)

*Cross-staffing means that the crew who usually operate the engine can also work on this apparatus if the specific capability of this apparatus is needed.

RESPONSE AREA: 12 square miles, including the City of Prescott, Prescott National Forest, and rural areas surrounding the city.

North Prescott

Prescott Fire Department Station 73 1980 Clubhouse Drive Prescott, Arizona 86301

EQUIPMENT:

One Type 1 engine (three personnel minimum)

One ARFF unit (one person minimum)

One Type 6 for airfield operations (cross-staffed) *

*Cross-staffing means that the crew who usually operate the engine can also work on this apparatus if the specific capability of this apparatus is needed.

RESPONSE AREA: 20 square miles, including Prescott Airport Ernest A. Love Field, the second busiest airport in the Arizona. Embry Riddle State of University, U.S. Aeronautical Forest Service Fire Center and Tanker Base, Ruger Castings Company, and an Industrial Park along with Highway 89 and Highway 89A, State Lands and surrounding rural areas.



Prescott Fire Department Station 74 2747 Smoke Tree Lane Prescott, Arizona 86301



EQUIPMENT:

One Engine Company (three personnel minimum)

One Support Unit for Technical Rescue Response (cross-staffed)

One Rescue Boat (cross-staffed)

One Trench Rescue Trailer (cross-staffed)

*Cross-staffing means that the crew who usually operate the engine can also work on this apparatus if the specific capability of this apparatus is needed.

RESPONSE AREA: 10 square miles, including the City of Prescott, Prescott area lakes, and is home tothe Technical Rescue Team.

East Prescott

Prescott Fire Department Station 75 315 N Lee Boulevard Prescott, Arizona 86301



Central Arizona Fire and Medical Authority Station 50 2780 North Valley View Drive Prescott Valley, Arizona 86314



EQUIPMENT:

One Type 1 engine (three personnel minimum)

One Type 3 wildland engine (crossstaffed)

Onehazardous materials unit shared with CAFMA part of the year (cross-staffed) *

*Cross-staffing means that the crew who usually operate the engine can also work on this apparatus if the specific capability of this apparatus is needed.

RESPONSE AREA:17 square miles, including all hazardousmaterials incidents, City of Prescott, Prescott National Forest, Highway 69, Highway 89, and surrounding rural areas.

EQUIPMENT:

Minimum Staffing: Three firefighters

E50/T50: Both Type I apparatus with three firefighters cross-staffed

UTV 50: cross-staffed

West Prescott

Central Arizona Fire and Medical Authority Station 51 1700 W Iron Springs Road Prescott, Arizona 86305



EQUIPMENT:

Minimum Staffing: Three firefighters

E51: Type I apparatus with three firefighters

WT51: Type I cross-staffed

Central Arizona Fire and Medical Authority Station 52 1601 Happy Valley Road Prescott, Arizona 86305



EQUIPMENT:

Minimum Staffing: 0 (This is a reserve station, staffed by personnel when requested)

WT52: Type III Unstaffed Water Tender

South Prescott

Central Arizona Fire and Medical Authority Station 56 4411 S Ponderosa Road Prescott, Arizona 86303



EQUIPMENT:

Minimum Staffing: 0 (This is a reserve station, staffed by personnel when requested)

WT56: Type III Unstaffed Water Tender

Central Prescott Valley

Central Arizona Fire and Medical Authority Station 53 8555 East Yavapai Road Prescott Valley, Arizona 86314



EQUIPMENT:

Minimum Staffing: Three firefighters, one battalion chief

B3: One battalion chief

E53: Type I apparatus with three firefighters

WT53: Type I cross-staffed

Utility 53: Cross-staffed

Brush 53: Type VI cross-staffed

Central Arizona Fire and Medical Authority Station 540 (CARTA) 9601 East Valley Road Prescott Valley, Arizona 86314



EQUIPMENT:

Minimum Staffing: Three firefighters

E540: Type I Apparatus with three firefighters (Note: 40-hour work week)

E55: Type III Apparatus Cross-Staffed

North Prescott Valley

Central Arizona Fire and Medical Authority Station 58 4850 North Robert Road Prescott, Arizona 86314



EQUIPMENT:

Minimum Staffing: Three firefighters

E58: Type I Apparatus with three firefighters

Support 58: Cross-staffed

HM1: Type I Apparatus cross-staffed (Note: six months out of the year. This unit is transitioned between Station 75 and Station 58 every three months to maintain HazMat Team familiarity)

Rescue 58: Jointly staffed with one CAFMA member and one priority ambulance member with a minimum of one paramedic and one emergency medical technician.

Central Arizona Fire and Medical Authority Station 59 6401 North Viewpoint Drive Prescott Valley, Arizona 86314



EQUIPMENT:

Minimum Staffing: Three firefighters E59: Type I Apparatus with three firefighters WT59: Type I cross-staffed Brush 59: Type VI cross-staffed

East Prescott Valley

Central Arizona Fire and Medical Authority Station 54 13155 East State Route 169 Dewey, Arizona 86327



EQUIPMENT:

Minimum Staffing: Three firefighters

E54: Type I Apparatus with three firefighters

WT54: Type I cross-staffed

Brush 54: Type VI cross-staffed

USFS E932: Type VI with United States Forest Service Staffing

Williamson Valley

Central Arizona Fire and Medical Authority Station 57 4125 West Outer Loop Road Prescott, Arizona 86305



EQUIPMENT:

Minimum Staffing: Three firefighters E57: Type I apparatus with three firefighters WT57: Type I cross-staffed Brush 57: Type VI cross-staffed

Chino Valley

Central Arizona Fire and Medical Authority Station 61 1133 Road 3 North Chino Valley, Arizona 86323



EQUIPMENT:

Minimum Staffing: Three firefighters, one battalion chief

B6: One battalion chief

E61: Type I apparatus with three firefighters

WT61: Type I cross-staffed

Brush 61: Type VI cross-staffed

UTV 61: Cross-staffed

E66: Type III cross-staffed

Central Arizona Fire and Medical Authority Station 62 730 East Road 2 South Chino Valley, Arizona 86323



EQUIPMENT:

Minimum Staffing: Three firefighters

E62: Type I apparatus with three firefighters

WT62: Type I cross-staffed

B62: Type VI cross-staffed

Rescue 62: Jointly staffed with one CAFMA member and one priority ambulance member with a minimum of one paramedic and one emergency medical technician.

Paulden

Central Arizona Fire and Medical Authority Station 63 250 West Sweet Valley Road Paulden, Arizona 86334



EQUIPMENT:

Minimum Staffing: Three firefighters E63: Type I apparatus with three firefighters WT63: Type I cross-staffed Brush 63: Type VI cross-staffed

Training Centers

Prescott 2900 Sundog Ranch Road Prescott, Arizona 86301



Central Arizona Regional Training Academy -CAFMA 9601 E Valley Road Prescott Valley, Arizona 86314



The Fire Training Center located on Sundog Ranch Road serves as the primary location for public safety training for the city's emergency responders. The facility also hosts Yavapai College classes and hosts many regional classes, such as arson seminars and community preparedness groups.

The facility is currently in need of safety and infrastructure-related upgrades, and a capital plan has been developed that is expected to be implemented by 2029 This is intended to develop the training center into a regional asset that supports public safety agencies throughout central Yavapai County.

The Training Campus is laid out in a cityscape design, which adds a real-life effect to what could be experienced on the streets of any community. Many of the buildings serve multipleuses and, in some cases, can be reconfigured internally with modular walls. This capability provides instructors the opportunity to change scenarios and challenge the firefighters.

15-acre site

Five-story training tower

Two classrooms with advanced audio-visual equipment

Computer lab

10,000 sf activity building (heated and cooled)

Outdoor classroom near training tower

Restaurant and strip mall rooms and props

Designed with a cityscape layout.

Extrication area for vehicles

Confined space props

Flashover prop

Numerous forcible entry and ventilation props

Vehicle extrication area

Flammable liquids area

C. Current Descriptions of Levels of Service with Delivery Programs

Fire Suppression

PFD's staffing level for operations as of April 2024 is 67. Of that number, three are battalion chiefs, and 27 are currently paramedics. PFD will be adding six firefighters in fiscal 2025. There are 11 non-operations personnel with a plan to add one position in fiscal year 2025. The current staffing plan for fiscal year 2025 shows the addition of a dedicated fire marshal and two additional variable hourly employees for administrative support.

CAFMA's staffing level for operations as of April 2024 is 133. Of that number, six are battalion chiefs, and 53 are currently paramedics. CAFMA will be adding 21 firefighters in fiscal 2025. There are 44 nonoperations personnel, with a plan to add six more positions in fiscal year 2025. The current staffing plan for the fiscal year 2025 shows the addition of a deputy chief of operations, a wellness officer, and a



second training captain to the Training Division, as well as one to two additional personnel in the EMS Division because of starting a transport ambulance service.

The daily staffing levels system-wide are sixteen fire engines, all staffed with at least one paramedic and three personnel. Three battalion chiefs are on duty daily, covering battalions 1,3, and 6. One ARFF unit is staffed with one ARFF-qualified engineer daily.

The initial response to fire incidents can originate from any of the full-time fire stations within the service boundaries utilizing front-line apparatus. Each station is equipped with front-line apparatus staffed by a team of personnel working three shifts across three battalions. Each battalion is led by a battalion chief responsible for emergency operations and administrative tasks within their respective shifts and battalions. The front-line apparatus stationed at each of these fifteen facilities is equipped with specialized tools for various fire and rescue incidents, ensuring the versatility and efficiency of response efforts. Also, each front-line apparatus has a fire pump capable of delivering at least 1,250 gallons per minute (GPM) and an onboard water supply of 500 to 1000 gallons to support fire suppression efforts in underdeveloped areas. Station 50 hosts a 104-foot ladder company, which is cross-staffed to address fire and rescue missions. Station 71 hosts a 75-foot quint, which is cross-staffed to address fire and rescue missions 71,72,73, 53, 54, 57, 59, 61, 62, and 63 have Type VI apparatus for wildland response. Stations 75, 61, and the Central Arizona Regional

Training Academy (CARTA) have type III apparatus for wildland response. Stations 51, 53, 54, 57, 59, 61, 62, and 63 have large-capacity water tenders for wildland and structural fire response. Two reserve stations house additional apparatus designed to support fires in the rural environment where there is a limited water supply. These additional stations are not staffed full-time, and the apparatus would be staffed with back-fill personnel to support larger emergency incidents. Each full-time station possesses additional apparatus that can be cross-staffed and respond at the discretion of the company officer, depending upon the emergency. The additional apparatus is also staffed during specific weather events with back-fill personnel to support fire suppression efforts. This is especially crucial given the region's diverse topography, which includes a significant wildland-urban interface, where the unique blend of developed and undeveloped land poses distinct challenges to firefighting efforts.

Emergency Medical Services

Each front-line apparatus has a team of personnel and equipment that can handle almost any EMS response. The agencies use a twotiered response model where primary non-transport patient care is offered for advanced life support (ALS) and BLS responses. All frontline response apparatus has at least one ALS member, with all other personnel certified at the BLS level. CAFMA has two fire-based ambulances that operate within the response system's boundaries to support emergency medical transport. These ambulances



operate out of Station 58 and Station 62 and are staffed with one ALS provider, with one additional personnel certified at the BLS level. There are two additional backup ambulances in each battalion that can be backfilled with personnel as necessary. Two private ambulance companies operate in the area to provide transport services to medical facilities. Yavapai Regional Medical Center provides medical direction and base hospital services. All Quality Assurance (QA) and Quality Improvement (QI) initiatives unique to EMS are based on the established triage, treatment, and transport guidelines developed and maintained by the Arizona Department of Health Services Bureau of EMS and Trauma in collaboration with its regional councils.

Technical Rescue

The initial response to technical rescue incidents can originate from any of the full-time fire stations in the region. Each agency has Technical Rescue Technicians who are trained to National Fire Protection Association (NFPA) 1006 standards. This ensures their baseline knowledge in various technical rescue disciplines like swift water, confined space, high angle, trench, mountain, structural collapse/urban search and rescue, and tower rescue operations. These technicians form an integral part of the Prescott Area Regional Response Team and collaborate closely with members from both CAFMA and the PFD. They train and respond to technical rescue incidents within their jurisdiction and extend support to mutual aid partners upon request.



Each battalion maintains equipment for support of technical rescue incidents and back-country search and rescue operations. This includes specialty equipment like rafts, rope rescue bags, swift water equipment, extrication equipment, trench rescue, structural collapse, and confined space. The agencies also have two TRT support apparatus, three utility terrain vehicles (UTV), and one all-terrain vehicle (ATV). Equipment necessary for technical rescue incidents is strategically located at Stations 58, 61, and 74. While technical rescue technicians are assigned to these stations, members who are trained to the rescue technician level are stationed throughout both agencies.

Hazardous Materials

In the region, any of the full-time fire stations and their front-line apparatus can respond to hazardous materials incidents at the operations level. Each agency has hazardous materials technicians who are important members of the Prescott Area Hazardous Materials Response Team, which occurs under a cooperative agreement for both agencies. Each shift at Haz Mat Stations 58 and 75 must have at least one technician-level personnel on duty, with several other technicians available in each agency to respond if required.



Aviation Rescue and Firefighting Services

Prescott Regional Airport (PRC), or Earnest A. Love Field, is northeast of the intersection of Route 89 and Route 89A. The only commercial carrier with regular service is United Airlines, with two daily flights, one each to and from Los Angeles and Denver. FBO services, including refueling of DoD and military aircraft, are available. This airport is the third busiest in the state due to upwards of 375,000 takeoffs and landings that occur due



to the Embry Riddle Aeronautical University's flight school, in addition to private flight schools. The airport is also critical to regional wildfire response as the home to the Prescott Airtanker Base, Helitack Base, and mobilization point for area hotshot crews.

The region provides 24/7 aviation rescue and firefighting (ARFF) services out of Fire Station 73, with support from surrounding stations in a larger emergency. One ARFF engineer is assigned to the ARFF apparatus 24/7, and all members at Fire Station 73 are required to be ARFF certified and maintain their continuing education annually through the Federal Aviation Administration (FAA). Mandatory compliance inspections occur annually through the FAA. One backup ARFF vehicle is in service as well, if needed.

Wildland Fire Services

The region focuses its wildfire fire services on the education, training, and combat of fires in the wildlandurban interface within the service boundary while offering support to other agencies in the Prescott Basin, Arizona, and nationwide. All fire stations have the capability to support initial attack on wildland incidents.

Due to the location of extensive state and federal resources within the jurisdictions of CAFMA and PFD, the initial attack can quickly expand to include incident management and resources at higher levels, as well as air support from Prescott Regional Airport during the fire season.

Members of each agency participate in committees that focus on the issues of wildfire mitigation and extinguishment at the state and federal levels. Locally, the agencies



work with the Arizona Department of Forestry and Fire Management (ADFFM) and the Prescott National Forest (PNF) to provide training drills and classes focused on wildfire mitigation. The agencies have a long-standing presence, with certified wildland firefighters who hold qualifications for supervisory roles on Incident Management Teams (IMTs) around the United States. Equipped to provide wildfire response from any full-time fire station and the associated front-line apparatus, the agencies also respond to requests from

the ADFFM, providing teams and apparatus to support wildfire incidents locally, statewide, and nationally. All department and authority members are Red Card qualified and undergo extensive training. Moreover, all members actively participate in wildfire education and prevention committees, fostering a fire-adaptive community and contributing to wildfire mitigation efforts beyond emergency response.

Specialized Services

The region supports the Prescott Valley Police Department (PVPD) and Prescott Police Department (PPD) with a Special Weapons and Tactics (SWAT) Paramedic/s. Several members operate in this capacity to provide immediate care to anyone injured during these operations. The primary responsibility revolves around administering first aid and



advanced life support (ALS) to victims, fellow officers, or even suspects who may sustain injuries during SWAT operations. The presence of a SWAT Paramedic ensures prompt medical attention is available when needed, thereby increasing the chances of survival and minimizing the impact of injuries on both civilians and law enforcement personnel.

The drone/unmanned aerial vehicle (UAV) program supports emergency preparedness and response. All pilots are FAA-trained to ensure use of agency UAVs complies with local, state, and federal laws. The UAVs are not used for general observation of areas with a reasonable expectation of privacy. The UAVs support search and rescue, hazardous materials ID and recon, locating hotspots, and other scenarios to increase situational awareness during emergency operations.

Community Safety and Remediation Programs

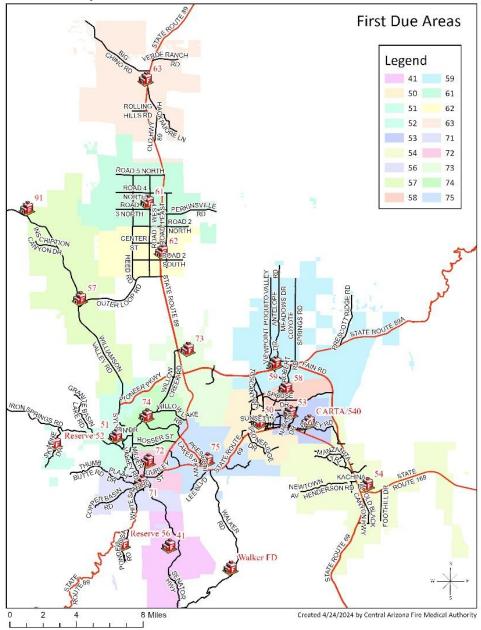
The agencies are dedicated to fostering a safer community by offering a diverse array of community programs. At the heart of its initiative lies the Fire Pal Program, a long-standing and engaging outreach effort where firefighters share fire and life safety information with elementary schools. Complementing this is the Babysitting Class, empowering teenagers with essential skills for responsible childcare, and a Fire Cadet program. The region also offers public CPR, AED, and First Aid Certification classes, equipping individuals with life-saving expertise. Additionally, the agencies aim to reduce the number of preventable injuries and fatalities resulting from improper car seat usage by offering car seat inspections and safety information. Finally, school and daycare classes, civic organizations, families, and more are welcomed into fire stations for immersive tours, cultivating familiarity with firefighters and offering essential fire and life safety information. Through these programs, the agencies not only protect their communities but also nurture a culture of preparedness and care. The agencies are heavily involved in the Firewise program with community inspections, a dedicated fuels reduction program, and a chipping program. Community events involving wildfire education include the wildfire expo, the Firewise festival, public meetings, and school programs. In addition, the agencies are directly tied to the Yavapai Firewise program.

D. Current Deployment and Coverage Areas

Points of Service Delivery

The Prescott Fire Department (PFD) and Central Arizona Fire and Medical Authority (CAFMA) have fifteen (15) Type I Apparatus staffed 24 hours a day. They also utilize one Type 1 Apparatus that is staffed for 40 hours per week. Each apparatus has at least three personnel, including one captain or acting captain, one engineer or acting engineer, and one firefighter. In addition, all apparatus has a minimum staffing of one paramedic and two emergency medical technicians. Specialty team apparatus requires a minimum staffing of one technical rescue technician, one hazardous materials technician, or one aircraft rescue firefighting technician.

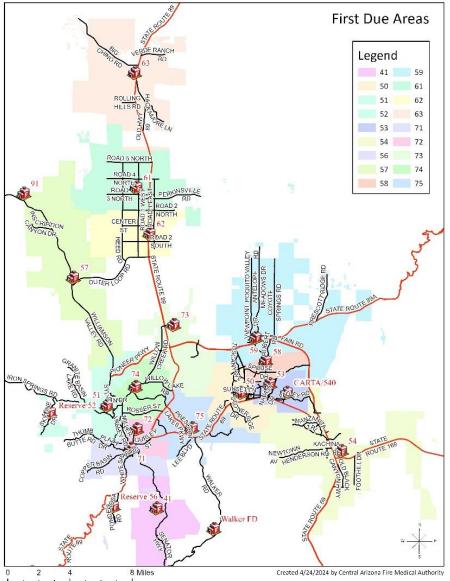
Map 19: Points of Service Delivery



Response Areas

The region is covered by 15 first due response areas. These first due response areas are considered as PFD and CAFMA geographic planning zones, as noted in the exhibit map below. CAFMA staffs ten full-time stations and two reserve stations covering 369 square miles of Yavapai County. PFD staffs five full-time stations covering 45.2 square miles. A robust automatic aid agreement and move-up process through a software program called *LiveMUM* provides coverage for these planning zones. *LiveMUM* (Live Move-Up Module) is a real-time, dynamic software application that provides coverage monitoring, alerting, and move-up recommendations. The system provides emergency dispatchers with automated, optimal move-up recommendations while simultaneously allowing them to continuously monitor and identify any gaps in coverage. Connecting with computer aided dispatch (CAD) in real-time, *LiveMUM* identifies holes in coverage by tracking each unit's status, location, and incident assignment. The software then simultaneously recommends optimal, practical, and automated unit relocations, or "move-ups," that reflect the agencies' custom coverage policies. During this process, a more detailed approach to planning zone methodology will be addressed.

Map 20: First Due Coverage Areas



Minimum Deployment Resources

Station	Resource	Minimum Staffing	Cross-Staffed Resources	Battalion
71	Engine 71	3	Truck 71, Brush 71, Utility 71, UTV 71	1
71	Battalion 1	1	N/A	1
72	Engine 72	3	Truck 72, Brush 72	1
73	Engine 73	3	Brush 73	1
73	Foam 73	1	N/A	1
74	Engine 74	3	Support 74, Boat 74, Trailer 74	1
75	Engine 75	3	HazMat 1, Brush 75	1
50	Engine 50	3	Truck 50, UTV 50	3
51	Engine 51	3	Water Tender 51	1
52	WT 52	Unstaffed	N/A	1
53	Engine 53	3	Water Tender 53, Brush 53, Utility 53	3
53	Battalion 3	1	N/A	3
CARTA	Engine 540	3 (40 Hour Engine)	Engine 55	3
54	Engine 54	3	Water Tender 54, Brush 54	3
56	WT 56	Unstaffed	N/A	1
57	Engine 57	3	Water Tender 57, Brush 57	6
58	Engine 58	3	Support 58, Rescue 58	3
59	Engine 59	3	Water Tender 59, Brush 59	3
61	Engine 61	3	Water Tender 61, Brush 61, UTV 61, Engine 61	6
61	Battalion 6	1	N/A	6
62	Engine 62	3	Water Tender 62, Brush 62, Rescue 62	6
63	Engine 63	3	Water Tender 63, Brush 63	6
	Total: 20	Total: 52		

Table 1: Minimum Daily Deployment Resources for PFD and CAFMA

E. Summary of Community Response History

To provide consistent data, the agencies will provide five years of data between the PFD and CAFMA The figure below illustrates the system-wide response history within the communities serviced.

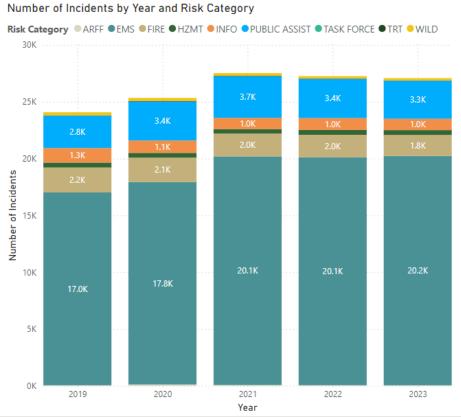


Figure 23: Incidents by Year and Risk Category (2019-2023)

Call Volume by Risk Category

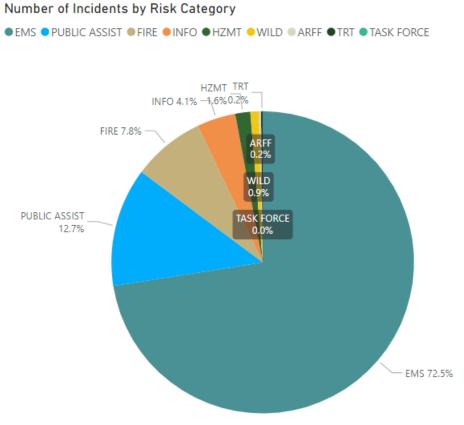


Figure 24: Call Volume by Risk Category (2023)

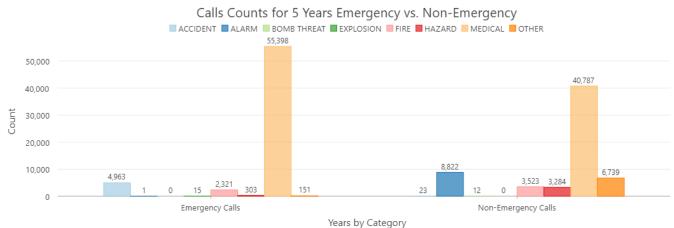


Figure 25: Five-Year Call Counts - Emergency vs Non-Emergency

F. Community Priorities, Expectations, and Performance Goals

PFD Core Identity and Mindset

On January 25, 2023, the PFD set out on a new journey to reidentify itself after a long history of tragedy and struggle within the organization. One that honored our past but set us on an agreed-upon path of success. The following became our core identity and mindset:

Our Purpose - Mission

Mitigate the community's risk through service, excellence, and compassion.

Our Core Identity and Attitude

Community First Courage, Grit, and Duty Driven by Excellence

Our Shared Values and Beliefs

Professionalism Competence Compassion Trust Collaboration Integrity Leadership Innovation Fun Humility Ownership

Our Aspiration - Vision

A community partner that instills pride, supports our people, leads the region, and proactively solves public safety challenges.

CAFMA Mission Statement

Our Mission: "Protecting life and property through prevention and response" recognizes the importance of prevention. It is understood that the response aspect of the job, which ishow the public typically identifies the agency, is the reactionary part of the service provided to the community. Prevention serves as the proactive segment of work. Both are the agency's purpose and promise to all who seek help.

Our Vision: "To be a progressive fire service leader in Arizona through leadership,cooperation, and innovation" is an ongoing effort to provide the best service possible forinternal and external customers. It is not something that can be achieved without a true commitment to meeting the challenges of today and creating opportunities for tomorrow. The Central Arizona Fire and Medical Authority was founded as part of thisvision.

Core values are what the agencymembers believe in; they are the cornerstone of the agency. Times change, guidelines change, equipment changes, and personnel change, butcore ideologies will remain constant. Agency stakeholders worked together to define core values and remain committed to their spirit and intent despite the test of time.

We strive to serve our internal and external customers with PRIDE:

Professional – We will adhere to the highest standards of our profession and adopt bestpractices.

Respect – We believe in the basic dignity of every individual and all members of the community and organization.

Integrity – We are honest and accountable.

Dedication – We are committed to quality, reliable, and respectful service delivery.

Excellence – We will demonstrate a high level of knowledge and skill in all aspects of our profession.

Community Service Priorities

PFD

A community service priority list has been established, soliciting the businesses and citizens within the area. As with the business community, the citizen stakeholders prioritized advanced life support (paramedic) services as the most critical service offered by PFD, followed by fire suppression. The citizens' priorities differed slightly from the business community, but public education scored the lowest.

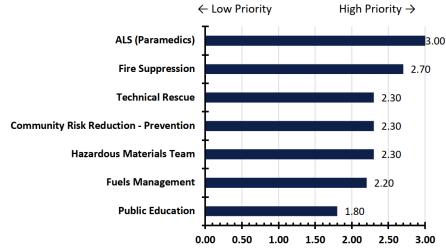


Figure 26: PFD Community Service Priorities

CAFMA

CAFMA has not obtained community service priorities yet.

Community Service Expectations

PFD

In January 2024, a community-wide survey conducted by the national polling firm Polco was completed. Polco representatives gave an overview of their 120-page report, with three key findings, to the City Council at a study session on Tuesday, January 23. The findings were that residents value the natural environment, Prescott residents feel safe and indicate support for additional investment in public safety, and some aspects of mobility could present opportunities for the city.

Here are the three key findings and a brief description of the report:

- 1. **The city's natural environment is valued by residents.** According to the report, about 9 in 10 survey respondents identified the natural environment as an essential or very important area of focus for the community in the next two years, placing it among residents' top priorities for Prescott. In addition to being immensely important, all evaluations of the quality of the city's natural environment were above or like the national average. With a rating of 91% excellent or good, the overall quality of natural environment in Prescott ranked higher than the national benchmarks.
- 2. **Prescott residents feel safe andindicate support for additional investment in public safety.** Nearly all survey respondents indicated that they felt very or somewhat safe in both their neighborhood (96% very or somewhat safe) and Prescott's downtown/commercial area during the day (94%). About 9 in 10 survey participants favorably rated their feeling of safety from property

crime, higher than the national benchmarks. A similar percentage reportedly felt safe from violent crime, but this score was on par with comparison communities. Resident perception of safety from fire, flood, or other natural disasters also met the national average, with about three-quarters of evaluations being positive.

3. Some aspects of mobility could present opportunities for growth for the city. The facet of mobility measures the ease with which residents can move around their communities for leisure or business and is a key driver of resident satisfaction. Scores provided by Prescott residents largely place the city on par with comparison communities, but below-average marks for some aspects of mobility may suggest an opportunity for additional focus on alternative forms of transportation such as bicycling and public transit.

In October 2023, 3,000 citizens were randomly selected to receive a mailed survey. Then, on November 6th, an online version of the same survey was made available to the public for response.

Developed over 20 years ago and continually refined, the NCS is a survey of resident opinion that provides robust benchmark comparisons among communities across the nation. It has been used in more than 350 jurisdictions across 46 states. Communities using The NCS have reported that the tool improved service delivery, strengthened communications with community stakeholders, and helped leaders identify clear priorities for use in strategic planning and budget setting. It is the only resident survey endorsed by the International City/County Management Association and the National League of Cities.

The complete report and other information about the survey can be found on the city's website,Prescott-Arizona.gov or go to <u>ParticipatePrescott.com</u>.

CAFMA

Following the series of internal input sessions, roundtables were held with local government and community leaders and the CAFMA Board. These sessions reviewed the current state analysis of CAFMA, the assessment of the emerging regional risks, the identification of challenges ahead for CAFMA, and the preliminary strategic initiatives. There was a strong level of agreement about regional growth and the need for CAFMA to expand its resources to maintain service levels.

Some of the key *messages* that emerged out of these external meetings:

- Don't expect the growth in this region to slow down--we have the open land and the lifestyle that many people want.
- The expectations of quality service and fast response times will be there, maybe even amplified for people coming from larger cities. We must raise the bar on our planning and service delivery.
- All fire departments are facing challenges in attracting the workforce--ours is even steeper due to the cost-of-living issues (housing, affordability, etc.). We must take care of these people and be creative in building a pipeline.
- Current revenue sources and reliance on property tax will prove to be insufficient for the future. We must work together to look at how we can create long-term financial sustainability for CAFMA.
- We are stronger together at the community level--we face many similar challenges at, at the end of the day, this is our community. Communicate/inform consistently and invite each other as partners in creating solutions.

- We have a particular challenge on the medical side and the increase in 911 calls and transport when transport may not be required. We need to rethink our approach and look for new approaches/technologies and community engagement/education to help manage this. The medical community must be a part of the problem-solving.
- CAFMA is your partner at all levels and this iteration of strategic planning may be the most important we have ever done. You are part of that planning, and we will keep you informed as we develop and move the plans forward.

The combination of the internal stakeholder sessions (conducted via online facilitated sessions) and the external stakeholder sessions (conducted via in-person roundtable sessions) set the stage for the June 5thLeadership Workshop. The session was conducted in person at the CAFMA headquarters building and attended by Chief Freitag and key staff and leadership team members. The focus of the session was to develop five to seven strategic focus areas that anchor the strategic plan for CAFMA. These areas would then be reviewed by an online survey by the CAFMA internal stakeholders for their feedback/validation.

Historical Performance Goals

PFD

The following graph is from the PFD's original (first-ever CRA/SOC), showing the historical performance goals identified in 2017.

Table 2. Summary of National Standards	PFD Goals vs Actual Performance (2017)
Table 2. Summary of National Standards,	T F D Goals VS Actual T error mance (2017)

Response Element	NFPA 1710	PFD Goal	PFD Actual	Met	
Call Answer Time	<u><</u> 15 seconds @ 95%	<u><</u> 10 seconds @ 100%	10 seconds @ 98.5%	Yes	
Call Processing—EMS	<u><</u> 90 seconds @ 90% ¹	<u><</u> 70 seconds @ 90%	41 seconds @ 90%	Vac	
Call Processing—Fire, Other	<u><</u> 64 seconds @ 90%	<u><</u> 50 seconds @ 90%	41 seconds @ 90%	Yes	
Turnout Time—EMS	<u><</u> 60 seconds @ 90%	<u><</u> 60 seconds @ 90%	1.50 @ 0.0%	NI -	
Turnout Time—Fire, Other	<u><</u> 1:20 @ 90%	<u><</u> 1:20 @ 90%	1:50 @ 90%	No	
Travel Time	<u><</u> 4:00 @ 90%	<u><</u> 4:20 @ 90%	8:27 @ 90%	No	
Response Time—EMS	<u><</u> 5:00 @ 90%	<u><</u> 5:20 @ 90%		-	
Response Time—Fire and Other	<u><</u> 5:20 @ 90%	<u><</u> 5:40 @ 90%	9:46 @ 90%	No	
Received to Arrival Time—EMS	<u><</u> 6:30 @ 90%	<u><</u> 6:30 @ 90%			
Received to Arrival Time—Fire and Other	<u>≤</u> 6:24 @ 90%	<u>≤</u> 6:30 @ 90%	10:15 @ 90%	No	

¹Calls requiring emergency medical dispatch questioning and pre-arrival medical instructions

CAFMA

The following graphs represent CAFMA's historical performance goals. It is the intent of the agencies during the study to combine performance goals system wide that are the same.

Table 3: Benchmark Report - Decem

DECEMBER 2023 BENCHMARK REPORT														
Response Time Performance														
CAFMA	Firefighter	per Capit	a Ratio	1	Performance Zone URBAN SUBURBAN RL								WILDE	RNESS
	4 Firefighte				Standara		09:00 mm:ss		10:00 mm:ss		14:00 mm:ss		30:00 mm:ss	
Fire departmer or more had m	nts protecting com edian rates of 0.8 000 people, accor	munities of 2 7 to 1.32 care	5,000 people er firefighters			ntile	93.31	269	86.15	1 <mark>30</mark>	90.19	214	100	1
				1	Avg. Em	ergency	05:51	mm:ss	06:58	mm:ss		mm:ss		mm:ss
RES	SCUE UNIT	RESPON	SE		Resp	onse	(+4	secs)	(+1	secs)	(-34	secs)	(+03:15	mm:ss
Rescue	Dispatched	Transport	Hours											
RES53	0	0	0				Resp	onse Re		(12 Mo	nth Ave	rage)		
Pay115A	54	45	42.56							rk of 70%				
RES61	0	0	0		E50	E51	E53	E54	E57	E58	E59	E61	E62	E63
Pay130A	41	24	34.29		74.00%	68.30%	75.80%	87.94%	86.88%	71.16%	82.93%	76.88%	75.66%	91.70
				Average	Call Vol	umes pe								
U	NIT	E50	E51	E53	E54	E57	E58	E59	E61	E62	E63	B3	B6	E540
A Shift	(10 days)	7.20	7.70	5.80	7.10	1.90	6.40	5.10	3.70	5.20	2.10	1.90	0.60	
B Shift (10 Days)	4.30	5.40	6.20	4.30	1.60	5.90	5.10	3.80	6.00	1.90	1.30	0.50	31 Call
C Shift (11 Days)	7.09	7.09	7.45	4.64	2.64	7.64	6.91	3.45	5.45	1.45	2.09	0.64	15 Da
Total Avg	. (31 Days)	6.23	6.74	6.52	5.32	2.06	6.68	5.74	3.65	5.55	1.81	1.77	0.52	2.07
+/- of pri	ior month	0.49	1.18	0.28	1.26	0.20	1.01	-0.36	0.05	1.12	0.11	0.14	-0.15	0.36
	-				Unit Hour Utilization							ι.		
U	NIT	E50	E51	E53	E54	E57	E58	E59	E61	E62	E63	B3	B6	E540
	nt Hours	97.99	87.07	94.72	108.68	36.07	89.43	96.94	54.06	86.95	39.75	26.05	10.17	16.90
	Activity Hrs	145.08	91.10	86.47	140.75	86.47	60.79	159.15	85.85	108.00	140.90	20.00	7.60	66.3
Total Hours		243.07	178.17	181.19	249.43	122.54	150.22	256.09	139.91	194.95	180.65	46.05	17.77	83.2
Hours i	n Month	744	744	744	744	744	744	744	744	744	744	744	744	150
Unit Hour	Utilization	32.67%	23.95%	24.35%	33.53%	16.47%	20.19%	34.42%	18.81%	26.20%	24.28%	6.19%	2.39%	55.49
+/- of pr	ior month	4.84%	-3.23%	-4.71%	3.10%	-1.45%	-2.19%	7.38%	-1.81%	3.14%	-6.17%	2.82%	-3.33%	9.439
	-	Low	Below A	Average	Ave	rage	Above	Average	High		ĺ.			
UHU Range:		< 15%	15-2	0		35%		45%		55%				

Table 4: Statistical Summary - Fourth Quarter 2023

	S	statisti	cal	Sui	nma	ry:	4th	Quar	ter 2	023	~	AL A	RIZO
	Call Daily	Response	U	nit Ho	our	Vicit	MANA CO	zfire.go		-110/	à.		20
Unit	Volume Avg.			ilizati				ps/ for r			3	N	AV
E50	536 5.83	76.82%		31.44	%						(
E51	564 6.13	68.54%		25.29	%			ding Ce		izona			
E53	574 6.24	74.27%		26.87	%	Fire IV	ledical	Authori	ty.		4	FIR	F
E540	102 2.08	N/A		54.33	%							FIK	L
E54	438 4.76	88.44%	-)	27.93	%	c	ALL VO	LUME	00	t N	ov	Dec	4th Qtr
E57	176 1.91	89.68%		17.20	%	-		NCIDENTS		10 1.1			3,823
E58	571 6.21	73.22%		22.02	%						100000 ES		
E59	534 5.80	81.87%		29.92	%	ALL IN	CIDENT	RESPONSE		27 1,2	-		4,179
E61	341 3.71	76.10%		20.11	%	U	NIT WOR	KLOAD	1,5	42 1,3	379 1	,590	4,511
E62	482 5.24	78.49%	+	26.17									_
E63	170 1.85	91.54%	1 3	25.55	%	Ave	rage P	erform	ance T	imes b	y Res	ponse	Mode
Count	of an engine being f	irst on-scen	e to	an					_		-		
ncident	t in their first due ar	ea / Count o	finc	idents	in			Mode	Turne		espon		source
and the second se	gine's first due area.					Emerg		States (IV)	01:0	-	06:52	_	57:30
	lours Committed to		raini	ng &			merge		01:0		08:10		38:23
ctivitie	es / Total Hours in th	ne Quarter.				Overa	II Aver	age	01:0	4	07:30	4	17:55
	Emergency (Code 3	Respo Responses	that M	leet the		Standa	rd / All E	mergency			e Define	ed Area	
		UF	BAN	N 🟠	SUE	BURB/	N	S RU	RAL 💋	J WI	LDER	NESS*	
	STANDARD	09:00	09:00 mm;ss		10:0	0 mm	:ss	14:00	mm:ss	30	0:00 n	nm:ss	1
	2023	%	C/	ALLS	%	C/	LLS	%	CALL	_	6 1	CALLS	1
	Jan-March	93.81		546	88.7		55	90.44	523		.86	14	
	April-June	94.11	-	713	91.3		34	91.7	518		00	14	1
	July-Sept	91.07	_			_	42	93.11	508	_	.24	21	1
	Oct-Dec	94.2	_	327	93.2 90.4	-	55	91.11	540		.21	19	1
	TOTAL	93.21		,903	90.9	-	386		2,08		.65	68	1
	Average Emergen Response					8 mm			mm:ss			nm:ss	
				- г	FOU	DTH	UADT	FD 2022	Call V	1990		-of-district	
	STAFFING SUN	MARY			FOU		UARI	ER 2023		orume t	y not	u vs. w	еекааў
	OPERATI	ONS		1 [HOUT	CT D.	Mar	TITC	TATES	THUT			TOT
RC	/Capt/Eng/FF	6/31/31	142	1 H	HOUR 0	SUN 13	MON 9	TUES	WED 13	THUR: 13	5 FR	_	TOT A
DC	EMS		142	1 F	1	11	14	14	6	8	11		73
		3		1 1	2	13	11	12	9	10	14		81
<u> </u>	Training	4		1 [3	12	9	19	7	10	10		80
	Total	117		ΙL	4	11	11	7	13	14	9	8	73
	ADMINICTO	ATION		1 1	5	15	24	12	16	12	11		107
	ADMINISTR	1		4 H	6	13 23	10 28	17 26	19 29	13 24	16		105
C	chief Officers	4		1 1	8	23	40	33	29	27	28		199
	Finance	5		l l	9	30	39	39	31	33	37		241
Hu	man Resources	3		10	10	40	39	34	36	38	27		240
A	Administration 6			1[11	37	41	38	30	30	38		249
		18	-	1	12	31	37	41	37	33	41		257
10141 18			: H	13 14	41 23	43 36	41 40	45 35	36 29	44 26		279	
PL	ANNING & L	OGISTI	CS	11	14	34	30	40	36	23	49		214
			50	4 h	16	44	35	37	38	42	31		253
	Communications	-		1 1	17	30	39	44	39	37	44		259
Com	munity Relations	-	_	1 [18	30	27	29	34	28	31		211
	Facilities	2			19	28	34	31	25	30	30		204
	Fleet	5			20	23	20	24	16	20	28		150
		2		1 1	21 22	18 27	24	17	21	14 22	31		149
	Warehouse				//	1 21	21	13	19	22	16	23	143
<u> </u>	Warehouse	3		1 F					14	14	15	15	_
<u> </u>	Warehouse Prevention Total	5 22		1	23 Total	11 581	11 639	13 632	14 590	14 560	15 633		93

G. Community Risk Assessment and Risk Levels

Geographical Planning Zones

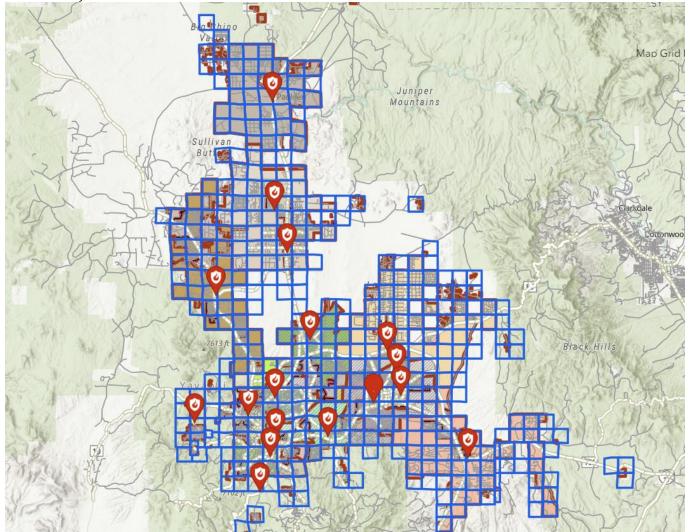
To create a unified approach to planning zone methodology, the Prescott Fire Department (PFD) and Central Arizona Fire and Medical Authority (CAFMA) utilize the following considerations:

- Organized geographical planning zones designated by size or unique use.
- Organized geographical planning zones designated by station response areas, also known as first-due areas.
- Organized geographic planning zones designated by water supply, whereas areas with fire hydrants are considered urban, and areas without fire hydrants are considered rural. This methodology supports resource allocation based on water supply.
- Organized geographical planning zone based on population density.

These geographic planning zones are used to capture and analyze detailed data on regions and community characteristics, risk, and emergency event data. Event data is geolocated based on risk classification and further categorized by risk score, identifying the risk as high, moderate, or low.

The following are some of the documentation needed to drive effective decision-making in emergency response to a more detailed degree:

- Size of planning area.
- The population density (both normal and transitional).
- Road miles.
- The general and different types of occupancies.
- The number of similar occupancies.
- Call volume broken down by risk class.
- Risk classes scored utilizing a 3-axis risk analysis.
- Demographics.
- Geophysical issues.
- Urban interface issues.

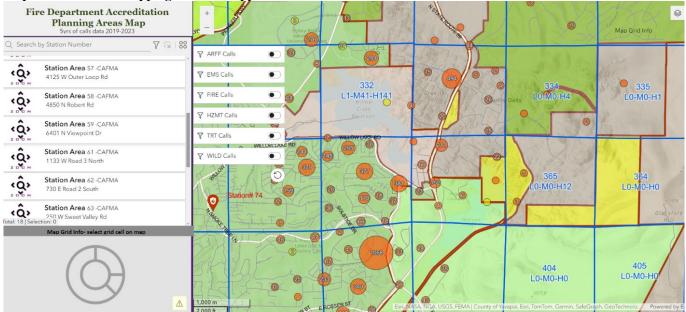


Map 21: Geographic Planning Zones with Grid Overlay *Red icons are fire stations*

PFD and CAFMA Accreditation Geographic Planning Zone Interactive Application

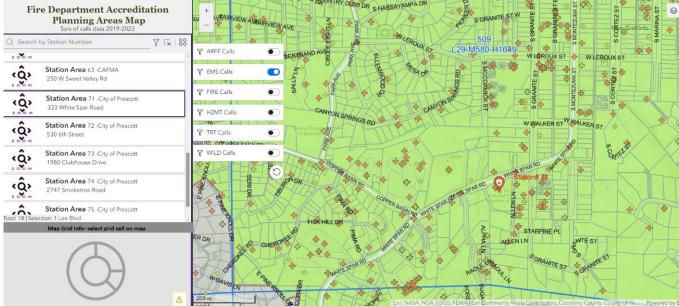
During the collaborative effort between PFD and CAFMA, it was imperative that each agency's information technology departments came together just as effectively. Significant effort between these departments resulted in an interactive mapping and data application that is directly connected to the collective computer-aided dispatch (CAD) data. It runs live in a five-year data cycle. Each day it refreshes, and end users are looking at data that is reflective from that day and five years into the past.

This application consists of multiple layers and interfaces designed to support decision-making related to risk. It geolocates five years of data based on risk category and level. Furthermore, it can run live using current CAD data processed according to the established outlier policy. Below are several exhibits showing what the application is capable of. Numerous features can be turned on and off, which makes this application customizable for the end user.



Map 22: Interactive Mapping and Data Application Initial Screen

Map 23: Interactive Application with EMS Toggled with High, Moderate, and Low Incidents





Map 24: Interactive Application with Fire Toggled within a Geographic Planning Zone

Risk Assessment Methodology

PFD and CAFMA performed a thorough risk assessment utilizing the following methodology.

Risk Classification and Categorization

Step 1: PFD and CAFMA conducted a thorough classification assessment and categorization of risks. Eightytwo types of dispatch incidents were identified which were divided into six risk classes: aircraft rescue firefighting, emergency medical services, fire, hazardous materials, technical rescue, and wildland fire. Incident data is collected using computer-aided dispatch (CAD) and qualified using a data governance policy.

Table 5: Dispatch Incident Type Risk Classifications

Dispatch Incident Type	Risk Classification
AIR3	ARFF
AIR2	ARFF
AIR 1	ARFF
ABDPAIN3	EMS
962A	EMS
963	EMS
963A	EMS
962XA	EMS
962X	EMS
962	EMS
ALLERGY3	EMS
ANIMAL3	EMS
ASSAULT3	EMS
BACK3	EMS
BREATH3	EMS
BURNS3	EMS
CARDIAC3	EMS
CHEST3	EMS

Dispatch Incident Type	Risk Classification
СНОКЕЗ	EMS
COLD3	EMS
SEIZE3	EMS
DIABETIC3	EMS
DROWN3	EMS
ELECTRO3	EMS
EYEPROB3	EMS
FALL3	EMS
1MED	EMS
HEAD3	EMS
HEART3	EMS
HEAT3	EMS
HEMORR3	EMS
OVERD3	EMS
PREGNAN3	EMS
PSYCH3	EMS
SICK3	EMS
STABGUN3	EMS
STROKE3	EMS
666A	EMS
666D	EMS
<u>6661</u>	EMS
<u>666J</u>	EMS
TRAFFIC3	EMS
TRAUMA3	EMS
UNCON3	EMS
INACCESS3	EMS
UNKNOWN3	EMS
CHFR	FIRE
DPFR	FIRE
DPFRX	FIRE
EXPLO	FIRE
BBQ	FIRE
BBQX	FIRE
HTSP	FIRE
OVFR	FIRE
PLFR	FIRE
STFRP	FIRE
SDFR	FIRE
SDFRX	FIRE
STVFR	FIRE
STFR	FIRE
TRFR	FIRE
TRFRX	FIRE
UNKF	FIRE
VHFR	FIRE
VHFRX	FIRE
CARBON3	HZMT
HZMT1	HZMT
HZMT2	HZMT
HZMT3	HZMT
STCLP	TRT
TRCS	TRT
TRHA	TRT
TRLA	TRT
TRSTW	TRT

Dispatch Incident Type	Risk Classification
TRSWW	TRT
TRTCH	TRT
SMOK2	WILD
WDFR2	WILD
WDFR1	WILD

Critical Task Analysis

Step 2: Critical Task Analysis refers to the ability to allocate resources to a specific task to stabilize an incident. The National Fire Protection Agency (NFPA) Standard 1710, *Organization and Deployment of Fire Suppression Operations, Emergency Medical Operations and Special Operations to the Public by Career Fire Departments*, is based on scientific studies to determine the number of firefighters required to carry out initial tasks for scenarios such as aircraft rescue incidents, emergency medical calls, structural fires, hazardousmaterials incidents, technical rescue incidents, or wildland fires. This standard is applicable to nearly all career fire departments and outlines the minimum resource deployment requirements while also addressing firefighter occupational health and safety. Additionally, the standard categorizes risks into three hazard levels: low hazard, moderate hazard, and high hazard.

While NFPA 1710 sets a standard, it is important to acknowledge that fire department agencies vary and have different resources. PFD and CAFMA have recognized this, which is why this joint Community Risk Assessment/Standards of Cover was created. This unified approach aims to make the most of the strong partnership between the agencies and the community served. By doing so, the agencies can utilize regional assets in a cost-effective manner to reduce risk system-wide. The goal is to bring value to both organizations and the region served.

During this step of the process, critical task analysis was completed based on the amount of qualified personnel and units needed for the incident and not on resources within the system. Below are the critical task analyses across all six risk classes broken into low hazard, moderate hazard, and high

hazard. However, with respect to ARFF, a maximum risk hazard was identified. With respect to fire suppression, a maximum risk hazard was also identified, and with respect to EMS, a maximum risk hazard and modified high risk hazard were identified. They will be implemented into computer-aided dispatch (CAD) during *ProQA* implementation. No data exists for the maximum risk category until it becomes available with this programming implementation.

Aircraft Rescue Firefighting

Table 6: Critical Tasking - Maximum Risk ARFF

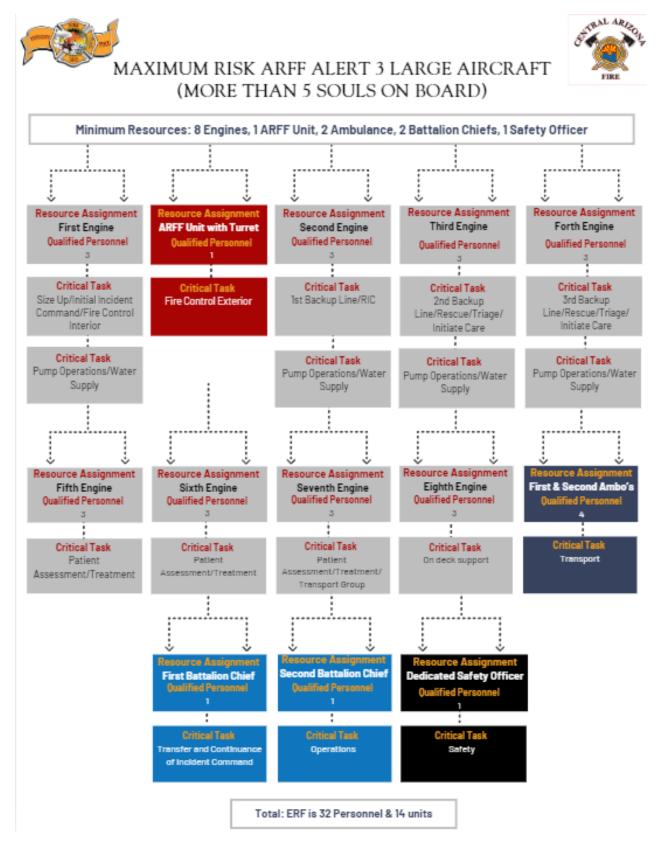
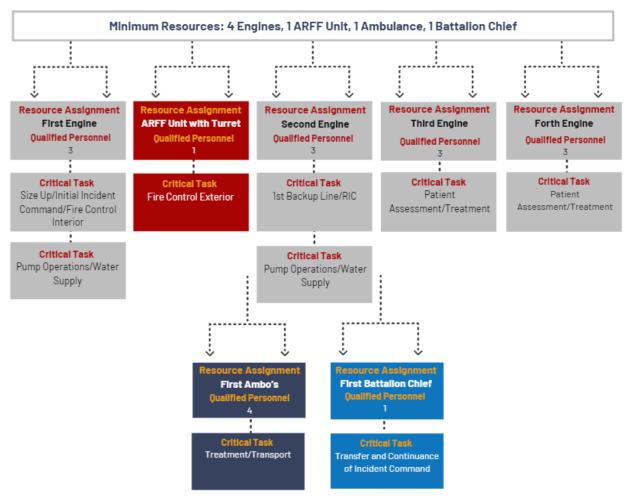


Table 7: Critical Tasking - High Risk ARFF





HIGH RISK ARFF ALERT 3 SMALL AIRCRAFT (LESS THAN 4 SOULS ON BOARD)



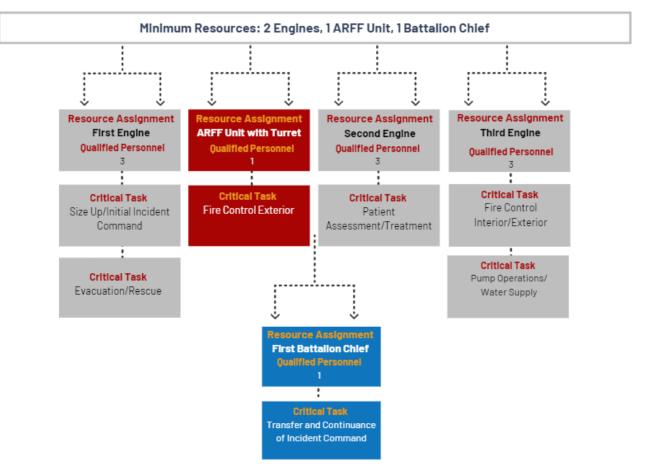
Total: ERF is 16 Personnel & 7 units

Table 8: Critical Tasking - Moderate Risk ARFF





MODERATE RISK ARFF ALERT 2 (IN FLIGHT EMERGENCY)



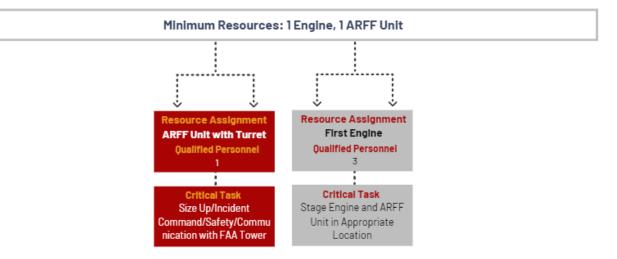
Total: ERF is 11 Personnel & 4 units

Table 9: Critical Tasking - Low Risk ARFF





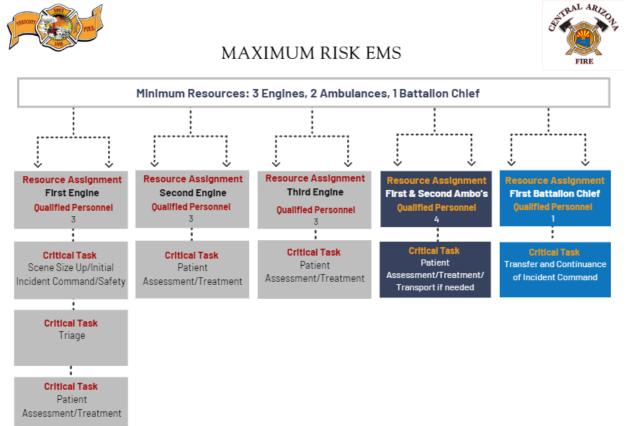
LOW RISK ARFF ALERT 1 (STANDBY)



Total: ERF is 4 Personnel & 2 units

Emergency Medical Services

Table 10: Critical Tasking - Maximum Risk EMS



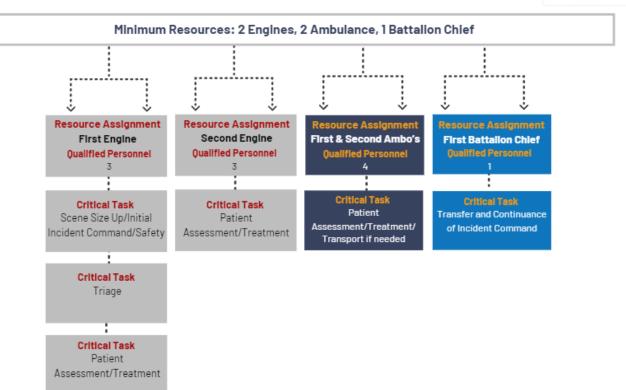
Total: ERF is 14 Personnel & 6 units

HIGH RISK EMS

Table 11: Critical Tasking - High Risk EMS



FIRE



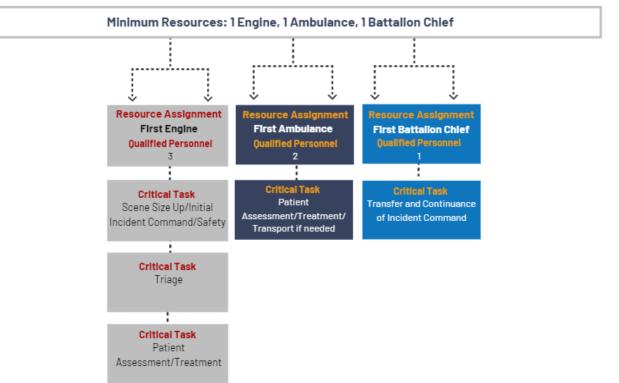
Total: ERF is 11 Personnel & 5 units

Table 12: Critical Tasking - Modified High Risk EMS









Note: Due to complexity, incidents involving cardiac arrest, suicide, drowning, overdose, stabbings, gunshot wounds, and severe trauma will include one engine, one ambulance, and a battalion chief. The CRASOC Advisory Group decided that an ERF of six qualified personnel and three units will constitute a modified highrisk EMS to maintain safety and additional support. These calls do not require multiple engines and ambulances when there is only one patient.

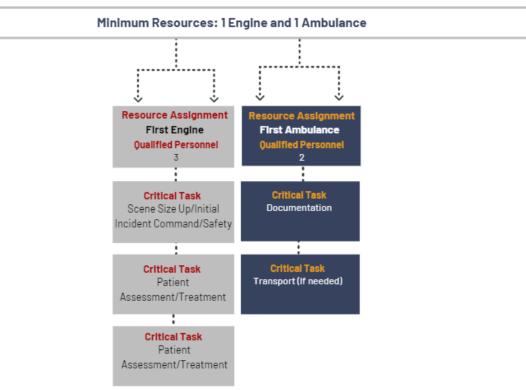
Total: ERF is 6 Personnel & 3 units

Table 13: Critical Tasking - Moderate Risk EMS





MODERATE RISK EMS



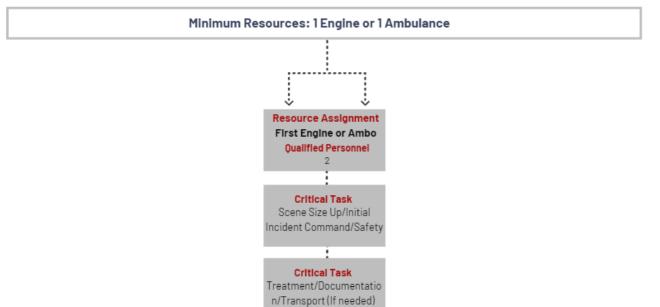
Total: ERF is 5 Personnel & 2 units

Table 14: Critical Tasking - Low Risk EMS





LOW RISK EMS



Total: ERF is 2 Personnel & 1 units

Fire Suppression

Table 15: Critical Tasking - Maximum Risk Fire Suppression



MAXIMUM RISK FIRE SUPPRESSION



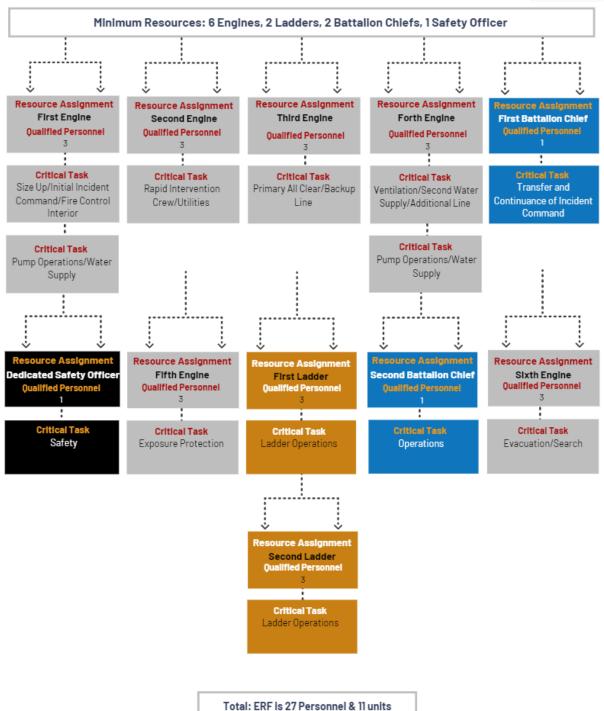
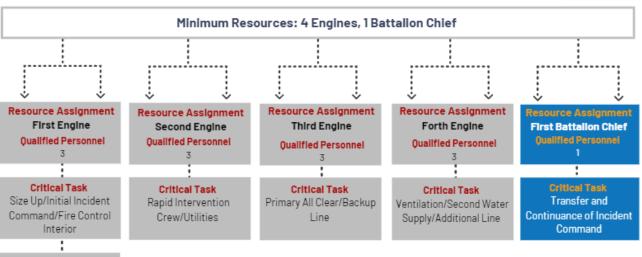


Table 16: Critical Tasking - High Risk Fire Suppression



HIGH RISK FIRE SUPPRESSION





Critical Task Pump Operations/Water Supply

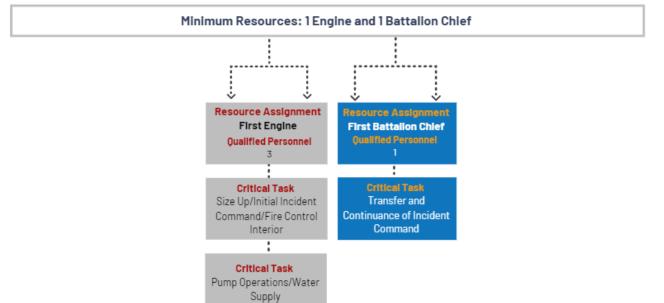
Total: ERF is 13 Personnel & 5 units

Table 17: Critical Tasking - Moderate Risk Fire Suppression



MODERATE RISK FIRE SUPPRESSION





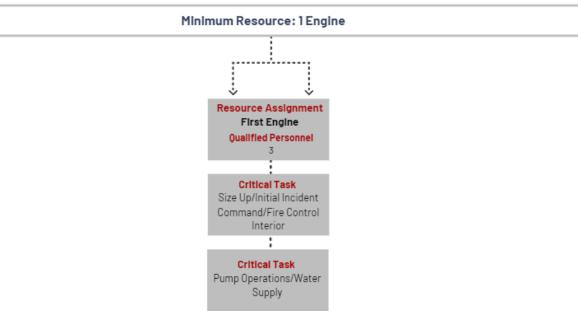
Total: ERF is 4 Personnel & 2 units

Table 18: Critical Tasking - Low Risk Fire Suppression



LOW RISK FIRE SUPPRESSION





Total: ERF is 3 Personnel & 1 units

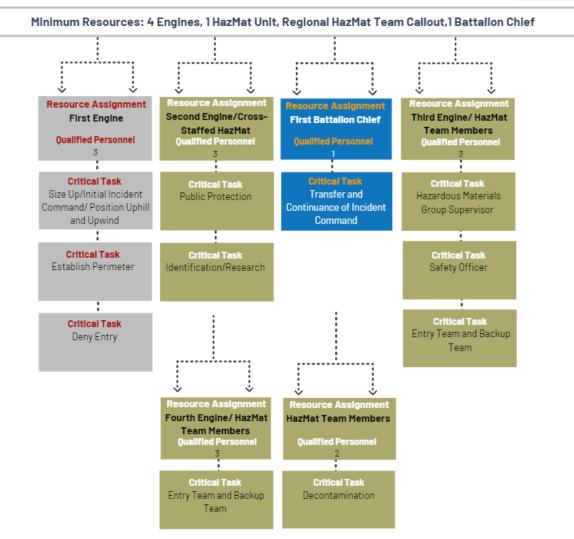
Hazardous Materials

Table 19: Critical Tasking - High Risk Hazardous Materials



HIGH RISK HAZARDOUS MATERIALS





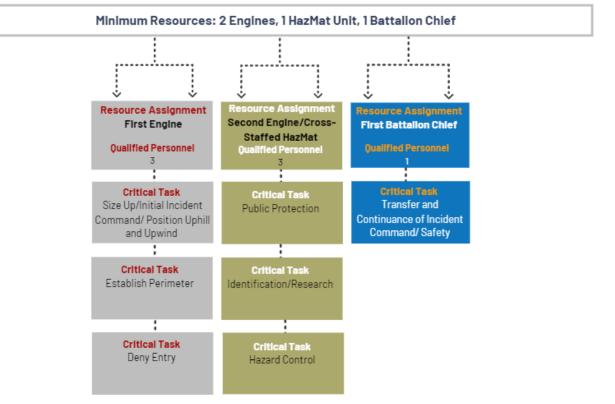
Total: ERF is 15 Personnel & 6 units

Table 20: Critical Tasking - Moderate Risk Hazardous Materials



MODERATE RISK HAZARDOUS MATERIALS





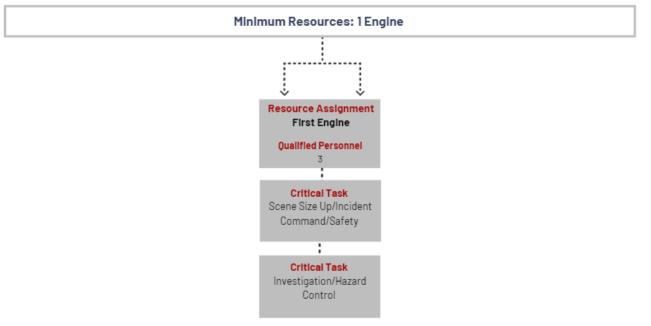
Total: ERF is 7 Personnel & 4 units

Table 21: Critical Tasking - Low Risk Hazardous Materials



LOW RISK HAZARDOUS MATERIALS

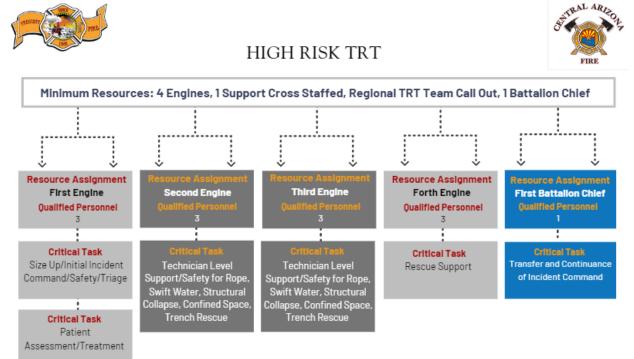




Total: ERF is 3 Personnel & 1 units

Technical Rescue

Table 22: Critical Tasking - High Risk Technical Rescue



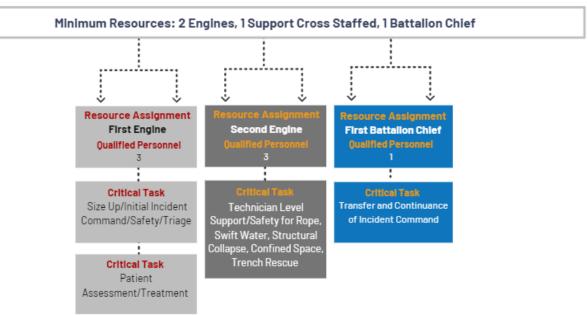
Total: ERF is 13 Personnel & 6 units

Table 23: Critical Tasking - Moderate Risk Technical Rescue





MODERATE RISK TRT



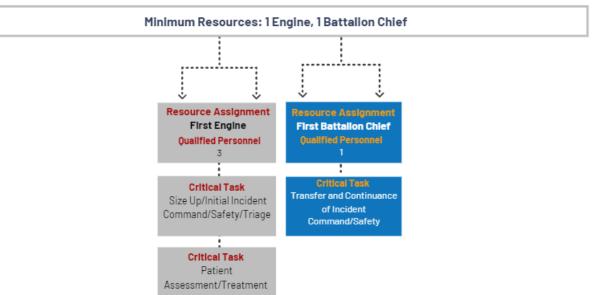
Total: ERF is 7 Personnel & 4 units

Table 24: Critical Tasking - Low Risk Technical Rescue



LOW RISK TRT





Total: ERF is 4 Personnel & 2 units

Wildland Fire Suppression

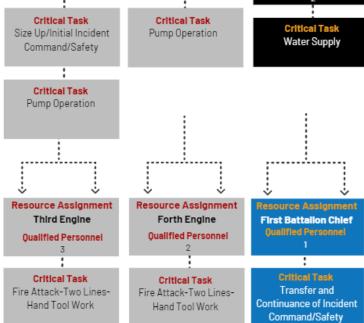
Table 25: Critical Tasking - High Risk Wildland



HIGH RISK WILDLAND FIRE SUPPRESSION



Minimum Resources: 4 Engines, 2 Brush Units Cross- Staffed, 2 Water Tenders Cross Staffed, 1 Battalion Chief ÷ **Resource Assignment Resource Assignment** 2 Cross-Staffed Second Engine First Engine **Qualified Personnel** Water Tenders Qualified Personnel 2 2 **Critical Task Critical Task Critical Task** Size Up/Initial Incident Pump Operation



Note: Cross-staffing is an important part of the operations on wildland fires due to complexity and specialized equipment needs. All four engines will cross-staff two brush units and two water tenders.

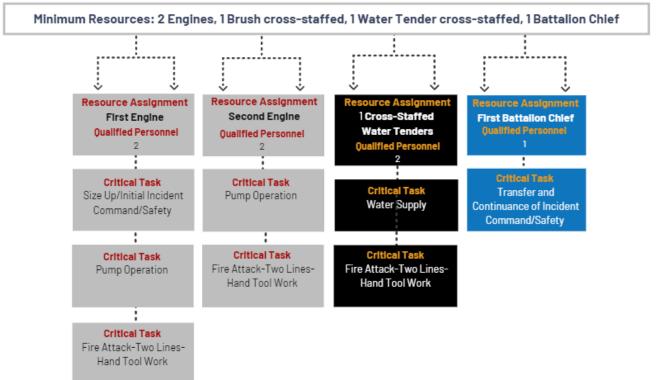
Total: ERF is 13 Personnel & 9 units

Table 26: Critical Tasking - Moderate Risk Wildland



MODERATE RISK WILDLAND FIRE SUPPRESSION





Note: Cross-staffing is an important part of the operations on wildland fires due to complexity and specialized equipment needs. The two engines will cross-staff one brush unit and one water tender.

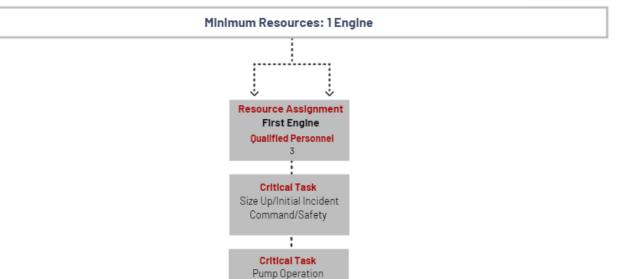
Total: ERF is 7 Personnel & 5 units

Table 27: Critical Tasking - Low Risk Wildland



LOW RISK WILDLAND FIRE SUPPRESSION





Total: ERF is 3 Personnel & 1 units

<u>Step 3</u>: Application of a three-axis risk methodology. The three-axis risk methodology is a structured approach used in risk management to analyze the severity of risks across three key dimensions or axes. A three-axis risk model is a framework that considers three dimensions of risk. These axes generally represent different aspects or perspectives of risk that need to be considered comprehensively. While specific details can vary depending on the context or industry, the three axes that PFD and CAFMA utilized were:

- 1. **Probability**: This axis assesses the probability or frequency of a risk event occurring. It involves evaluating factors that contribute to the likelihood of risk manifesting. PFD and CAFMA utilized the frequency of the eighty-two dispatch incident types to determine probability on a scale of 2-10.
- 2. **Community Consequence**: This axis evaluates the consequences or effects of the risk event if it were to occur. PFD and CAFMA measured this in terms of financial loss, life loss, and emotional/historical/social/environmental loss. This was also rated on a scale of 2-10.
- 3. **Vulnerability Impact**: This axis examines the effectiveness of existing resources or mitigation measures in place to reduce the likelihood or impact of the risk to the system. It involves evaluating the strength, reliability, and efficiency of controls relative to the identified risks. This was rated on a scale of 2-10, depending on the number of resources utilized to stabilize the risk. This is a result of the critical task analyses.

By analyzing risks through these three axes, organizations can comprehensively understand their risk landscape. This structured approach helps to stabilize an incident, allocate resources effectively, and enhance overall risk management practices. To follow are the risk matrixes developed by PFD and CAFMA across the six risk classifications of aircraft rescue and firefighting, emergency medical services,fire suppression, hazardous materials, technical rescue, and wildland fire suppression.

Table 28: PFD/CAFMA Risk Matrix – ARFF

PROBABILITY
2=Quarterly/Yearly (0-4 events per year)
4=Monthly (5-12 events per year)
6=Weekly (13-52 events per year)
8=Daily (53-365 events per year)
10=>Daily (366 or more events per year)
COMMUNITY CONSEQUENCE
2=No financial loss.
No life loss.
No emotional/historical/social/environmental loss.
4=Minor financial loss.
Potential loss of single life.
Low impact to emotional/historical/social/environmental loss
6=Moderate financial loss.
Loss of a single life; low potential for multiple life loss.
Moderate impact on emotional/historical/social/environmental loss
8=Significant/substantial financial loss.
Moderate potential for multiple life loss.
Significant/substantial impact to emotional/historical/social/environmental loss
10=Extraordinary financial loss.
High potential for multiple life loss.
Extraordinary impact toemotional/historical/social/environmental loss.
VULNERABILITY IMPACT
2= Critical tasks requiring one personnel (one ARFF truck)
4= Critical tasks requiring two to four personnel (one engine, one ARFF truck)
6= Critical tasks requiring five to ten personnel (two engines, one ambo, one ARFF, one battalion chief)
8= Critical tasks requiring 11-18 personnel (four engines, two ambo, one ARFF, one battalion chief)
10= Critical tasks requiring 19 or more personnel

Table 29: PFD/CAFMA Risk Matrix – EMS

PROBABILITY
2=Quarterly/Yearly (0-4 events per year)
4=Monthly (2-12 events per year)
6=Weekly (13-52 events per year)
8=Daily (53-365 events per year)
10=>Daily (366 or more events per year)
COMMUNITY CONSEQUENCE
2=No financial loss.
No life loss.
No emotional/historical/social/environmental loss.
4=Minor financial loss.
Potential loss of single life.
Low impact to emotional/historical/social/environmental loss
6=Moderate financial loss.
Loss of a single life; low potential for multiple life loss.
Moderate impact on emotional/historical/social/environmental loss
8=Significant/substantial financial loss.
Moderate potential for multiple life loss.
Significant/substantial impact to emotional/historical/social/environmental loss
10=Extraordinary financial loss.
High potential for multiple life loss.
Extraordinary impact toemotional/historical/social/environmental loss.
VULNERABILITY IMPACT
2=Critical tasks requiring three or fewer personnel (one engine or ambo)
4= Critical tasks requiring four to fivepersonnel (one engine, one ambo)
6= Critical tasks requiring 6 to 11 personnel (two engines, two ambos, one battalion chief)
8= Critical tasks requiring 12-15 personnel (three engines, two ambos, one battalion chief)
10= Critical tasks requiring 16 or more personnel

Table 30: PFD/CAFMA Risk Matrix - Fire Suppression

PROBABILITY
2=Quarterly/Yearly (0-4 events per year)
4=Monthly (5-12 events per year)
6=Weekly (13-52 events per year)
8=Daily (53-365 events per year)
10=>Daily (366 or more events per year)
COMMUNITY CONSEQUENCE
2=No financial loss.
No life loss.
No emotional/historical/social/environmental loss.
4=Minor financial loss.
Potential loss of single life.
Low impact to emotional/historical/social/environmental loss
6=Moderate financial loss.
Loss of a single life; low potential for multiple life loss.
Moderate impact on emotional/historical/social/environmental loss
8=Significant/substantial financial loss.
Moderate potential for multiple life loss.
Significant/substantial impact to emotional/historical/social/environmental loss
10=Extraordinary financial loss.
High potential for multiple life loss.
Extraordinary impact to emotional/historical/social/environmental loss.
VULNERABILITY IMPACT
2=Critical tasks requiring four or fewer personnel (one engine/ladder, one battalion
chief)
4= Critical tasks requiring 5 to 15 (four engines/ladders, one battalion chief)
6= Critical tasks requiring 16 to 24 (six engines/ladders, one battalion chief)
8= Critical tasks requiring 25 to 43 (six engines/two ladders, two battalion chiefs, one
safety)
10= Critical tasks requiring 44 or more personnel

Table 31: PFD/CAFMA Risk Matrix - Hazardous Materials

PROBABILITY
2= (0-12 events per year)
4= (13-60 events per year)
6= (61-200 events per year)
8= (200-365 events per year)
10= (365 or more events per year)
Note: Due to unrealistic effective response force numbers being generated, the
methodology for probability was adjusted by the accreditation compliance team to
prevent this portion of the 3-axis model from driving the risk score too high and
putting event types into unrealistic risk levels.
COMMUNITY CONSEQUENCE
2=No financial loss.
No life loss.
No emotional/historical/social/environmental loss.
4=Minor financial loss.
Potential loss of single life.
Low impact to emotional/historical/social/environmental loss
6=Moderate financial loss.
Loss of a single life; low potential for multiple life loss.
Moderate impact on emotional/historical/social/environmental loss
8=Significant/substantial financial loss.
Moderate potential for multiple life loss.
Significant/substantial impact to emotional/historical/social/environmental loss
10=Extraordinary financial loss. High potential for multiple life loss.
Extraordinary impact toemotional/historical/social/environmental loss.
VULNERABILITY IMPACT
2=Critical tasks requiring three or fewer personnel (one engine)
4= Critical tasks requiring four to six personnel (one engine, one ambo, one battalion
chief)
6= Critical tasks requiring six to nine personnel (two engines, one ambo, one
battalion chief)
8= Critical tasks requiring 10-16 personnel (two engines, two ambo, HazMat Team,
one battalion chief)
10= Critical tasks requiring 17 or more personnel

Table 32: PFD/CAFMA Risk Matrix - Technical Rescue

PROBABILITY
2=Quarterly/Yearly (0-4 events per year)
4=Monthly (5-12 events per year)
6=Weekly (13-52 events per year)
8=Daily (53-365 events per year)
10=>Daily (366 or more events per year)
COMMUNITY CONSEQUENCE
2=No financial loss.
No life loss.
No emotional/historical/social/environmental loss.
4=Minor financial loss.
Potential loss of single life.
Low impact to emotional/historical/social/environmental loss
6=Moderate financial loss.
Loss of a single life; low potential for multiple life loss.
Moderate impact on emotional/historical/social/environmental loss
8=Significant/substantial financial loss.
Moderate potential for multiple life loss.
Significant/substantial impact to emotional/historical/social/environmental loss
10=Extraordinary financial loss.
High potential for multiple life loss.
Extraordinary impact toemotional/historical/social/environmental loss.
VULNERABILITY IMPACT
2=Critical tasks requiring three or fewer personnel (one engine)
4= Critical tasks requiring four to six personnel (one engine, one ambo, one battalion
chief)
6= Critical tasks requiring six to nine personnel (two engines, one ambo, one
battalion chief)
8= Critical tasks requiring 10-16 personnel (two engines, two ambo, TRT Team, one
battalion chief)
10= Critical tasks requiring 17 or more personnel

Table 33: PFD/CAFMA Risk Matrix - Wildland

2=Quarterly/Yearly (0-4 events per year) 4=Monthly (5-12 events per year) 6=Weekly (13-52 events per year)
6=Weekly (13-52 events per year)
8=Daily (53-365 events per year)
10=>Daily (366 or more events per year)
COMMUNITY CONSEQUENCE
2=No financial loss.
No life loss.
No emotional/historical/social/environmental loss.
4=Minor financial loss.
Potential loss of single life.
Low impact to emotional/historical/social/environmental loss
6=Moderate financial loss.
Loss of a single life; low potential for multiple life loss.
Moderate impact on emotional/historical/social/environmental loss
8=Significant/substantial financial loss.
Moderate potential for multiple life loss.
Significant/substantial impact to emotional/historical/social/environmental loss
10=Extraordinary financial loss.
High potential for multiple life loss.
Extraordinary impact toemotional/historical/social/environmental loss.
VULNERABILITY IMPACT
2=Critical tasks requiring one to three personnel (one engine or Type VI)
4= Critical tasks requiring four to seven personnel (two engines, one battalion chief)
6= Critical tasks requiring 8 to 15 personnel (four engines, one ambo, one battalion chief)
8= Critical tasks requiring 16-29 personnel (eight engines, twoambos, one battalion chief)
10= Critical tasks requiring 30 or more personnel

Risk Assessment

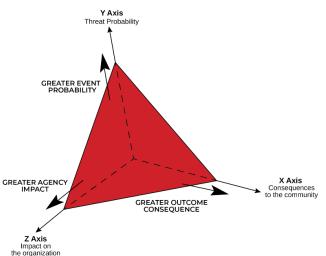
Step 4: Risk assessment of the eighty-two (82) dispatch incident types were grouped into six risk classifications. Utilizing the three-axis risk methodology, PFD and CAFMA categorized risks as low,

127

moderate, high, and maximum. The probability axis value was derived from computer-aided dispatch (CAD) data. The community consequence axis value was derived by a committee evaluating each incident type, and the vulnerability impact value was derived from the process of critical tasking.

Three-Axis Risk Model

The three axes were given a numerical value based on the risk matrixes identified above for each risk



classification. The following illustration shows a portion of the X, Y, and Z values derived from the risk matrixes utilized by PFD and CAFMA.

ispatch Incident Type	Risk	Probability	Consequence	Impact	Score	Risk Category
AIR3	ARFF	4	8	6	44.18	High
AIR2	ARFF	6	4	4	26.54	Moderate
ABDPAIN3	EMS	8	4	2	25.92	Moderate
962A	EMS	2	6	6	28.14	Moderate
963	EMS	2	8	6	36.76	High
963A	EMS	2	8	6	36.76	High
962XA	EMS	2	6	6	28.14	Moderate
962X	EMS	8	6	6	54.33	High
962	EMS	10	4	4	41.56	High
ALLERGY3	EMS	8	4	2	25.92	Moderate
ANIMAL3	EMS	4	4	2	13.85	Low

Table 34: Probability, Consequence, and Impact Values Examples

Once the values for the three axes were identified, PFD and CAFMA utilized a risk calculator that generated a value based on Heron's formula. Heron's Formula evaluates the tetrahedron surface area of the three axes, ultimately calculating the fourth point of the tetrahedron, which determines the risk categorization.

risk =
$$\sqrt{\frac{(\text{probability*consequence})^2 + (\text{consequence*impact})^2 + (\text{impact*probability})^2}{2}}$$

Heron's Formula

RISK	
Probability of occurrence	4
Consequence to community	8
Impact on Fire Department	6
SCORE	44.18144

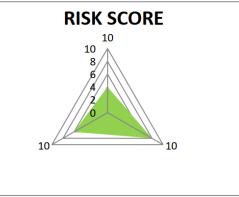


Figure 27: Risk Score Calculator Example Utilizing Heron's Formula

A risk score was then calculated on the 82 dispatch incident types grouped into six risk classes. Below is an example of how the risk scores were calculated after entering the probability value, consequence value, and impact value into the risk score calculator utilizing Heron's formula.

Dispatch Incident Type	Risk	Probability	Consequence	Impact	Score	Risk Category
AIR3	ARFF	4	8	6	44.18	High
AIR2	ARFF	6	4	4	26.54	Moderate
ABDPAIN3	EMS	8	4	2	25.92	Moderate
962A	EMS	2	6	6	28.14	Moderate
963	EMS	2	8	6	36.76	High
963A	EMS	2	8	6	36.76	High
962XA	EMS	2	6	6	28.14	Moderate
962X	EMS	8	6	6	54.33	High
962	EMS	10	4	4	41.56	High
ALLERGY3	EMS	8	4	2	25.92	Moderate
ANIMAL3	EMS	4	4	2	13.85	Low

Table 35: Risk Score Calculation Example

PFD and CAFMA determined how to rank the risk score as low, moderate, high, and maximum risk level by identifying trends in the numerical data that showed which incident types were low risk, moderate risk, high risk, and maximum risk. Below is the scoring criteria developed.

Table 36: Risk Assessment Scoring Criteria

8	
Score	Risk Category
0-15	Low
16-30	Moderate
31-60	High
61 and above	Maximum

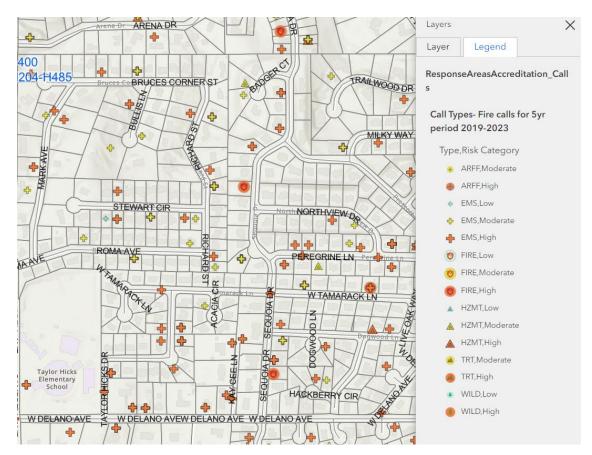
Dispatch Incident Type	Risk	Probability	Consequence	Impact	Score	Risk Category
AIR3 <5 Souls on Board	ARFF	4	8	6	44.18	High
AIR2	ARFF	6	4	4	26.54	Moderate
ABDPAIN3	EMS	8	4	2	25.92	Moderate
962A	EMS	2	6	6	28.14	Moderate
963	EMS	2	8	6	36.76	High
963A	EMS	2	8	6	36.76	High
962XA	EMS	2	6	6	28.14	Moderate
962X	EMS	8	6	6	54.33	High
962	EMS	10	4	4	41.56	High
ALLERGY3	EMS	8	4	2	25.92	Moderate
ANIMAL3	EMS	4	4	2	13.85	Low

Table 37: Risk Category Identification Example

PFD and CAFMA's methodology was utilized for the82 dispatch incident types and placed in the risk categories of low, moderate, high, or maximum based on the risk assessment scoring criteria.

This data was then integrated into an interactive web-based application through PFD and CAFMA's information technology (IT) departments. This application has multiple layers and interfaces that support decision-making regarding risk. Five years of data is geolocated by risk class. In addition, it can run live based on current CAD data that has been processed through the identified outlier policy.

Map 25: Detail of Interactive Web-Based Application (Example)



Fire Suppression Services

Fire protection is a function of local governments that PFD and CAFMA exist under. Fire-related risks within the response area include structure fires and other types of fire. PFD and CAFMA examined the history of fire-related incidents and evaluated the probability of an incident occurring and the risks presented to the public. The number of personnel and apparatus assigned to a given incident should be dictated by the potential risk/consequence to the public



and the expected tasks needed to effectively bring the incident under control. PFD and CAFMA apparatus response plans will be updated in the latter part of 2024 to "right size" response to structure fires systemwide. This will take place during this specific time frame as the agencies have moved to a new computeraided dispatch platform called *ProQA*. This project will incorporate response plans determined from the process of creating this risk analysis. Utilizing dispatch incident types, fire incidents were grouped into 19 categories. Incident data was collected using CAD information from the past five years.

The following table illustrates the 19 incident types related to fire. Utilizing the methodology described above, PFD and CAFMA categorized each type of fire into a risk level. The risk level is directly related to the risk that the public and firefighters have during incidents of this type. By identifying the risks and utilizing the risk methodology defined, the agencies have determined the effective response force (number of personnel and appropriate equipment) to deploy to these incident types to begin the initial stabilization of the emergency.

Incident Type	Probability	Consequence	Impact	Score	Risk Category
Chimney Fire	2	4	4	13.85	Low
Tree Fire	4	2	2	8.48	Low
BBQ Fire	2	2	2	4.89	Low
Hot Spot in Wall	2	2	4	8.48	Low
Pole Fire	2	2	2	4.89	Low
Dumpster Fire	6	4	2	19.79	Moderate
Shed Fire	4	4	4	19.59	Moderate
Vehicle Fire	8	4	2	25.92	Moderate
Oven Fire	6	4	2	19.79	Moderate
Vehicle Fire with Exposures	6	6	4	34.98	High
Structure Fire	8	8	4	55.42	High
Unknown Fire	6	6	4	34.98	High
Structure Fire Possible	8	6	4	44.18	High
Tree Fire with Exposures	2	8	6	36.76	High
Dumpster Fire with Exposures	2	8	6	36.76	High
BBQ Fire with Exposures	2	8	6	36.76	High

Table 38: Risk Assessment - Fire Suppression

Incident Type	Probability	Consequence	Impact	Score	Risk Category
Shed Fire with Exposures	2	8	6	19.79	High
Stove Fire	4	8	4	33.94	High
Explosions	4	8	4	33.94	High
Commercial Structure Fire	2	10	10	73.48	*Maximum

*Commercial structure fire was identified during the critical tasking as a new risk category. This will be programmed into computer-aided dispatch (CAD) as part of ProQA software implementation and this study. The probability, consequence, and impact scores for this category were estimated by the committee for study purposes.

Emergency Medical Services

PFD and CAFMA provide advanced life support (ALS) emergency medical services. Recognizing that approximately 65% of all incidents are related to emergency medical services, all response personnel maintain either a Paramedic certification or an Emergency Medical Technician certification. Every response apparatus is staffed with at least one Paramedic. In addition, CAFMA has the certificate of necessity in their jurisdiction and staff two advanced life support rescues. Arizona uses



a certificate of necessity system to regulate ground ambulance service in the state to ensure that adequate emergency medical services exist. The region has two private ambulance providers, Lifeline Ambulance (AMR) and Priority Ambulance that provide advanced life support and basic life support ambulances.

Regional hospitals include Yavapai Regional Medical Center, which has a west campus in the City of Prescott and an east campus in the Town of Prescott Valley. Each campus also has medical helicopters, with a minimum staffing of one nurse, one paramedic, and a pilot. Their call signs are Native 4 at the Prescott campus and Native 14 at the Prescott Valley campus.

PFD and CAFMA utilize an emergency medical dispatching (EMD) system called *ProQA* that allows the dispatchers to obtain information to categorize calls for service according to the level of severity. It is designed to efficiently gather information and dispatch the appropriate resources to an incident. During the onboarding of this product, PFD and CAFMA invested a significant amount of time and resources to align the level of severity of an incident to the effective response force necessary to begin to stabilize the incident.

The following table illustrates the 42 incident types related to emergency medical services. Utilizing the methodology described above, PFD and CAFMA categorized each type of emergency medical incident into a risk level. The risk level is directly related to the risk that the public and firefighters have during incidents of this type. By identifying the risks and utilizing the risk methodology defined, the agencies have determined the effective response force (number of personnel and appropriate equipment) to deploy to these incident types to begin the initial stabilization of the emergency.

Table 39: Risk Assessment - EMS

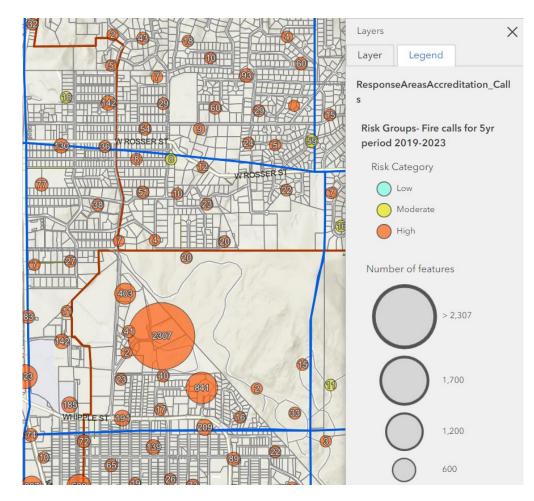
Incident Type	Probability	Consequence	Impact	Score	Risk Category
Eye Problem 3	2	2	4	8.48	Low
Psychiatric 3	4	2	4	13.85	Low
666D Suicide Delayed	2	4	2	8.48	Low
Animal Bite 3	4	4	4	19.59	Moderate
Abdominal Pain 3	8	2	4	25.92	Moderate
962A Accident Agency Vehicle Involved	2	6	6	28.14	Moderate
Back Pain 3	6	2	4	19.79	Moderate
Choking 3	6	4	4	26.53	Moderate
Diabetic 3	8	2	4	25.92	Moderate
Fall 3	10	2	2	20.19	Moderate
Headache 3	6	2	4	19.79	Moderate
Heat Emergency 3	6	2	4	19.79	Moderate
Pregnancy 3	6	4	4	26.53	Moderate
Traffic Incident 3	6	4	4	26.53	Moderate
Allergic Reaction 3	8	2	4	25.92	Moderate
Assault 3	6	4	4	26.53	Moderate
Breathing Problem 3*	10	4	4	41.56	Moderate
Chest Pain 3*	10	4	4	41.56	Moderate
Seizure 3*	10	4	4	41.56	Moderate
Heart Problems 3*	10	4	4	41.56	Moderate
Hemorrhage 3*	10	4	4	41.56	Moderate
Sickness 3	10	2	2	20.19	Moderate
Stroke 3	10	4	4	41.56	Moderate
Unconscious 3	10	4	4	41.56	Moderate
Unknown Medical 3	10	4	2	41.56	Moderate
962 Vehicle Accident	10	4	4	41.56	Moderate
Burns 3	2	8	6	28.14	**Modified High
Electrocution 3	2	8	6	28.14	**Modified High
Drowning 3*	2	8	6	28.14	**Modified High
Overdose 3	8	4	4	33.94	**Modified High
666A Suicide Attempt	8	4	4	33.94	**Modified High
Trauma 3	8	4	4	33.94	**Modified High
Cardiac Arrest 3	8	6	4	44.18	**Modified High
Stabbing/Gunshot Wound 3	4	8	4	33.94	**Modified High
666J Suicide Just Occurred 3	6	6	4	34.98	**Modified High
962XA Level 2 Vehicle Accident Agency Involved	2	8	6	36.76	High
963 Vehicle Accident with Fatality	2	8	6	36.76	High
963A Vehicle Accident with Fatality Agency Involved	2	8	6	36.76	High
962X Level 2 Vehicle Accident	8	6	6	54.33	High
First Alarm Medical	2	10	10	73.48	Maximum
Mass Casualty Incident	2	10	10	73.48	***Maximum

*Due to unrealistic effective response force numbers being generated, the methodology for probability was adjusted by the accreditation compliance team to prevent this portion of the three-axis model from driving the risk score too high and putting event types into unrealistic risk levels. In addition, one incident type, drowning, was determined by the same peer team to be of highrisk even though the calculation put it at moderate. The methodology behind this was to add a battalion chief to these types of incidents for additional support if needed.

**Drowning 3, Overdose 3, Suicide Attempt, Trauma 3, Cardiac Arrest 3, Stabbing/Gunshot 3, and Suicide Just Occurred 3 incidents were identified during the critical tasking as a new risk category which was named modified high. This will be programmed into computer-aided dispatch (CAD) as part of ProQA software implementation and this study. The probability, consequence, and impact scores for this category were estimated by the committee for study purposes.

***Mass casualty incidents were identified during the critical tasking as a new risk category, which was named maximum. This will be programmed into computer-aided dispatch (CAD) as part of ProQA software implementation and this study. The probability, consequence, and impact scores for this category were estimated by the committee for study purposes.

Furthermore, the following illustration shows another example of a web-based application designed by the PFD and CAFMA information technology (IT) departments. In this case, it shows a large circle of incidents in the center with 2,307 total. Zooming in on the example would show these are predominately emergency medical calls for service. In this instance, there are three care homes in that location.



Map 26: Detail of Call Volume Heat Circles (Example)

Technical Rescue Services

There is a tremendously wide range of technical rescue incidents that could reasonably be expected to occur within the PFD and CAFMA response area. The region is well known for its diverse recreational opportunities, including nationally recognized mountain biking, climbing, hiking, and water activities. The agencies have a joint technical rescue team of members trained to the technician level as standardized in NFPA 1670: *Standard on Operations and Training for Technical Search and Rescue Incidents.* PFD and



CAFMA are staffed and equipped to provide an initial response to assess and stabilize the incidents that are most likely to occur. There are two dedicated technical rescue stations that always maintain a minimum staffing level of at least one technical rescue technician. Incidents that could be expected to exceed the capability of one crew or necessitate additional technician-level expertise are upgraded as needed by the incident commander.

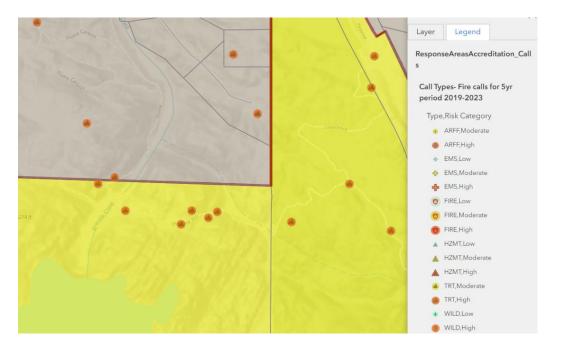
The following table illustrates the seven incident types related to technical rescue. Utilizing the methodology described above, PFD and CAFMA categorized each type of technical rescue into a risk level. The risk level is directly related to the risk that the public and firefighters have during incidents of this type. By identifying the risks and utilizing the risk methodology defined, the agencies



have determined the effective response force (number of personnel and appropriate equipment) to deploy to these incident types to begin the initial stabilization of the emergency.

Map 27: Risk Assessment - Technical Rescue

Incident Type	Probability	Consequence	Impact	Score	Risk Category
Structure Collapse	2	6	6	28.14	Moderate
Confined Space	2	6	6	28.14	Moderate
Still Water (Lake/Pond)	2	6	6	28.14	Moderate
Trench	2	4	6	19.79	Moderate
Low Angle	6	2	6	28.14	Moderate
High Angle (Mountain/Climb)	2	6	8	36.76	High
Swift Water	2	8	8	48	High



Map 28: Detail of High-RiskTechnical Rescue Calls, North of Watson Lake (Example)

Hazardous Materials Services

The release of hazardous materials can occur throughout the community, either during transport or while in production, use, packaging, or storage in a fixed facility. These locations can create a dangerous environment for the community and first responders during a spill or fire. Special equipment such as protective clothing and sensors, along with specialized training, is necessary to successfully mitigate a hazardous materials incident. Transportation methods identified in the region include over-the-road and small-diameter pipelines (LP gas). Within the region, there are no marine, air, or rail transportation corridors for significant shipment of hazardous materials. No facilities have been identified in the service area with enough hazardous materials required to file a Tier II report. Tier II Chemical Reporting is an annual requirement for facilities to report hazardous chemicals and extremely hazardous substances (EHS).

Some retail outlets, notably "big box" stores and wholesale outlets carry quantities of hazardous materials packaged for consumer purchase. Safety Data Sheets (SDS) and related information are available on-site; some companies also list SDS information on the company's website.



The agencies have a joint hazardous materials team of members trained to the technician level. Team members are hazardous materials technicians who have completed a 260-hour course through the Arizona State Fire Marshal's Office. To maintain certification, team members must attend continuing education

training sessions throughout the year and attend at least two major drills. Team members are trained to handle any type of hazardous materials spill and are also trained to identify, safely isolate, and stabilize unknown substances anywhere in Yavapai County. The team has also trained for weapons of mass destruction (WMD) events and is prepared to deal with other emergencies, such as a pandemic response.

PFD and CAFMA are staffed and equipped to provide an initial response to assess and stabilize the incidents that are most likely to occur. Two dedicated hazardous materials stationsalways maintain a minimum staffing level of at least one hazardous material technician. Incidents that could be expected to exceed the capability of one crew or necessitate additional technician-level expertise are upgraded as needed by the incident commander.

The following table illustrates the four incident types related to hazardous materials. Utilizing the methodology described above, PFD and CAFMA categorized each type of hazardousmaterials incident into a risk level. The risk level is directly related to the risk that the public and firefighters have during incidents of this type. By identifying the risks and utilizing the risk methodology defined, the agencies have determined the effective response force (number of personnel and appropriate equipment) to deploy to these incident types to begin the initial stabilization of the emergency.

Table 40: Risk Assessment - Hazardous Materials

Incident Type	Probability	Consequence	Impact	Score	Risk Category
CO Alarm	2	4	2	8.45	Low
Level 1 HazMat	6	2	2	12.32	Low
Level 2 HazMat	4	6	4	26.53	Moderate
Level 3 HazMat	2	10	8	59.39	High

Aircraft Rescue Firefighting

Prescott Regional Airport (PRC), or Earnest A. Love Field, is northeast of the intersection of Route 89 and Route 89A. The only commercial carrier with regular service is United, with two daily flights, one each to and from Los Angeles and Denver. Fixed base operation services, including refueling of DoD and military aircraft, are available. The airport is also critical to regional wildfire response as the home to the Prescott Airtanker Base, Helitack Base, and mobilization point for area hotshot crews. The flight path for the airfield



typically calls for aircraft to fly over a portion of the response area; therefore, PFD and CAFMA should develop special hazard response plans for off-field accidents. Additionally, the airport supports Embry Riddle Aeronautical University, which has a flight training school, making it one of the busiest airports in the State of Arizona.

Fire station 73 covers Prescott Regional Airport. It is on the airport property and houses Foam 73, Engine 73, and Brush 73. The firefighters at this station are all ARFF qualified through the Federal Aviation Administration (FAA) and meet stringent annual requirements by the administration.

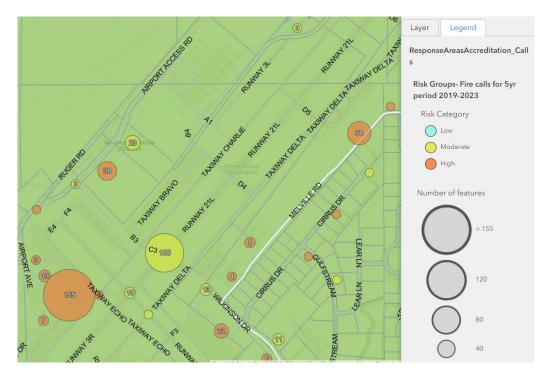
The following table illustrates the three incident types related to aircraft rescue firefighting. Utilizing the methodology described above, PFD and CAFMA categorized each type of aircraft incident into a risk level. During this portion of the risk analysis, the Alert 3 dispatch incident type was broken into two critical tasking levels: one for small aircraft (less than four souls on board) and one for large aircraft (greater than five souls on board). The risk level is directly related to the risk that the public and firefighters have during incidents of this type. By identifying the risks and utilizing the risk methodology defined, the agencies have determined the effective response force (number of personnel and appropriate equipment) to deploy to these incident types to begin the initial stabilization of the emergency.

Table 41: Risk Assessment – ARFF

Dispatch Incident Type	Probability	Consequence	Impact	Score	Risk Category
Alert 1 Standby	6	2	2	12.32	*Low
Alert 2 In Air Emergency	6	4	4	26.54	Moderate
Alert 3 Aircraft Down <4 Souls	4	8	6	44.18	High
Alert 3 Aircraft Down >5 Souls	2	10	10	73.48	*Maximum

*Alert 1 Standby and Alert 3 Aircraft down with greater than five souls on board were identified during the critical tasking as new risk categories. These will be programmed into computer-aided dispatch (CAD) as part of the *ProQA* software implementation and this study. The probability, consequences, and impact scores for these two categories were estimated by the committee for study purposes.

Map 29: Detail of Airport Incidents Heat Circles (Example)



Wildland Fire Suppression

A wildfire is defined as "...an uncontrolled fire spreading through wildland vegetative fuels, urban interface areas, or both, where fuels may include structures." Wildfires are classified as natural hazards, mostly started by lightning, but as many as 80 percent within two miles of a community are caused by human factors. The proximity of development near wildland areas, along with

landscaping with indigenous plants such as Pinyon-Juniper and Ponderosa pine trees, creates a wildland-urban interface that significantly increases the risk of wildfires, as shown here. Also, the secondary effects of smoke and ash can pose significant threats to air quality and human respiratory health.

An urban interface is an area where urban development meets other land uses. Usually, the



term refers to the wildland-urban interface where urban development meets nature. The entire area surrounding the central, developed regional response core is in the wildland-urban interface. Generally, vulnerability—the potential impact—is greatest in the areas with the highest number of houses per acre. However, the actual risk of wildfire—the possibility of risk or harm—is the greatest along major highways and upslope regions in the southwest part of the city and surrounding area.

The wildfire risk is a major threat to lives, resources, and improved properties within the response area. The indirect effects of large, intense wildfires can strip the land of vegetation, destroy forest resources and personal property, and cause the soil to be unable to sustain life for some amount of time—soil erosion, landslides, increased flooding, and harm to aquatic life and water quality is often the result.

According to the Arizona State Forestry Division, there have been at least 130 wildfires greater than 100 acres in size in Yavapai County. Significant fires that have directly affected the Prescott area, including the 2017 Goodwin Fire, include the 2017 Goodwin Fire, which started outside of the community of Pine Flats. In all, over 28,000 acres burned and forced the evacuation of over 7,500 families. The 2013 Doce Fire originated approximately eight miles northwest of Prescott, near the Granite Mountain recreation area. The fire burned 6,732 acres surrounding Prescott, and suppression costs were approximately \$1,000,000. The 2013 Yarnell Hill Fire burned the area surrounding and through the Town of Yarnell. 19 PFD firefighter deaths occurred, 8,400 acres were burned, and 134 structures were lost. It was the greatest loss of life for firefighters in a wildfire since 1933, the deadliest wildfire of any kind since 1991, and the greatest loss of firefighters in the United States since the 9/11 attacks. According to the Yavapai County HMP: "Wildfire is the premier hazard within the incorporated boundaries of the City of Prescott and the communities surrounding it. Unseasonably warm temperatures, low humidity, and red-flag conditions can turn a seemingly benign event into a career fire suppression campaign in just a few hours. Loss estimations could reach billions of dollars, and loss of life could result. Successfully coordinated mitigation efforts have been undertaken over many years, but with a roughly seven-year re-growth, it is nearly impossible to 'keep up.' Virtually all segments of the community are vulnerable. This includes million-dollar residential properties, multi-family dwellings, the historic downtown area, schools, hospitals, and vast areas of commercial development.

Without reservation, this is the greatest risk to the region, and historically has experienced many negative outcomes from this risk."

The regional capacity for wildfire mitigation is significant. All members of PFD and CAFMA must have minimal wildland firefighting training annually. All members must meet national and state training and physical fitness requirements. In addition, all members must be certified, also known as 'red carded' through the Arizona Department of Forestry and Fire Management (ADFFM). Although PFD and CAFMA's partnership is robust, the ADFFM and United States Forest Service play a significant role within the region.

The following table illustrates the three incident types related to wildland firefighting. Utilizing the methodology described above, PFD and CAFMA categorized each type of wildland incident into a risk level. The risk level is directly related to the risk that the public and firefighters have during incidents of this type. By identifying the risks and utilizing the risk methodology defined, the agencies have determined the effective response force (number of personnel and appropriate equipment) to deploy to these incident types to begin the initial stabilization of the emergency.

Table 42: Risk Assessment – Wildland

Incident Type	Probability	Consequence	Impact	Score	Risk Category
Smoke Investigation	4	4	2	13.85	Low
Level 1 Wildfire	8	4	2	25.92	Moderate
Level 2 Wildfire	6	6	4	34.98	High

H. Historical Perspective and Summary of System Performance

Distribution Factors

Distribution, according to the Commission on Fire Accreditation International (CFAI), refers to the geographic placement of initial response resources, typically measured from fixed response points like fire stations. It is quantified as the time it takes for first-due units to reach their designated areas, emphasizing the efficiency of emergency response.

Many factors can influence these travel times: distance, population density, geophysical conditions, available resources, community expectations, and financial support are some of them. Larger response areas naturally experience longer travel times at their peripheries. Conversely, densely populated regions with higher service demands tend to have stations located closer together, resulting in smaller response areas and potentially quicker travel times.

Optimally, first-due resources are strategically positioned near major roads to maximize coverage and minimize response times. Additionally, considerations must be made for natural and human-caused obstacles, such as roads and bodies of water, which can impact response efficiency.

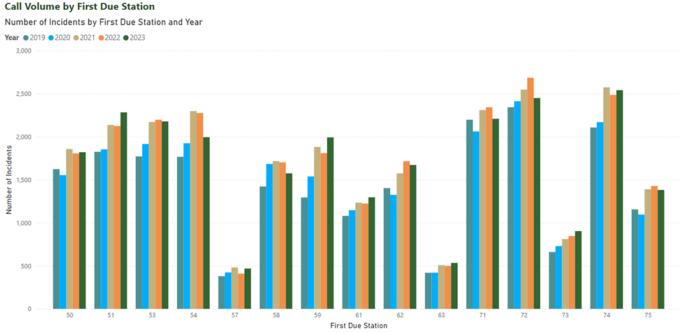
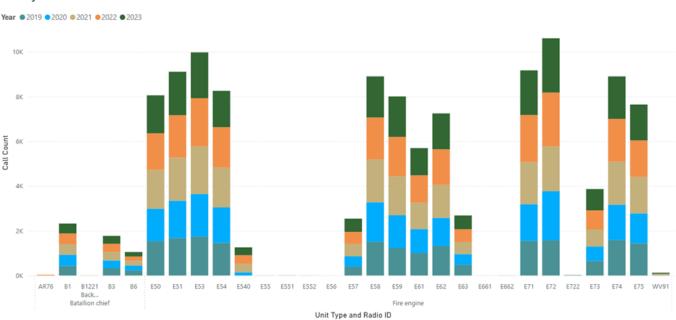
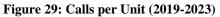


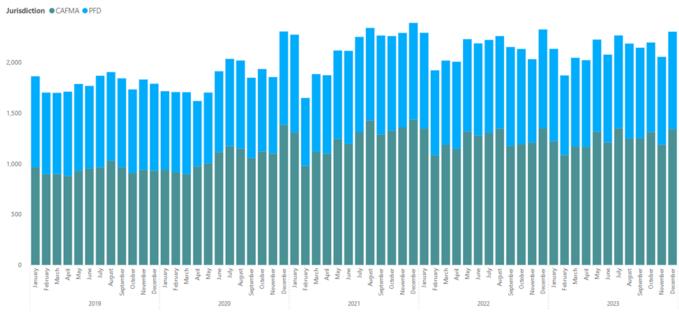
Figure 28: Call Volume by First Due Station

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Calls by Unit







Total Call Volume



Calls by Time of Day and Day of Week

Response Hour	Sunday	Monday	Tuesday	Wednesday	Thursday	Friday	Saturday	Total
0	456	378	389	381	372	395	429	2,800
1	418	323	316	327	296	352	339	2,371
2	392	296	290	330	299	294	348	2,249
3	327	292	330	285	309	288	331	2,162
4	325	304	309	288	302	306	341	2,175
5	373	370	367	378	378	350	373	2,589
6	414	489	506	527	463	516	421	3,336
7	576	706	687	725	676	685	605	4,660
8	704	946	917	893	905	924	815	6,104
9	858	1,082	1,064	1,036	1,049	962	840	6,891
10	895	1,121	1,057	1,114	1.077	1,136	1,011	7,411
11	857	1,087	1,153	1,129	1,117	1.054	967	7,364
12	865	1,047	1,067	1,093	1,066	1,075	955	7,168
13	917	1,066	1,012	1,088	1,065	1,104	975	7,227
14	837	1,073	988	1,048	1,075	1,063	876	6,960
15	841	1,006	979	1,031	1,022	1,043	917	6,839
16	922	980	978	1,015	976	1,008	918	6,797
17	942	983	964	981	1,026	1,036	934	6,866
18	852	855	824	896	995	980	954	6,356
19	808	782	830	806	841	873	897	5,837
20	749	744	714	737	741	774	805	5,264
21	600	621	585	622	624	702	682	4,436
22	496	493	496	503	571	549	596	3,704
23	385	412	408	415	430	515	523	3,088
Total	15,809	17,456	17,230	17,648	17,675	17,984	16,852	120,654

Figure 31: Call Volume by Month and Time of Day

Call Volume by Risk Category

Number of Incidents by Risk Category

● EMS ● PUBLIC ASSIST ● FIRE ● HZMT ● INFO ● WILD ● ARFF ● TRT ● TASK FORCE

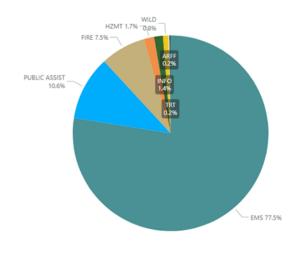
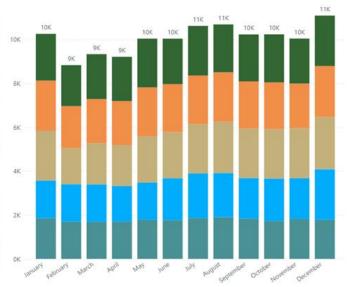


Figure 32: Call Volume by Risk Category

Calls by Month

Year • 2019 • 2020 • 2021 • 2022 • 2023



Number of Incidents by Year and Risk Category

Risk Category

ARFF

EMS

FIRE

HZMT

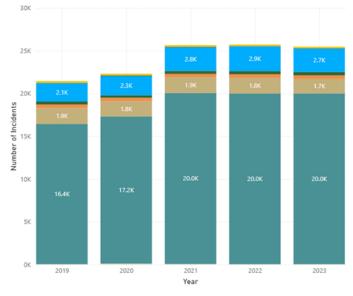
INFO

PUBLIC ASSIST

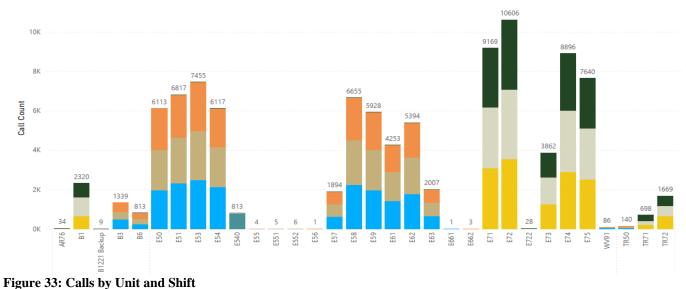
TASK FORCE

TRT

WILD



Calls by Unit and Shift



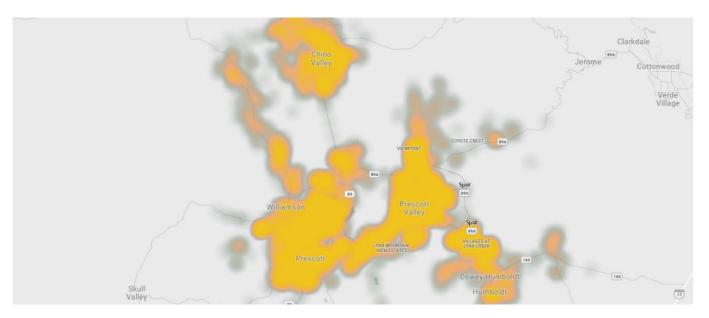
Shift ● CAFMA 40 Hour ● CAFMA A Shift ● CAFMA B Shift ● CAFMA C Shift ● CAFMA Unknown ● PFD A Shift ● PFD C Shift

Concentration Factors

Concentration pertains to grouping fire stations close to ensure sufficient resources are available for a timely Effective Response Force (ERF) deployment, essential for effectively managing incidents. While distribution focuses on the arrival time of the first-due resource, concentration deals with the time required to mobilize the remaining necessary resources to the scene.

The challenges affecting distribution also affect concentration. Rural areas typically have expansive response areas, necessitating longer travel times for resources to reach incidents. In contrast, incidents in densely populated areas can achieve ERF more swiftly due to the proximity of resources. Also, available resources, community expectations, and financial support may affect concentration factors.

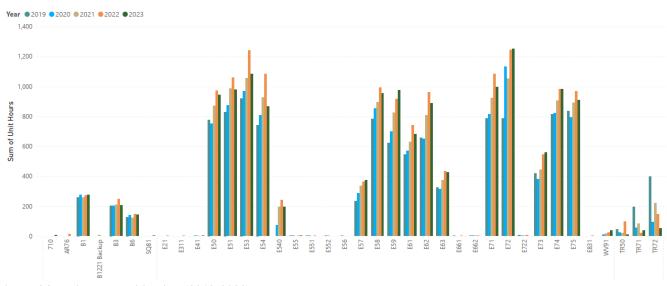
Map 30: Incidents Heat Map (2019-2023)



Reliability Factors

Assessing the reliability of PFD and CAFMA resources system wideinvolves analyzing their capacity to meet defined performance benchmarks, including response times and incident management efficiency, tailored to the unique characteristics and demands of their respective service areas.

An example of the reliability of a resource, such as a fire engine, is unit hour utilization. Unit hour utilization (UHU) is a metric that measures how well a resource is used during a shift. It is calculated by dividing how many hours the resource was on incidents, training, or unavailable for any reason by the total number of hours the resource is available. The result is a percentage that shows how much time a unit is unavailable for other assignments. For example, if a resource is committed to emergencies 10% of the time, then it is available 90% of the time for other incidents. When trying to meet a 90% response time goal, an ideal UHU would be 10%.



Unit Hour Utilization for Calls

Figure 34: Unit Hour Utilization (2019-2023)

Comparability Factors

When evaluating the time performance of the PFD and CAFMA resource system to respond to an emergency incident, an understanding of the components involved in the response is critical to understanding overall performance. As shown in the figure below, there are many different components involved. The first three components - alarm transfer time, alarm answering time, and station alerting - are controlled by the Prescott Regional Communications Center (PRCC). The next three components - turnout time, travel time, and initiate action/intervention time - are controlled by PFD and CAFMA.

Although National Fire Protection Agency Standard 1710 recommends certain time frames for these components, there are dynamics that are inherent to each community that can affect their ability to meet this standard. Influences like topography, resources, and community expectations are examples.

For every emergency PFD and CAFMA respond to, there is a sequence of steps known as a cascade of events. These steps are illustrated below.

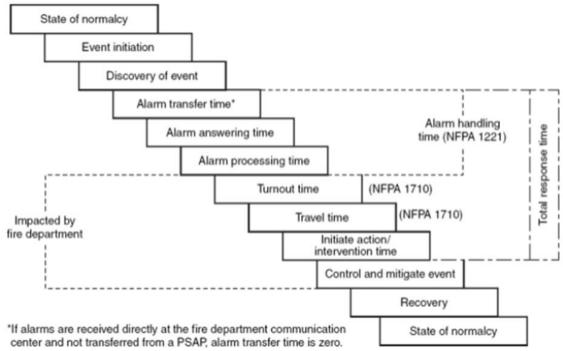


Figure 35: Cascade of Events

PFD and CAFMA report response time performance to the 90th percentile versus the traditional average response time reporting method. The agencies also employ an outlier policy to flag data that is inconsistent for review and continuous quality improvement. Data is taken straight from computer-aided dispatch (CAD). In 2025, both agencies will be under the same records management system (RMS), which will support a better data collection system. Standardizing data through an outlier policy is important to this process. It includes cleaning up nomenclature, making sure latitude and longitude are in the correct format, filtering rows in the data that are not pertinent, removal of incidents without identification numbers, and flagging known incidents with anomalies for further review and possible exclusion. It is recognized that some data outside the outlier policy's parameters are still important for decision-making. It involves applied steps with logic. The preferred 90th percentile method represents performance that occurs nine times out of 10. For example, if PFD and CAFMA have a total response time (TRT) of 8 minutes, the level of response time would occur 90% of the time at a TRT of 8 minutes or less. Ten percent of the time the TRT would exceed 8 minutes.

PFD and CAFMA use three variables to measure total response time at the 90th percentile, as shown below.

Call processing time (alarm handling) is defined as the time interval from when the alarm is acknowledged at the communication center until response information begins to be transmitted via voice or electronic means to the station(s) and/or units in the field. PFD and CAFMA receive dispatch services from the Prescott Regional Communications Center (PRCC).

Turnout time is defined as the time interval that begins when the station(s) and/or units in the field notification process commences by either an audible alarm or visual annunciation, or both – and ends at the initiation of travel. (Wheels turning.)

Travel time is defined as the time interval that begins when a unit(s) is in route to the emergency incident and ends when the unit(s) arrives at the scene. (Wheels stopped.)

Total response time makes up all three of these measurable variables.



The following tables show PFD and CAFMA's performance across all six risk classes and categorized risk levels. This is to document the standards for consistent service level provision in all emergency service programs provided. Given the levels of community risk identified, the system's primary areas of responsibility, community demographics, and socio-economic factors, these service level objectives serve to identify, document, and establish standards for the agencies to provide consistent emergency service levels in all service program areas through response coverage strategies. The Commission on Fire Accreditation International defines a benchmark as a quality performance standard or target from which something can be judged. Recognizing that it would be counterintuitive to have separate benchmark statements, PFD and CAFMA utilize the same benchmarks.

Dataset Qualification

The following policy outlines the methodology used by PFD and CAFMA to analyze data and make decisions related to performance management. Data validation and outlier detection are critical components of effective data management. This policy outlines the procedures for ensuring the accuracy, consistency, and reliability of data collected and maintained by the agencies. Using a consistent approach to data analysis is key to ensuring the credibility of organizational performance reporting. In addition, this policy provides an important foundation for continuous improvement and accreditation purposes. The scope applies to preparing and reporting external reports and internal ad-hoc studies.

Definitions

Call Processing: The time interval from the receipt of the 911 call or notification at the Prescott Regional Communications Center (PRCC) until the beginning of the transmittal of response information to PFD and CAFMA.

Turnout Time: The time interval that begins when the PFD/CAFMA notification process begins by an audible alarm, visual annunciation, or both, and the beginning point of travel time.

Travel Time: The time interval that begins when the first unit either records a responding status on the mobile computer terminal (MCT) or announces that they are responding, and the unit arrives on the scene.

Total Response Time: The time interval from receipt of the 911 call or notification at the Prescott Regional Communications Center (PRCC) to when the first PFD/CAFMA unit arrives on the scene. Total response time comprises the sum of call processing, turnout, and travel times.

Arrival of the Effective Response Force (ERF): The time of arrival of sufficient personnel and units to accomplish critical tasking is based on the PFD/CAFMA Community Risk Assessment/Standards of Cover (CRA/SOC).

Benchmark Objective: A standard from which something can be judged. It refers to future performance goals. Industry best practices help define benchmark performance the department can strive to meet.

Baseline Performance: The historical response performance by PFD/CAFMA over a specific period.

Incident Count: The total number of incidents/responses before any quality controls on the data.

Outlier Policy

Times that are outside the norm indicate some special circumstance, coding problem, equipment failure, or other error may have existed, which can skew the data. Outliers can distort the "true picture" and lead to incorrect or misleading conclusions. Since the intent of the process is to measure PFD and CAFMA's normal ability to respond to emergencies, data that is outside the lower- and upper-time limits listed below are removed.

Table 43: Outlier Limits

		Exclude		Flag for Review				
	Lower	Limit	Upper Limit	Lower Limit	Upper Limit			
Segment	EMS All Others		All Calls					
Call Processing	Less tha	an 0:01	Greater than 10:00	Less than 00:30	Greater than 5:00			
Turnout	Less than 0:01			Less than 00:30	Greater than 3:00			
Travel	Less tha	an 0:01	Greater than 30:00	Less than 00:30	Greater than 25:00			
Total Response	Less tha	an 0:31	Greater than 35:00	Less than 00:30	Greater than 30:00			

Detection Methods and Disposition

- A monthly report will be generated with data points that fall outside the range of calls indicated above as "Flagged for Review." or that meet exclusion criteria and will be reviewed by the designated member of each agency's leadership and analysis staff.
- Patterns identified will be documented and reviewed by each agency's command staff quarterly.
- Data points meeting the exclusion criteria will not be used to calculate the Standards of Cover.
- Data points that can be corrected to represent the actual value can be updated for inclusion. The rationale for their inclusion in the data set shall be documented in these cases.

Standards of Cover-Specific Criteria

The Standards of Cover is a document that forms the foundation for response planning efforts. It is presented to and adopted by elected officials and included in strategic planning efforts. This document is subject to specific criteria and requires the documentation of policies to meet the requirements of the accrediting body and to produce consistency in data calculations.

These criteria are:

- Only incidents within the jurisdiction or contracted areas of Prescott Fire or CAFMA are considered.
- Incidents are assigned to specific risk classes and categories based on their CAD call type, as documents herein.
- Incidents that include the staging of a unit shall be excluded since staging elongates the total response time.
- These calls primarily imply emergent responses only, except for hazardousmaterials and certain fire response segments, such as water tenders.
- Any risk category and class with less than 10 data points in each time period shall not be reported.
- Data sets containing between 10 and 400 data points are considered valid but are considered statistically less reliable for long-term strategic resource decisions.

Benchmark Performance Objectives and Baseline Performance Tables

Benchmark Statements

It is important to note that if another apparatus is a closer unit based on automatic vehicle location technology, a ladder truck or ladder tender may be dispatched in place of an engine. For clarity in the benchmark statements, the term engine is used, but that engine could be a ladder or tender with the same capacity as an engine and the same staffing of personnel.

All first unit arrival times across all risk classes are 8 minutes urban and 14 minutes rural. The only exception is ARFF due to the Federal Aviation Administration (FAA) requirements. The ARFF unit, as the first arriving unit, will be 3 minutes. As risk categories go up and resources increase, the ERF assembly time will go up by 5 minutes due to distribution factors. The accreditation compliance team utilized mapping, geographic boundaries, and distribution points within the system to determine these benchmarks. Further analysis will occur as part of the model to determine if benchmark times shall be adjusted.

ARFF Benchmark Statements

For 90 percent of all ARFF incidents, the total response time for the arrival of the first-due unit staffed with one ARFF engineer in the ARFF unit shall be 3 minutes in the urban planning zones. The first due unit, per FAA policy shall be the ARFF unit within 3 minutes. The first-due unit shall be capable of size up, incident command, communications with the FAA tower, and initial stabilization of the incident.

For 90 percent of all lowrisk ARFF incidents (Alert 1 Standy), the total response time for the arrival of the effective response force (ERF) consisting of one engine staffed with two firefighters and one officer, and one ARFF unit staffed with one engineer shall be 8 minutes in the urban planning zones. The first due unit, per FAA policy shall be the ARFF unit within 3 minutes. The ERF shall be capable of size up, incident command, communications with the FAA tower, and staging the ARFF unit in an appropriate location.

For 90 percent of all moderaterisk ARFF incidents (Alert 2 In Air Emergency), the total response time for the arrival of the ERF consisting of three engines staffed with six firefighters and three officers, one ARFF unit staffed with one engineer, and one battalion chief shall be 13 minutes in the urban planning zones. The first due unit, according to FAA policy, shall be the ARFF unit within 3 minutes. The ERF shall be capable of size up, incident command, evacuation and rescue, fire control on the exterior of the aircraft, patient assessment/treatment, fire control on the interior of the aircraft, pump operations, water supply, and transfer and continuance of command.

For 90 percent of all highrisk ARFF incidents (Alert 3 Small Aircraft Crash with less than four souls on board), the total response time for the arrival of the ERF consisting of four engines staffed with eight firefighters and four officers, one third-party ambulance/CAFMA rescue staffed with two personnel, one ARFF unit staffed with one engineer, and one battalion chief shall be 18 minutes in the urban planning zones The first due unit per FAA policy, shall be the ARFF unit within 3 minutes. The ERF shall be capable of size up, incident command, fire control on the exterior of the aircraft, rescue, triage, initiation of patient care, fire control interior/exterior, patient assessment/treatment, pump operations, water supply, backup lines, treatment and transport, and transfer and continuance of incident command.

For 90 percent of all maximum risk ARFF incidents (Alert 3 Large Aircraft Crash with five or more souls on board), the total response time for the arrival of the ERF consisting of eight engines staffed with sixteen firefighters and eight officers, two third-party ambulances/CAFMA rescues staffed with four personnel, one ARFF unit staffed with one engineer, two battalion chiefs, and one safety officer shall be 23 minutes in the

urban planning zones. The first due unit,according to FAA policy, shall be the ARFF unit within 3 minutes. The ERF shall be capable of size up, incident command, fire control on the exterior of the aircraft, rescue, triage, initiation of patient care, fire control interior/exterior, patient assessment/treatment, pump operations, water supply, backup lines, treatment and transport, establishing operations, establishing safety, establishing a treatment/transport group, and transfer and continuance of incident command.

	High Risk - ARFF th Percentile Times seline Performance		2019- 2023	2023	2022	2021	2020	2019	Target (Agency Benchmark)
Alarm Handling	Pick-up to Dispatch	Urban	n/a	n/a	n/a	n/a	n/a	n/a	01:00
Turnout Time	Turnout Time First Unit	Urban	n/a	n/a	n/a	n/a	n/a	n/a	01:30
Travel	Travel Time First Unit Distribution	Urban	n/a	n/a	n/a	n/a	n/a	n/a	03:00
Time	Travel Time ERF Concentration	Urban	n/a	n/a	n/a	n/a	n/a	n/a	15:30
T - 1 - 1	Total Response Time First Unit on Scene	Urban	n/a	n/a	n/a	n/a	n/a	n/a	03:00
Total	Distribution		n=1	n=0	n=0	n=1	n=0	n=0	
Response Time	Total Response Time ERF	Urban	n/a	n/a	n/a	n/a	n/a	n/a	18:00
	Concentration		n=0	n=0	n=0	n=0	n=0	n=0	

Table 44: Baseline Performance - ARFF High Risk

Table 45: Baseline Performance - ARFF Moderate Risk

90	oderate Risk - ARFF th Percentile Times seline Performance		2019- 2023	2023	2022	2021	2020	2019	Target (Agency Benchmark)
Alarm Handling	Pick-up to Dispatch	Urban	02:40	n/a	n/a	04:29	n/a	n/a	01:00
Turnout Time	Turnout Time First Unit	Urban	02:37	n/a	n/a	02:41	n/a	n/a	01:30
Travel	Travel Time First Unit Travel Distribution	Urban	11:10	n/a	n/a	09:08	n/a	n/a	03:00
Time	Travel Time ERF Concentration	Urban	00:00	n/a	n/a	00:00	n/a	n/a	10:30
	Total Response Time First Unit on Scene	Urban	13:30	n/a	n/a	12:04	n/a	n/a	03:00
Total	Distribution		n=36	n=9	n=7	n=10	n=8	n=2	
Response Time	Total Response Time ERF	Urban	n/a	n/a	n/a	n/a	n/a	n/a	13:00
	Concentration		n=0	n=0	n=0	n=0	n=0	n=0	

Table 46: Baseline Performance - ARFF Low Risk

Low Risk - ARFF 90th Percentile Times Baseline Performance			2019- 2023	2023	2022	2021	2020	2019	Target (Agency Benchmark)
Alarm Handling	Pick-up to Dispatch	Urban	n/a	n/a	n/a	n/a	n/a	n/a	01:00
Turnout Time	Turnout Time First Unit	Urban	n/a	n/a	n/a	n/a	n/a	n/a	01:30
Travel	Travel Time First Unit Travel Distribution	Urban	n/a	n/a	n/a	n/a	n/a	n/a	08:00
Time	Travel Time ERF Concentration	Urban	n/a	n/a	n/a	n/a	n/a	n/a	05:30
The second	Total Response Time First Unit on Scene	Urban	n/a	n/a	n/a	n/a	n/a	n/a	03:00
Total	Distribution		n=0	n=0	n=0	n=0	n=0	n=0	
Response Time	Total Response Time ERF	Urban	n/a	n/a	n/a	n/a	n/a	n/a	08:00
	Concentration		n=0	n=0	n=0	n=0	n=0	n=0	

During critical tasking, the accreditation team identified two risk categories to be added under the ARFF risk class. Those risk categories are as follows:

- Maximum Risk ARFF Alert 3 (large aircraft with more than five souls on board).
- Low Risk ARFF Alert 1 (standby).

Since these are new risk categories, no data exists as they have yet to be programmed into computer-aided dispatch (CAD). This will occur because of this study and will be evaluated annually.

The ARFF unit does not have a mobile data computer (MDC) or an automatic vehicle locator (AVL) and data is not captured on this unit as this unit communicates directly with the Federal Aviation Administration (FAA) control tower during incidents. Therefore, the unit does not receive time stamps as it does not

communicate with the regional communications center and does not have the technology installed on it to create time stamps in the data set. The resolution to this issue is addressed in the recommendations portion of this document.

In the ARFF class, it will be noted that 'Rural' is not reflected. This is because all ARFF metrics are based on incidents that occur at or near the Prescott Regional Airport, Ernest A. Love Field.

EMS Benchmark Statements

For 90 percent of all EMS responses, the total response time for the arrival of the firstdue unit, staffed with two firefighters and one officer, of whom at least one will be a paramedic, is set at 8 minutes in urban planning zones and 14 minutes in the rural planning zones. The firstdue unit shall be capable of assessing scene safety and establishing command, size up of the situation, conducting an initial patient assessment, obtaining vitals and patient's medical history, initiating mitigation efforts within one minute of arrival, providing advanced life support care and basic life support care, including automatic external defibrillation (AED) if needed, and assisting transport personnel with packaging the patient.

For 90 percent of all low-risk EMS response incidents, the total response time for the arrival of the effective response force (ERF) consisting of at least two personnel on an alternative response unit or ambulance/rescue shall be 8 minutes in urban planning zones and 14 minutes in the rural planning zones. The ERF shall be capable of providing scene size-up, incident command, patient assessment and treatment, documentation, and transport if needed.

For 90 percent of all moderate risk EMS response incidents, the total response time for the arrival of the effective response force (ERF) consisting of one engine staffed with two firefighters and one officer, and an ambulance/rescue staffed with two personnel shall be 8 minutes in urban planning zones and 14 minutes in the rural planning zones. The ERF shall be capable of providing incident command, producing related documentation, appointing a site safety officer, completing a comprehensive patient assessment, providing appropriate treatment/transport, performing AED if needed, initiating cardiopulmonary resuscitation (CPR) if needed, and providing intravenous (IV) access-medication administration.

For 90 percent of allhigh-risk EMS response incidents, the total response time for the arrival of the effective response force (ERF) consisting of two engines staffed with four firefighters and two officers, two third-party provider ambulances or CAFMA rescue units staffed with four personnel, and one battalion chief shall be 13 minutes in the urban planning zones and 19 minutes in the rural planning zones. The ERF shall be capable of providing incident command, related documentation, appointing a site safety officer, landing medical helicopter(s), providing extrication/disentanglement, completing a comprehensive patient assessment on multiple patients, providing appropriate treatment/transport, performing AED if needed, initiating cardiopulmonary resuscitation (CPR) if needed, and providing intravenous (IV) access-medication administration.

For 90 percent of all modified highrisk EMS response incidents, the total response time for the arrival of the effective response force (ERF) consisting of one engine staffed with two firefighters and one officer, an ambulance/rescue staffed with two personnel, and one battalion chief shall be 9 minutes in urban planning zones and 15 minutes in rural planning zones. The ERF shall be capable of providing incident command, producing related documentation, appointing a site safety officer, completing a comprehensive patient assessment, providing appropriate treatment/transport, performing AED if needed, initiating cardiopulmonary resuscitation (CPR) if needed, providing intravenous (IV) access and administration, and landing medical helicopter(s).

For 90 percent of all maximumrisk EMS response incidents, the total response time for the arrival of the effective response force (ERF) consisting of three engines staffed with six firefighters and three officers, two third-party provider ambulances or CAFMA rescue units with four personnel, and one battalion chief shall be 18 minutes in the urban planning zones and 24 minutes in the rural planning zones. The ERF shall be capable of providing incident command, related documentation, appointing a site safety officer, landing medical helicopter(s), providing extrication/disentanglement, completing patient assessment on multiple patients, providing appropriate treatment/transport, performing AED if needed, initiating cardiopulmonary resuscitation (CPR) if needed, and providing intravenous (IV) access-medication administration. This maximum risk category is designed for mass casualty incident types.

	High Risk - EMS 90th Percentile Times Baseline Performance		2019- 2023	2023	2022	2021	2020	2019	Target (Agency Benchmark)
Alarm	Pick-up to Dispatch	Urban	01:53	02:03	01:40	01:54	01:40	01:55	01:00
Handling	Fick-up to Dispatch	Rural	02:22	02:19	02:09	02:22	02:41	02:19	01:00
Turnout	Turnout Time First Unit	Urban	01:43	01:54	01:46	01:34	01:35	01:40	01:30
Time		Rural	01:41	01:39	01:38	01:33	01:40	01:54	01:30
	Travel Time First Unit	Urban	08:46	08:22	08:09	09:04	08:49	08:25	05:30
Travel	Distribution	Rural	12:36	10:36	14:07	11:56	12:05	13:25	11:30
Time	Travel Time ERF	Urban	16:31	16:35	15:09	13:47	20:49	14:21	10:30
	Concentration	Rural	22:30	17:25	21:32	20:39	26:25	25:19	16:30
		Urban	11:12	11:22	11:01	11:05	11:16	10:50	08:00
	Total Response Time First Unit on Scene	UIDali	n=726	n=146	n=134	n=155	n=133	n=158	
	Distribution	Rural	16:23	14:28	16:20	14:55	16:41	16:29	14:00
Total		Kulai	n=323	n=59	n=62	n=75	n=64	n=63	
-	Response Time Total Response Time ERF	Urban	22:59	21:41	24:20	20:37	27:55	20:50	13:00
		UIDall	n=143	n=44	n=30	n=26	n=28	n=15	
	Concentration	Rural	30:34	21:24	27:35	n/a	32:18	n/a	19:00
		Nuial	n=56	n=17	n=13	n=8	n=14	n=4	

Table 47: Baseline Performance - EMS High Risk

90	Modified High Risk - EMS 90th Percentile Times Baseline Performance			2023	2022	2021	2020	2019	Target (Agency Benchmark)
Alarm	Pick-up to Dispatch	Urban	02:16	02:18	02:13	02:01	02:13	02:37	01:00
Handling	I lek-up to Dispateli	Rural	02:09	02:22	01:45	02:01	02:07	02:38	01:00
Turnout	Turnout Time	Urban	01:52	02:08	01:53	01:41	01:47	01:50	01:30
Time	First Unit	Rural	01:47	01:49	01:40	01:46	01:35	01:49	01:30
	Travel Time First Unit	Urban	09:21	09:18	09:12	09:11	08:49	10:53	05:30
Travel	Distribution	Rural	14:04	16:04	13:39	13:39	12:56	12:59	11:30
Time	Travel Time ERF	Urban	13:59	14:16	13:59	13:51	14:13	19:06	05:30
	Concentration	Rural	21:01	22:36	21:22	20:24	18:59	18:53	11:30
		Urban	12:33	12:31	12:16	11:53	12:33	13:42	08:00
	Total Response Time	UIDall	n=1948	n=409	n=381	n=421	n=420	n=317	
_	First Unit on Scene Distribution	Dunal	16:42	19:07	15:50	15:42	15:58	16:15	14:00
Total	Distribution	Rural	n=514	n=103	n=115	n=96	n=105	n=95	
Time	Response	Urban	19:35	21:15	19:31	18:05	19:13	24:18	09:00
Total Re	Total Response Time ERF	orban	n=923	n=234	n=192	n=250	n=212	n=35	
	Concentration	D	26:18	27:31	25:44	24:36	23:16	29:08	15:00
		Rural	n=274	n=62	n=65	n=67	n=69	n=11	

Table 49: Baseline Performance - EMS Moderate Risk

90	Moderate Risk - EMS 90th Percentile Times Baseline Performance		2019- 2023	2023	2022	2021	2020	2019	Target (Agency Benchmark)
Alarm	Pick-up to Dispatch	Urban	02:01	02:06	01:54	01:56	02:04	02:05	01:00
Handling	Tiek up to Disputei	Rural	02:06	02:11	01:54	02:01	02:07	02:17	01:00
Turnout	Turnout Time First Unit	Urban	01:53	02:03	01:58	01:50	01:44	01:45	01:30
Time		Rural	01:46	01:50	01:46	01:45	01:45	01:45	01:30
	Travel Time FirstUnit	Urban	09:10	09:28	09:20	09:15	08:41	08:51	05:30
Travel	Distribution	Rural	12:26	12:17	12:51	12:56	11:48	12:09	14:00
Time	Time Travel Time ERF	Urban	13:01	12:10	13:26	13:48	12:20	13:44	05:30
	Concentration	Rural	19:13	17:33	20:44	20:06	17:13	19:23	11:30
		Urban	12:01	12:22	12:15	12:02	11:34	11:37	08:00
	Total Response Time	Urban	n=41,331	n=8938	n=9005	n=8714	n=7145	n=7529	
	First Unit on Scene Distribution	Durral	15:19	15:21	15:32	15:52	14:36	14:52	14:00
Total	Distribution	Rural	n=10623	n=2305	n=2271	n=2265	n=1888	n=1894	
Response Time		Unhan	16:39	16:01	17:11	17:03	15:48	19:18	08:00
1 1110	Total Response Time	Urban	n=33875	n=8929	n=8751	n=8591	n=6705	n=899	
	ERF Concentration		22:50	21:22	24:04	23:22	20:51	24:56	14:00
		Rural	n=8422	n=2292	n=2130	n=2113	n=1731	n=156	

Table 50: Baseline Performance - EMS Low Risk

Low Risk - EMS	2019-	2022	2022	2021	2020	2019	Target
90th Percentile Times	2023	2023	2022	2021	2020	2019	(Agency

Ba	seline Performance								Benchmark)
Alarm	Pick-up to Dispatch	Urban	03:15	01:51	03:18	01:54	n/a	03:27	01:00
Handling	Handling Fick-up to Dispatch	Rural	02:39	n/a	n/a	n/a	n/a	n/a	01:00
Turnout	Turnout Time	Urban	01:58	02:21	02:24	01:19	n/a	01:39	01:30
Time	e First Unit	Rural	01:35	n/a	n/a	n/a	n/a	n/a	01:30
Travel	Travel Time FirstUnit	Urban	11:31	11:58	09:45	12:16	n/a	14:06	05:30
Time	Distribution	Rural	11:48	n/a	n/a	n/a	n/a	n/a	14:00
_	_	Unban	15:23	15:47	13:04	14:28	n/a	17:16	08:00
Total	se First Unit on Scene	Urban	n=54	n=10	n=15	n=10	n=9	n=10	
-		Rural	13:45	n/a	n/a	n/a	n/a	n/a	14:00
			n=10	n=2	n=0	n=3	n=2	n=3	

During critical tasking, the accreditation team identified one risk category to be added under the EMS risk class. This risk category is as follows:

• Maximum Risk EMS (mass casualty)

Since this is a new risk category, no data exists as this risk category has yet to be programmed into computer-aided dispatch (CAD). This will occur because of this study and will be evaluated annually.

Fire Suppression Benchmark Statements

For 90 percent of all fire suppression incidents, the total response time for the arrival of the first due unit, staffed with two firefighters and one officer, shall be 8 minutes in urban planning zones and 14 minutes in rural planning zones. The first due unit shall be capable of providing 500 gallons of water and 1,500 gallons per minute (gpm) pumping capacity, initiating command, requesting additional resources, establishing and advancing an attack line flowing a minimum of 150 gpm, establishing an uninterrupted water supply, and containing the fire. These operations shall be done in accordance with departmental standard operating procedures while providing for the safety of responders and the public.

For 90 percent of all low-risk fire suppression incidents, the total response time for the arrival of the effective response force (ERF) consisting of one engine staffed with two firefighters and one officer shall be 8 minutes in the urban planning zones and 14 minutes in the rural planning zones. The ERF shall be capable of establishing command, providing an uninterrupted water supply, and advancing an attack line for fire extinguishment. These operations shall be done in accordance with departmental standard operating procedures while providing for the safety of responders and the public.

For 90 percent of all moderate risk fire suppression incidents, the total response time for the arrival of the effective response force (ERF) consisting of one engine staffed with two firefighters and one officer, as well as one battalion chief, shall be 8 minutes in the urban planning zones and 14 minutes in the rural planning zones. The ERF shall be capable of establishing command, providing an uninterrupted water supply, advancing an attack line for fire extinguishment, and transferring and continuing incident command. These operations shall be done in accordance with departmental standard operating procedures while providing for the safety of responders and the public.

For 90 percent of all high-risk fire suppression incidents, the total response time for the arrival of the effective response force (ERF) consisting of four engines staffed with eight firefighters and four officers, as well as one battalion chief, shall be 13 minutes in the urban planning zones and 19 minutes in the rural planning zones. The ERF shall be capable of establishing command, providing an uninterrupted water

supply, advancing an attack line and a backup line for fire control, complying with the Occupational Safety and Health Administration (OSHA) requirements of two in-two out, completing forcible entry, searching and rescuing at-risk victims, ventilating the structure, controlling utilities, and performing salvage and overhaul.

For 90 percent of all maximum risk fire suppression incidents, the total response time for the arrival of the effective response force (ERF) consisting of six engines staffed with twelve firefighters and six officers; two ladders staffed with four firefighters and two officers; two battalion chiefs; and one safety officer shall be 18 minutes in the urban planning zones and 24 minutes in the rural planning zones. The ERF shall be capable of establishing command, size up, incident command, fire control, multiple water supplies, rapid intervention crew(s), primary all clear, backup lines, ventilation, transfer and continuance of incident command, safety, exposure protection, ladder operations, operations, evacuations, search, and rescue.

9	High Risk - Fire 0th Percentile Times aseline Performance		2019- 2023	2023	2022	2021	2020	2019	Target (Agency Benchmark)
Alarm	Pick-up to Dispatch	Urban	02:38	02:50	02:18	02:22	02:28	02:50	01:00
Handling	Fick-up to Dispatch	Rural	02:57	03:34	03:01	02:13	02:17	02:30	01:00
Turnout	Turnout Time	Urban	02:05	02:05	02:03	02:04	02:02	02:04	01:30
Time	First Unit	Rural	02:04	01:58	02:14	01:59	02:14	01:49	01:30
	Travel Time First Unit	Urban	09:33	09:47	09:27	08:49	07:59	11:27	05:30
Travel	Distribution	Rural	14:28	14:37	14:33	12:44	13:21	15:23	14:00
Time	Travel Time ERF	Urban	24:58	25:24	22:04	23:33	21:13	25:18	15:30
	Concentration	Rural	26:40	26:08	26:21	23:31	25:55	16:04	21:30
		Urban	12:56	13:07	12:42	11:57	11:32	14:38	08:00
	Total Response Time	UIDall	n=450	n=101	n=94	n=77	n=84	n=94	
	First Unit on Scene Distribution	Rural	18:26	19:31	18:10	18:02	15:38	17:43	14:00
Total		Kulai	n=199	n=46	n=45	n=37	n=32	n=39	
Response Time		Urban	31:05	n/a	30:16	n/a	29:39	31:51	18:00
	Total Response Time	UIDall	n=58	n=9	n=13	n=7	n=14	n=15	
	ERF Concentration	Rural	30:35	n/a	n/a	n/a	n/a	n/a	24:00
			n=23	n=5	n=5	n=5	n=7	n=1	

Table 51: Baseline Performance - Fire Suppression High Risk

Table 52: Baseline Performance - Fire Suppression Moderate Risk

Moderate Risk - Fire 90th Percentile Times Baseline Performance	2019- 2023	2023	2022	2021	2020	2019	Target (Agency Benchmark)
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		Umban	02.12	02.16	02.40	02.04	01.40	01.40	01.00
Alarm	Pick-up to Dispatch	Urban	02:12	02:16	02:40	02:04	01:49	01:49	01:00
Handling	rien up to Disputeir	Rural	02:27	03:09	01:34	02:00	02:25	02:28	01:00
Turnout	Turnout Time	Urban	01:45	02:07	01:26	01:52	01:28	01:43	01:30
Time	First Unit	Rural	01:58	01:40	01:59	01:46	01:46	01:59	01:30
	Travel Time First Unit	Urban	09:42	09:26	08:19	11:34	08:56	09:01	05:30
Travel	Distribution	Rural	10:32	10:39	09:13	09:41	12:40	09:49	14:00
Time	ne Travel Time ERF	Urban	12:32	13:36	11:07	12:46	12:11	10:22	10:30
	Concentration	Rural	16:38	19:17	11:52	10:42	12:48	18:23	16:30
		Urban	12:50	12:36	11:25	14:31	11:07	12:44	08:00
	Total Response Time First Unit on Scene	Urban	n=204	n=41	n=37	n=56	n=32	n=38	
	Distribution	Dunal	13:33	14:44	11:42	12:28	14:39	13:04	14:00
Total		Rural	n=85	n=15	n=13	n=17	n=18	n=22	
Response Time		Urban	16:01	15:34	13:24	19:46	14:02	14:09	13:00
i inte	Total Response Time	UIDall	n=126	n=33	n=18	n=30	n=21	n=24	
	ERF Concentration	Rural	20:44	n/a	n/a	14:11	17:37	22:20	19:00
			n=58	n=7	n=6	n=12	n=17	n=16	

Table 53: Baseline Performance - Fire Suppression Low Risk

	Low Risk - Fire 90th Percentile Times Baseline Performance Urban			2023	2022	2021	2020	2019	Target (Agency Benchmark)
Alarm	Pick-up to Dispatch		02:45	n/a	n/a	n/a	02:02	n/a	01:00
Handling	3	Rural	03:14	n/a	n/a	n/a	n/a	n/a	01:00
Turnout	Turnout Time	Urban	01:36	n/a	n/a	n/a	01:41	n/a	01:30
Time	First Unit	Rural	01:55	n/a	n/a	n/a	n/a	n/a	01:30
Travel	Travel Time First Unit	Urban	11:52	n/a	n/a	n/a	11:53	n/a	05:30
Time	Distribution	Rural	14:40	n/a	n/a	n/a	n/a	n/a	14:00
		Urban	14:48	n/a	n/a	n/a	15:32	n/a	08:00
	TotalTotal Response TimeResponseFirst Unit on SceneTimeDistribution	UIDall	n=39	n=6	n=9	n=8	n=12	n=4	
-		Rural	19:19	n/a	n/a	n/a	n/a	n/a	14:00
		Kulai	n=25	n=4	n=8	n=2	n=5	n=6	

During critical tasking, the accreditation team identified one risk category that required changes to the ERF. This risk category is as follows:

• Maximum Risk Fire

It was determined that the agencies were sending too few resources to this incident type. Since this is a new risk category, no data exists as this risk category has yet to be programmed into computer-aided dispatch (CAD). This will occur because of this study and will be evaluated annually.

Hazardous Materials Benchmark Statements

For 90 percent of all hazardous materials incidents, the total response time for the arrival of the first-due unit, staffed with two firefighters and one officer, shall be 8 minutes in the urban planning zones and 14 minutes in the rural planning zones. The first-due unit shall be capable of size up, incident command, safety, investigation, and hazard control.

For 90 percent of all low-riskhazardousmaterials incidents, the total response time for the arrival of the effective response force (ERF) consisting of one engine staffed with two firefighters and one officer shall be 8 minutes in the urban planning zones and 14 minutes in the rural planning zones. The ERF shall be capable of size up, incident command, safety, investigation, and hazard control.

For 90 percent of all moderate risk hazardous materials incidents, the total response time for the arrival of the ERF consisting of two engines staffed with four firefighters and two officers, and one battalion chief shall be 13 minutes in the urban planning zones and 19 minutes in the rural planning zones. The ERF shall be capable of size up, incident command, establishment of a perimeter, denial of entry, public protection, identification of the hazardous material, controlling the hazard, and continuance of incident command.

For 90 percent of all high-risk hazardous materials incidents, the total response time for the arrival of the ERF consisting of four engines staffed with eight firefighters and four officers, one hazardousmaterials unit cross staffed, one battalion chief, and callout of the hazardous materials team members shall be18 minutes in the urban planning zones and 24 minutes in the rural planning zones. The ERF shall be capable of size up, incident command, establishment of a perimeter, denial of entry, public protection, identification/research of the hazardous condition, establishing a hazardous materials group supervisor, establishing a safety officer, establishing an entry and backup team, decontamination, and continuance of incident command. Note that the hazardous materials team members coming in off-duty are not part of the ERF. The ERF consists of qualified members and resources needed to stabilize the incident.

90	High Risk –Hazardous Materials 90th Percentile Times Baseline Performance			2023	2022	2021	2020	2019	Target (Agency Benchmark)
Alarm	Pick-up to Dispatch	Urban	n/a	n/a	n/a	n/a	n/a	n/a	01:00
Handling	Tiek up to Disputei	Rural	n/a	n/a	n/a	n/a	n/a	n/a	01:00
Turnout	Turnout Time	Urban	n/a	n/a	n/a	n/a	n/a	n/a	01:30
Time	First Unit	Rural	n/a	n/a	n/a	n/a	n/a	n/a	01:30
	Travel Time First Unit	Urban	n/a	n/a	n/a	n/a	n/a	n/a	05:30
Travel	Distribution	Rural	n/a	n/a	n/a	n/a	n/a	n/a	14:00
Time	Travel Time ERF	Urban	n/a	n/a	n/a	n/a	n/a	n/a	15:30
	Concentration	Rural	n/a	n/a	n/a	n/a	n/a	n/a	21:30
		Unber	n/a	n/a	n/a	n/a	n/a	n/a	08:00
	Total Response Time	Urban	n=0	n=0	n=0	n=0	n=0	n=0	
	First Unit on Scene Distribution	Derest	n/a	n/a	n/a	n/a	n/a	n/a	14:00
Total	2 1001 10 401011	Rural	n=0	n=0	n=0	n=0	n=0	n=0	
Response Time	_	Unhar	n/a	n/a	n/a	n/a	n/a	n/a	18:00
Total Respo ERI	Total Response Time	Urban	n=0	n=0	n=0	n=0	n=0	n=0	
	ERF Concentration	Dennal	n/a	n/a	n/a	n/a	n/a	n/a	24:00
		Rural	n=0	n=0	n=0	n=0	n=0	n=0	

Table 54: Baseline Performance - Hazardous Materials High Risk

Table 55: Baseline Performance - Hazardous Materials Moderate Risk

90	Moderate Risk –Hazardous Materials 90th Percentile Times Baseline Performance			2023	2022	2021	2020	2019	Target (Agency Benchmark)
Alarm	Pick-up to Dispatch	Urban	03:31	03:32	03:23	02:54	03:13	04:15	01:00
Handling	Tiek up to Disputei	Rural	03:01	03:03	01:52	n/a	04:56	n/a	01:00
Turnout	Turnout Time	Urban	02:08	02:11	02:02	01:59	01:55	02:13	01:30
Time	First Unit	Rural	02:22	02:27	02:42	n/a	01:40	n/a	01:30
	Travel Time First Unit	Urban	11:59	09:41	10:23	12:13	08:36	12:48	05:30
Travel	Distribution	Rural	13:08	15:01	12:43	n/a	10:37	n/a	14:00
Time	Travel Time ERF	Urban	19:36	18:29	17:43	18:51	20:48	20:12	10:30
	Concentration	Rural	18:51	21:35	19:37	n/a	17:04	n/a	16:30
	_	Urban	14:52	13:59	13:48	16:17	13:47	15:52	08:00
	Total Response Time	Urban	n=193	n=38	n=39	n=40	n=34	n=42	
	First Unit on Scene Distribution	Durral	16:59	18:41	17:46	n/a	12:47	n/a	14:00
Total	Distribution	Rural	n=47	n=10	n=10	n=9	n=11	n=7	
Response Time	_	Unbor	25:38	23:49	27:20	24:04	25:23	25:25	13:00
	Total Response Time	Urban	n=146	n=24	n=27	n=26	n=31	n=38	
	ERF Concentration	Deres	28:56	n/a	n/a	n/a	n/a	n/a	19:00
		Rural	n=20	n=5	n=6	n=2	n=6	n=1	

9	tisk –Hazardous Mater Oth Percentile Times Baseline Performance	rials	2019- 2023	2023	2022	2021	2020	2019	Target (Agency Benchmark)
Alarm	Pick-up to Dispatch		03:31	03:21	03:28	03:03	03:41	03:39	01:00
Handling	Pick-up to Dispatch	Rural	03:34	03:49	03:31	03:06	02:57	04:25	01:00
Turnout	Turnout Time	Urban	02:08	02:01	02:07	02:21	01:57	01:58	01:30
Time	First Unit	Rural	01:47	01:29	01:55	01:23	01:33	02:18	01:30
Travel	Travel Time First Unit	Urban	12:26	12:43	11:50	11:01	11:29	13:05	05:30
Time	Distribution	Rural	13:20	15:43	12:17	14:35	08:56	12:16	14:00
_	_	Urban	15:50	16:01	15:40	14:19	14:27	16:57	08:00
	TotalTotal Response TimeResponseFirst Unit on SceneTimeDistribution	Urban	n=483	n=99	n=115	n=91	n=94	n=84	
-		Rural	17:31	18:56	16:40	16:45	12:42	16:46	14:00
		Kulal	n=138	n=27	n=34	n=31	n=19	n=27	

Table 56: Baseline Performance - Hazardous Materials Low Risk

During critical tasking, the accreditation team identified one risk category to be added under the hazardous materials risk class. This risk category is as follows:

• High Risk HazardousMaterials.

It was determined that the agencies were sending too few resources to this incident type. Since this is a new risk category, no data exists as this risk category has yet to be programmed into computer-aided dispatch (CAD). This will occur because of this study and will be evaluated annually.

TRT Benchmark Statements

For 90 percent of all technical rescue incidents, the total response time for the arrival of the first-due unit, staffed with two firefighters and one officer, shall be 8 minutes in the urban planning zones and 14 minutes in the rural planning zones. The first due unit shall be capable of establishing command, sizing up to determine if a technical rescue response is required, requesting additional resources, and providing advanced life support to any victim without endangering response personnel.

For 90 percent of all low-risk technical rescue incidents, the total response time for the arrival of the effective response force (ERF) consisting of one engine staffed with two firefighters and one officer, and one battalion chief, shall be 8 minutes in the urban planning zones and 14 minutes in the rural planning zones. The ERF shall be capable of establishing command, sizing up to determine if a technical rescue response is required, requesting additional resources, and providing advanced life support to any victim without endangering response personnel.

For 90 percent of all moderaterisk technical rescue incidents, the total response time for the arrival of the ERF consisting of two engines staffed with four firefighters and two officers, one cross-staffed support unit, and one battalion chief shall be 13 minutes in the urban planning zones and 19 minutes in the rural planning zones. The ERF shall be capable of technical level response, appointing a site safety officer, establishing patient contact, staging and apparatus placement and set-up, providing technical expertise, knowledge, skills, and abilities during technical rescue incidents, and providing advanced life medical support.

For 90 percent of all high-risk technical rescue incidents, the total response time for the arrival of the ERF consisting of four engines staffed with eight firefighters and four officers, one cross-staffed support unit, one battalion chief, and callout of the technical rescue team members shall be 18 minutes in the urban planning zones and 24 minutes in the rural planning zones. The ERF shall be capable of technical level response,

appointing a site safety officer, establishing patient contact, staging and apparatus placement and set-up, providing technical expertise, knowledge, skills, and abilities during technical rescue incidents, and providing advanced life medical support. Safety for rope, swift water, structural collapse, confined space, and trench rescue shall be in place. Note that the technical rescue team members coming in off-duty are not part of the ERF. The ERF consists of the number of qualified members and resources needed to begin to stabilize the incident.

9(High Risk – Technical Rescue 90th Percentile Times Baseline Performance		2019- 2023	2023	2022	2021	2020	2019	Target (Agency Benchmark)
Alarm	Pick-up to Dispatch	Urban	05:14	n/a	n/a	n/a	n/a	n/a	01:00
Handling	Fick-up to Dispatch	Rural	n/a	n/a	n/a	n/a	n/a	n/a	01:00
Turnout	Turnout Time	Urban	02:09	n/a	n/a	n/a	n/a	n/a	01:30
Time	First Unit	Rural	n/a	n/a	n/a	n/a	n/a	n/a	01:30
	Travel Time First Unit Travel Distribution Time Travel Time ERF	Urban	18:46	n/a	n/a	n/a	n/a	n/a	05:30
Travel		Rural	n/a	n/a	n/a	n/a	n/a	n/a	14:00
Time		Urban	00:00	n/a	n/a	n/a	n/a	n/a	15:30
	Concentration	Rural	n/a	n/a	n/a	n/a	n/a	n/a	21:30
		Urban	26:27	n/a	n/a	n/a	n/a	n/a	08:00
	Total Response Time First Unit on Scene	UIDall	n=23	n=6	n=5	n=3	n=4	n=5	
	Distribution	Dumal	n/a	n/a	n/a	n/a	n/a	n/a	14:00
Total	Distribution	Rural	n=3	n=0	n=0	n=3	n=0	n=0	
Response Time		Urban	n/a	n/a	n/a	n/a	n/a	n/a	18:00
Total Response Time ERF Concentration	-	urban	n=0	n=0	n=0	n=0	n=0	n=0	
		Dunal	n/a	n/a	n/a	n/a	n/a	n/a	24:00
	Rural	n=0	n=0	n=0	n=0	n=0	n=0		

Table 57: Baseline Performance - Technical Rescue High Risk

	Moderate Risk – Technical Rescue 90th Percentile Times Baseline Performance			2023	2022	2021	2020	2019	Target (Agency Benchmark)
Alarm	Pick-up to Dispatch	Urban	05:01	05:31	04:46	05:46	04:36	04:34	01:00
Handling	I lek-up to Dispaten	Rural	05:24	n/a	n/a	n/a	n/a	n/a	01:00
Turnout	Turnout Time	Urban	01:53	02:06	01:51	01:52	01:55	01:51	01:30
Time	First Unit	Rural	02:28	n/a	n/a	n/a	n/a	n/a	01:30
	Travel Time First Unit	Urban	18:31	20:09	17:32	21:12	12:55	15:35	05:30
Travel Distrib	Distribution	Rural	21:04	n/a	n/a	n/a	n/a	n/a	14:00
Time	Travel Time ERF Concentration	Urban	24:35	26:24	25:23	23:27	22:03	19:16	10:30
		Rural	23:09	n/a	n/a	n/a	n/a	n/a	16:30
		Urban	23:59	24:06	21:08	28:36	18:28	18:25	08:00
	Total Response Time First Unit on Scene	UIDali	n=95	n=14	n=20	n=18	n=31	n=12	
	Distribution	Dunal	25:29	n/a	n/a	n/a	n/a	n/a	14:00
Total	2100110401011	Rural	n=11	n=4	n=0	n=2	n=3	n=2	
Response Time		Urban	30:01	n/a	29:24	n/a	26:31	n/a	13:00
Time	Total Response Time	orban	n=66	n=7	n=14	n=9	n=27	n=9	
	ERF Concentration	Dural	n/a	n/a	n/a	n/a	n/a	n/a	19:00
	301100110 401011	Rural	n=2	n=1	n=0	n=0	n=1	n=0	

Table 58: Baseline Performance - Technical Rescue Moderate Risk

Table 59: Baseline Performance - Technical Rescue Low Risk

	Low Risk – Technical Rescue 90th Percentile Times Baseline Performance			2023	2022	2021	2020	2019	Target (Agency Benchmark)
Alarm	Pick-up to Dispatch	Urban	n/a	n/a	n/a	n/a	n/a	n/a	01:00
Handling	I lek-up to Dispateli	Rural	n/a	n/a	n/a	n/a	n/a	n/a	01:00
Turnout	Turnout Time	Urban	n/a	n/a	n/a	n/a	n/a	n/a	01:30
Time	First Unit	Rural	n/a	n/a	n/a	n/a	n/a	n/a	01:30
	Travel Time First Unit	Urban	n/a	n/a	n/a	n/a	n/a	n/a	05:30
Travel	Travel Distribution	Rural	n/a	n/a	n/a	n/a	n/a	n/a	14:00
Time	Travel Time ERF Concentration	Urban	n/a	n/a	n/a	n/a	n/a	n/a	05:30
		Rural	n/a	n/a	n/a	n/a	n/a	n/a	11:30
	_	Urban	n/a	n/a	n/a	n/a	n/a	n/a	08:00
	Total Response Time	Urball	n=0	n=0	n=0	n=0	n=0	n=0	
	First Unit on Scene Distribution	Dunal	n/a	n/a	n/a	n/a	n/a	n/a	14:00
Total	2100110401011	Rural	n=0	n=0	n=0	n=0	n=0	n=0	
Response Time	_	Urbon	n/a	n/a	n/a	n/a	n/a	n/a	08:00
	Total Response Time	Urban	n=0	n=0	n=0	n=0	n=0	n=0	
	ERF Concentration	Derral	n/a	n/a	n/a	n/a	n/a	n/a	14:00
		Rural	n=0	n=0	n=0	n=0	n=0	n=0	

During critical tasking, the accreditation team identified one risk category to be added under the technical rescue risk class. This risk category is as follows:

• Low Risk Technical Rescue.

It was determined that the agencies were sending too many resources to these types of incidents. Since this is a new risk category, no data exists as this risk category has yet to be programmed into computer-aided dispatch (CAD). This will occur because of this study and will be evaluated annually.

Wildland Suppression Benchmark Statements

For 90 percent of all wildland suppression incidents, the total response time for the arrival of the first-due unit, staffed with two firefighters and one officer, shall be 8 minutes in the urban planning zones and 14 minutes in the rural planning zones. The first-due unit shall be capable of size up, incident command, pump operations, and fire control.

For 90 percent of all low-risk wildland suppression incidents, the total response time for the arrival of the effective response force (ERF)consisting of one engine staffed with two firefighters and one officer shall be 8 minutes in the urban planning zones and 14 minutes in the rural planning zones. The ERF shall be capable of size up, incident command, pump operations, and fire control.

For 90 percent of all moderaterisk wildland suppression incidents, the total response time for the arrival of the ERF consisting of two engines staffed with four firefighters and two officers, cross-staffed wildland brush units if needed, cross-staffed water tenders if needed, and one battalion chief shall be 13 minutes in the urban planning zones and 19 minutes in the rural planning zones. The ERF shall be capable of size up, incident command, pump operations, water supply, fire attack, hand tool work, and transfer and continuance of command.

For 90 percent of all high-risk wildland suppression incidents, the total response time for the arrival of the ERF consisting of four engines staffed with eight firefighters and four officers, cross-staffed wildland brush units if needed, cross-staffed water tenders if needed, and one battalion chief shall be 18 minutes in the urban planning zones and 24 minutes in the rural planning zones. The ERF shall be capable of size up, incident command, pump operations, water supply, fire attack with two lines, hand tool work, and transfer and continuance of incident command.

Table 60: Baseline Performance - Wildland Fire High Risk

9	gh Risk – Wildland Fire 90th Percentile Times Baseline Performance		2019- 2023	2023	2022	2021	2020	2019	Target (Agency Benchmark)
Alarm	Pick-up to Dispatch	Urban	02:56	n/a	01:44	03:12	02:26	n/a	01:00
Handling	Fick-up to Dispatch	Rural	02:44	02:16	02:31	03:12	02:03	03:26	01:00
Turnout	Turnout Time	Urban	01:55	n/a	01:51	01:42	02:10	n/a	01:30
Time	First Unit	Rural	02:03	02:50	02:20	02:08	01:39	01:31	01:30
	Travel Time	Urban	16:35	n/a	11:14	18:29	17:17	n/a	05:30
Travel	First Unit Distribution	Rural	16:55	17:19	15:39	15:28	16:12	22:51	14:00
Time	Travel Time ERF Concentration	Urban	00:00	n/a	00:00	00:00	00:00	n/a	15:30
		Rural	21:30	00:00	14:07	22:31	17:28	00:00	21:30
		Urban	20:32	n/a	13:57	22:44	20:26	n/a	08:00
	Total Response Time	Urban	n=58	n=7	n=13	n=17	n=13	n=8	
	First Unit on Scene Distribution	Dural	19:53	21:27	18:39	19:15	22:02	27:54	14:00
Total	Distribution	Rural	n=81	n=19	n=15	n=22	n=15	n=10	
Response Time	_	Urban	n/a	n/a	n/a	n/a	n/a	n/a	18:00
	Total Response Time ERF	orban	n=0	n=0	n=0	n=0	n=0	n=0	
	Concentration	Dural	n/a	n/a	n/a	n/a	n/a	n/a	24:00
		Rural	n=3	n=0	n=1	n=1	n=1	n=0	

Table 61: Baseline Performance - Wildland Fire Moderate Risk

Moderate Risk – Wildland Fire 90th Percentile Times Baseline Performance		2019- 2023	2023	2022	2021	2020	2019	Target (Agency Benchmark)	
Alarm	Alarm Diele um to Diemetek	Urban	03:14	02:04	n/a	03:38	01:44	03:16	01:00
Handling	Pick-up to Dispatch	Rural	03:51	03:22	02:53	n/a	02:37	05:01	01:00
Turnout	Turnout Time	Urban	01:55	01:56	n/a	01:55	01:45	01:42	01:30
Time	First Unit	Rural	01:56	02:06	01:58	n/a	02:24	01:40	01:30
	Travel Time	Urban	11:56	11:40	n/a	10:40	16:42	10:50	05:30
Travel	First Unit Distribution	Rural	19:27	22:33	13:08	n/a	18:10	20:20	14:00
Time	Travel Time ERF Concentration	Urban	14:16	08:35	n/a	13:31	08:16	14:05	10:30
		Rural	21:20	18:37	14:04	n/a	23:04	12:34	16:30
		Urban	15:35	15:03	n/a	13:59	19:00	14:58	08:00
	Total Response Time	Urban	n=72	n=17	n=8	n=15	n=12	n=20	
	First Unit on Scene Distribution	Rural	23:38	27:59	16:38	n/a	23:12	25:33	14:00
Total		Kulai	n=93	n=35	n=18	n=9	n=14	n=17	
Response Time		Urban	n/a	n/a	n/a	n/a	n/a	n/a	13:00
	Total Response Time ERF	UIDall	n=8	n=3	n=0	n=2	n=1	n=2	
	Concentration	Rural	n/a	n/a	n/a	n/a	n/a	n/a	19:00
	Concenti attoli	Kural	n=6	n=1	n=2	n=0	n=2	n=1	

Table 62: Baseline Performance - Wildland Fire Low Risk

Low Risk – Wildland Fire	2019-	2022	2022	2021	2020	2010	Target
90th Percentile Times	2023	2023	2022	2021	2020	2019	(Agency

1	Baseline Performance								Benchmark)
Alarm	Pick-up to Dispatch	Urban	03:47	n/a	n/a	n/a	n/a	n/a	01:00
Handling	Fick-up to Dispatch	Rural	04:28	n/a	n/a	n/a	n/a	n/a	01:00
Turnout	Turnout Time	Urban	01:51	n/a	n/a	n/a	n/a	n/a	01:30
Time	First Unit	Rural	01:54	n/a	n/a	n/a	n/a	n/a	01:30
Travel	Travel Time First Unit Distribution	Urban	20:38	n/a	n/a	n/a	n/a	n/a	05:30
Time		Rural	12:13	n/a	n/a	n/a	n/a	n/a	14:00
_	_	Unhan	25:04	n/a	n/a	n/a	n/a	n/a	08:00
Total Response Time	Total Response Time	Urban	n=19	n=0	n=3	n=5	n=6	n=5	
	First Unit on Scene Distribution	Rural	16:13	n/a	n/a	n/a	n/a	n/a	14:00
			n=17	n=1	n=4	n=6	n=4	n=2	

I. Evaluation of Service Delivery

Baseline to Benchmark Performance Time Gaps and Baseline Performance Objectives

Aircraft Rescue and Firefighting (ARFF)Baseline to Benchmark Time Gap

High Risk - ARFF 90th Percentile Times Baseline Benchmark Gap **Baseline Performance** Alarm Urban n/a 01:00 * Pick-up to Dispatch Handling ** Rural * Urban n/a 01:30 Turnout **Turnout** Time Time First Unit ** Rural **Travel Time** 03:00 * Urban n/a First Unit ** Rural Distribution Travel Time **Travel Time** Urban 15:30 * n/a ERF ** Concentration Rural * n/a 03:00 **Total Response Time** Urban First Unit on Scene n=1 Total Distribution ** Rural Response * 18:00 n/a **Total Response Time** Time Urban ERF n=0 Concentration ** Rural

Table 63: Baseline to Benchmark Time Gap - ARFF High Risk

(Moderate Risk - ARFF 90th Percentile Times Baseline Performance		Baseline	Benchmark	Gap
Alarm	Pick-up to Dispatch	Urban	02:40	01:00	over 01:40
Handling	I lek-up to Dispateli	Rural			
Turnout	Turnout Time	Urban	02:37	01:30	over 01:07
Time	First Unit	Rural			**
	Travel Time First Unit Distribution	Urban	11:10	03:00	*Over 08:10 - No ARFF unit times. This is first engine
Travel		Rural			**
Time	Travel Time ERF	Urban	00:00	10:30	
	Concentration	Rural			**
	Total Response Time	Urban	13:30	03:00	*Over 10:30 - No ARFF unit
	First Unit on Scene	UIDali	n=36		times. This is engines only
Total Response - Time	Distribution	Rural			**
	Total Response Time	Urbar	n/a	13:00	
	ERF	Urban	n=0		
	Concentration	Rural			**

Table 64: Baseline to Benchmark Time Gap - ARFF Moderate Risk

Table 65: Baseline to Benchmark Time Gap - ARFF Low Risk

(Low Risk - ARFF 90th Percentile Times Baseline Performance		Baseline	Benchmark	Gap
Alarm	Pick-up to Dispatch	Urban	n/a	01:00	*
Handling	I lek-up to Dispateli	Rural			**
Turnout	Turnout Time	Urban	n/a	01:30	*
Time	First Unit	Rural			**
	Travel Time First Unit Distribution	Urban	n/a	08:00	*
Travel		Rural			**
Time	Travel Time ERF Concentration	Urban	n/a	05:30	*
		Rural			**
	Total Response Time First Unit on Scene	Urban	n/a	03:00	*
		Urban	n=0		
Total	Distribution	Rural			**
Response Time	Total Response Time	Unban	n/a	08:00	*
Time	ERF	Urban	n=0		
	Concentration	Rural			**

*During critical tasking, the accreditation team identified two risk categories to be added under the ARFF risk class. Those risk categories are as follows:

- Maximum Risk ARFF Alert 3 (large aircraft with more than five souls on board).
- Low Risk ARFF Alert 1 (standby).

Since these are new risk categories, no data exists as these risk categories have yet to be programmed into computer-aided dispatch (CAD). This will occur because of this study and will be evaluated annually.

The ARFF unit does not have a mobile data computer (MDC) or an automatic vehicle locator (AVL), and data is not captured on this unit as this unit communicates directly with the Federal Aviation Administration (FAA) control tower during incidents. Therefore, the unit does not receive time stamps as it does not communicate with the regional communications center and does not have the technology installed on it to create time stamps in the data set. The resolution to this issue is addressed in the recommendations portion of this document.

**In the ARFF class it will be noticed that there is no 'Rural' reflected. The reason for this is that all ARFF metrics are based on incidents that occur at or near the Prescott Regional Airport, Ernest A. Love Field.

ARFF Baseline Statements

For 90 percent of all maximum risk ARFF incidents (Alert 3 Large Aircraft Crash with five or more souls on board), the total response time for the arrival of the first-due unit staffed with one ARFF engineer in the ARFF unit is N/A due to the maximum risk ARFF being a new risk class, there are no 'N' values at this time, and no ability to time stamp the ARFF unit at this time. The first due unit, according to FAA policy, shall be the ARFF unit within 3 minutes. The first-due unit shall be capable of size up, incident command, communications with the FAA tower, and initial stabilization of the incident.

For 90 percent of all maximum risk ARFF incidents (Alert 3 Large Aircraft Crash with five or more souls on board), the total response time for the arrival of the ERF consisting of eight engines staffed with sixteen firefighters and eight officers, two third-party ambulances/CAFMA rescues staffed with four personnel, one ARFF unit staffed with one engineer, two battalion chiefs, and one safety officer is N/A due to maximum risk ARFF being a new risk class, there are no 'N' values at this time, and no ability to time stamp the ARFF unit at this time. The first due unit, according to FAA policy, shall be the ARFF unit within 3 minutes. The ERF shall be capable of size up, incident command, fire control on the exterior of the aircraft, rescue, triage, initiation of patient care, fire control interior/exterior, patient assessment/treatment, pump operations, water supply, backup lines, treatment and transport, establishing operations, establishing safety, establishing a treatment/transport group, and transfer and continuance of incident command.

For 90 percent of all high risk ARFF incidents (Alert 3 Small Aircraft Crash with less than four souls on board), the total response time for the arrival of the first-due unit staffed with one ARFF engineer in the ARFF unit is N/A due to no ability to time stamp the ARFF unit at this time. The first due unit, according to FAA policy, shall be the ARFF unit within 3 minutes. The first due unit shall be capable of size up, incident command, communications with the FAA tower, and initial stabilization of the incident.

For 90 percent of all high risk ARFF incidents (Alert 3 Small Aircraft Crash with less than four souls on board), the total response time for the arrival of the ERF consisting of four engines staffed with eight firefighters and four officers, one third-party ambulance/CAFMA rescue staffed with two personnel, one ARFF unit staffed with one engineer, and one battalion chief is N/A due to no ability to time stamp the ARFF unit at this time. The first due unit, according to FAA policy, shall be the ARFF unit within 3 minutes. The ERF shall be capable of size up, incident command, fire control on the exterior of the aircraft, rescue, triage, initiation of patient care, fire control interior/exterior, patient assessment/treatment, pump operations, water supply, backup lines, treatment and transport, and transfer and continuance of incident command.

For 90 percent of all moderate risk ARFF incidents (Alert 2 In Air Emergency), the total response time for the arrival of the first-due unit staffed with one ARFF engineer in the ARFF unit is N/A due to no ability to time stamp the ARFF unit at this time. The first due unit, according to FAA policy, shall be the ARFF unit within 3

minutes. The first-due unit shall be capable of size up, incident command, communications with the FAA tower, and initial stabilization of the incident.

For 90 percent of all moderate risk ARFF incidents (Alert 2 In Air Emergency), the total response time for the arrival of the ERF consisting of three engines staffed with six firefighters and three officers, one ARFF unit staffed with one engineer, and one battalion chief is N/A due to no ability to time stamp the ARFF unit at this time. The first due unit, according to FAA policy, shall be the ARFF unit within 3 minutes. The ERF shall be capable of size up, incident command, evacuation and rescue, fire control on the exterior of the aircraft, patient assessment/treatment, fire control on the interior of the aircraft, pump operations, water supply, and transfer and continuance of command.

For 90 percent of all low risk ARFF incidents (Alert 1 Standby), the total response time for the arrival of the first-due unit staffed with one ARFF engineer in the ARFF unit is N/A due to no ability to time stamp the ARFF unit at this time. The first due unit, according to FAA policy, shall be the ARFF unit within 3 minutes. The first-due unit shall be capable of size up, incident command, communications with the FAA tower, and initial stabilization of the incident.

For 90 percent of all low risk ARFF incidents (Alert 1 Standby), the total response time for the arrival of the effective response force (ERF) consisting of one engine staffed with two firefighters and one officer, and one ARFF unit staffed with one engineer is N/A due to low risk ARFF being a new risk class. There are no 'N' values currently and no ability to time stamp the ARFF unit at this time. The first due unit, according to FAA policy, shall be the ARFF unit within 3 minutes. The ERF shall be capable of size up, incident command, communications with the FAA tower, and staging the ARFF unit in an appropriate location.

Emergency Medical Services Baseline to Benchmark Time Gap

Table 66: Baseline to Benchmark Time Gap - EMS High Risk

	High Risk - EMS 90th Percentile Times Baseline Performance		Baseline	Benchmark	Gap
Alarm	Pick-up to Dispatch	Urban	01:53	01:00	over 00:53
Handling	Fick-up to Dispatch	Rural	02:22	01:00	over 01:22
Turnout		Urban	01:43	01:30	over 00:13
Time		Rural	01:41	01:30	over 00:11
	Travel Time First Unit Travel Distribution	Urban	08:46	05:30	over 03:16
Travel		Rural	12:36	11:30	over 01:06
Time	Travel Time ERF Concentration	Urban	16:31	10:30	over 06:01
		Rural	22:30	16:30	over 06:00
	Total Response Time	Urban	11:12	08:00	over 03:12
		Urban	n=726		
	First Unit on Scene Distribution		16:23	14:00	over 02:23
Total	2100100000	Rural	n=323		
Response Time		Urban	22:59	13:00	over 09:59
	Total Response Time	Urban	n=143		
	ERF Concentration	Dunal	30:34	19:00	over 11:34
	Concenti ation	Rural	n=56		

Table 67: Baseline to Benchmark Time Gap - EMS Modified High Risk

9	odified High Risk - EMS 90th Percentile Times Baseline Performance		Baseline	Benchmark	Gap
Alarm Handling	Pick-up to Dispatch	Urban	02:16	01:00	over 01:16
	Fick-up to Dispatch	Rural	02:09	01:00	over 01:09
Turnout	Turnout Time	Urban	01:52	01:30	over 00:22
Time	First Unit	Rural	01:47	01:30	over 00:17
	Travel Time First Unit Travel Distribution	Urban	09:21	05:30	over 03:51
Travel		Rural	14:04	11:30	over 02:34
Time	Travel Time ERF	Urban	13:59	05:30	over 08:29
	Concentration	Rural	21:01	11:30	over 09:31
	Total Response Time	Urban	12:33	08:00	over 04:33
			n=1948		
	First Unit on Scene Distribution		16:42	14:00	over 02:42
Total	2100110401011	Rural	n=514		
Response Time	_	Urban	19:35	09:00	over 10:35
	Total Response Time ERF	orban	n=923		
	Concentration	Rural	26:18	15:00	over 11:18
	Concentration	Rui al	n=274		

Table 68: Baseline to Benchmark Time Gap - EMS Moderate Risk

Moderate Risk - EMS	Baseline	Benchmark	Gap
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	90th Percentile Times Baseline Performance				
Alarm	Pick-up to Dispatch	Urban	02:01	01:00	over 01:01
Handling	Fick-up to Dispatch	Rural	02:06	01:00	over 01:06
Turnout	Turnout Time	Urban	01:53	01:30	over 00:23
Time	First Unit	Rural	01:46	01:30	over 00:16
	Travel Time First Unit	Urban	09:10	05:30	over 03:40
Travel	Distribution	Rural	12:26	11:30	over 00:56
Time	Travel Time ERF	Urban	13:01	05:30	over 07:31
	Concentration	Rural	19:13	11:30	over 07:43
		Urban	12:01	08:00	over 04:01
	Total Response Time First Unit on Scene	UIDall	n=41331		
	Distribution	Rural	15:19	14:00	over 01:19
Total	21001100000	Kulai	n=10623		
Response Time	_	Urban	16:39	08:00	over 08:39
Time	Total Response Time ERF	Urban	n=33875		
	Concentration	Dural	22:50	14:00	over 08:50
	Concentration	Rural	n=8422		

Table 69: Baseline to Benchmark Time Gap - EMS Low Risk

	Low Risk - EMS 90th Percentile Times Baseline Performance		Baseline	Benchmark	Gap
Alarm	Pick-up to Dispatch	Urban	03:15	01:00	over 02:15
Handling	Pick-up to Dispatch	Rural	02:39	01:00	over 01:39
Turnout	Turnout Time	Urban	01:58	01:30	over 00:28
Time	First Unit	Rural	01:35	01:30	over 00:05
Travel	Travel Time First Unit Distribution	Urban	11:31	05:30	over 06:01
Time		Rural	11:48	11:30	over 00:18
	_	Urban	15:23	08:00	over 07:23
Total	Total Response Time First Unit on Scene Distribution	Urban	n=54		
Response Time			13:45	14:00	under 00:15
Time		Rural	n=10		

During critical tasking, the accreditation team identified two risk categories to be added under the EMS risk class. This risk category is as follows:

- Maximum Risk EMS (mass casualty)
- Modified HighRisk EMS

Since maximum risk EMS is a new risk category, no data exists, as this risk category has yet to be programmed into computer-aided dispatch (CAD). This will occur because of this study and will be evaluated annually. However, data does exist under the modified high-risk EMS and is represented in the tables above.

EMS Baseline Statements

For 90 percent of all maximum risk EMS responses, the total response time for the arrival of the first due unit, staffed with two firefighters and one officer, of whom at least one will be a paramedic, is N/A due to maximum risk EMS being a new risk class, there are no 'N' values at this time. The first due unit shall be capable of assessing scene safety and establishing command, size up of the situation, conducting an initial patient assessment, obtaining vitals and patient's medical history, initiating mitigation efforts within one minute of arrival, providing advanced life support care and basic life support care, including automatic external defibrillation (AED) if needed, and assisting transport personnel with packaging the patient.

For 90 percent of all maximum risk EMS response incidents, the total response time for the arrival of the effective response force (ERF) consisting of three engines staffed with six firefighters and three officers, two third-party provider ambulances or CAFMA rescue units with four personnel, and one battalion chief is N/A due to maximum risk EMS being a new risk class, there are no 'N' values at this time. The ERF shall be capable of providing incident command, related documentation, appointing a site safety officer, landing helicopter(s), providing extrication/disentanglement, completing patient assessment on multiple patients, providing appropriate treatment/transport, performing AED if needed, initiating cardiopulmonary resuscitation (CPR) if needed, and providing intravenous (IV) access-medication administration. This maximum risk category is designed for mass casualty incident types.

For 90 percent of all high-risk EMS responses, the total response time for the arrival of the first-due unit, staffed with two firefighters and one officer, of whom at least one will be a paramedic, is 16 minutes and 23 seconds in the urban planning zones and 16 minutes and 22 seconds in the rural planning zones. The first-due unit shall be capable of assessing scene safety and establishing command, size up of the situation, conducting an initial patient assessment, obtaining vitals and the patient's medical history, initiating mitigation efforts within one minute of arrival, providing advanced life support care and basic life support care, including automatic external defibrillation (AED) if needed, and assisting transport personnel with packaging the patient.

For 90 percent of allhigh-risk EMS response incidents, the total response time for the arrival of the effective response force (ERF) consisting of two engines staffed with four firefighters and two officers, two third-party provider ambulances or CAFMA rescue units staffed with four personnel, and one battalion chief is 22 minutes and 59 seconds in the urban planning zones and 30 minutes and 34 seconds in the rural planning zones. The ERF shall be capable of providing incident command, and related documentation, appointing a site safety officer, landing helicopter (s), providing extrication/disentanglement, completing a comprehensive patient assessment on multiple patients, providing appropriate treatment/transport, performing AED if needed, initiating cardiopulmonary resuscitation (CPR) if needed, and providing intravenous (IV) access-medication administration.

For 90 percent of all modified high risk EMS responses, the total response time for the arrival of the first-due unit, staffed with two firefighters and one officer, of whom at least one will be a paramedic, is 12 minutes and 33 seconds in the urban planning zones and 16 minutes and 22 seconds in the rural planning zones. The first-due unit shall be capable of assessing scene safety and establishing command, size up of the situation, conducting an initial patient assessment, obtaining vitals and the patient's medical history, initiating mitigation efforts within one minute of arrival, providing advanced life support care and basic life support care, including automatic external defibrillation (AED) if needed, and assisting transport personnel with packaging the patient.

For 90 percent of all modified high risk EMS response incidents, the total response time for the arrival of the effective response force (ERF) consisting of one engine staffed with two firefighters and one officer, an ambulance/rescue staffed with two personnel, and one battalion chief shall be 19 minutes and 35 seconds in

urban planning zones and 26 minutes and 18 seconds in rural planning zones. The ERF shall be capable of providing incident command, producing related documentation, appointing a site safety officer, completing a comprehensive patient assessment, providing appropriate treatment/transport, performing AED if needed, initiating cardiopulmonary resuscitation (CPR) if needed, providing intravenous (IV) access and administration, and landing medical helicopter(s).

For 90 percent of all moderate risk EMS responses, the total response time for the arrival of the first-due unit, staffed with two firefighters and one officer, of whom at least one will be a paramedic, is 12 minutes and 01 second in the urban planning zones and 15 minutes and 19 seconds in the rural planning zones. The first-due unit shall be capable of assessing scene safety and establishing command, size up of the situation, conducting an initial patient assessment, obtaining vitals and the patient's medical history, initiating mitigation efforts within one minute of arrival, providing advanced life support care and basic life support care, including automatic external defibrillation (AED) if needed, and assisting transport personnel with packaging the patient.

For 90 percent of all moderate risk EMS response incidents, the total response time for the arrival of the effective response force (ERF) consisting of one engine staffed with two firefighters and one officer, and an ambulance/rescue staffed with two personnel is 16 minutes and 39 seconds in urban planning zones and 22 minutes and 50 seconds in the rural planning zones. The ERF shall be capable of providing incident command, producing related documentation, appointing a site safety officer, completing a comprehensive patient assessment, providing appropriate treatment/transport, performing AED if needed, initiating cardiopulmonary resuscitation (CPR) if needed, and providing intravenous (IV) access-medication administration.

For 90 percent of all low-risk EMS responses, the total response time for the arrival of the first-due unit, staffed with two firefighters and one officer, of whom at least one will be a paramedic, is 15 minutes and 23 seconds in the urban planning zones and 13 minutes and 45 seconds in the rural planning zones. The first-due unit shall be capable of assessing scene safety and establishing command, size up of the situation, conducting an initial patient assessment, obtaining vitals and the patient's medical history, initiating mitigation efforts within one minute of arrival, providing advanced life support care and basic life support care, including automatic external defibrillation (AED) if needed, and assisting transport personnel with packaging the patient.

Fire Suppression Baseline to Benchmark Time Gap

Table 70: Baseline to Benchmark Time Gap - Fire Suppression High Risk

	High Risk - Fire 90th Percentile Times 3aseline Performance	•	Baseline	Benchmark	Gap
Alarm	Pick-up to Dispatch	Urban	02:16	01:00	over 01:16
Handling	I lek-up to Dispateli	Rural	02:09	01:00	over 01:09
Turnout	Turnout Time	Urban	01:52	01:30	over 00:22
Time	First Unit	Rural	01:47	01:30	over 00:17
	Travel Time First Unit	Urban	09:21	05:30	over 03:51
Travel	Distribution	Rural	14:04	11:30	over 02:34
Time	Travel Time ERF	Urban	13:59	05:30	over 08:29
	Concentration	Rural	21:01	11:30	over 09:31
	Total Response Time	Urban	12:33	08:00	over 04:33
		UIDali	n=1948		
	First Unit on Scene Distribution	Rural	16:42	14:00	over 02:42
Total		Kulai	n=514		
Response Time		Urban	19:35	13:00	over 06:35
THIC	Total Response Time	orban	n=923		
	ERF Concentration	Dunal	26:18	19:00	over 07:18
	Concentration	Rural	n=274		

ç	Moderate Risk - Fire Ooth Percentile Times Baseline Performance		Baseline	Benchmark	Gap
Alarm	Pick-up to Dispatch	Urban	02:12	01:00	over 01:12
Handling	I lek-up to Dispateii	Rural	02:27	01:00	over 01:27
Turnout	Turnout Time	Urban	01:45	01:30	over 00:15
Time	First Unit	Rural	01:58	01:30	over 00:28
	Travel Time First Unit	Urban	09:42	05:30	over 04:12
Travel	Distribution	Rural	10:32	11:30	under 00:58
Time	Travel Time ERF Concentration	Urban	12:32	10:30	over 02:02
		Rural	16:38	16:30	over 00:08
	Total Response Time	Unhan	12:50	08:00	over 04:50
		Urban	n=204		
	First Unit on Scene Distribution	Durral	13:33	14:00	under 00:27
Total	Distribution	Rural	n=85		
Response Time		Unhan	16:01	13:00	over 03:01
Time	Total Response Time	Urban	n=126		
	ERF Concentration	Durral	20:44	19:00	over 01:44
	Concentration	Rural	n=58		

Table 71: Baseline to Benchmark Time Gap - Fire Suppression Moderate Risk

Table 72: Baseline to Benchmark Time Gap - Fire Suppression Low Risk

Ģ	Low Risk - Fire 90th Percentile Times 3aseline Performance	1	Baseline	Benchmark	Gap
Alarm		Urban	02:45	01:00	over 01:45
Handling	Pick-up to Dispatch	Rural	03:14	01:00	over 02:14
Turnout	Turnout Time	Urban	01:36	01:30	over 00:06
Time	First Unit	Rural	01:55	01:30	over 00:25
Travel	Travel Time First Unit Distribution	Urban	11:52	05:30	over 06:22
Time		Rural	14:40	11:30	over 03:10
		Urbon	14:48	08:00	over 06:48
Total Response Time	Total Response Time First Unit on Scene Distribution	Urban	n=39		
		Derest	19:19	14:00	over 05:19
		Rural	n=25		

During critical tasking, the accreditation team identified one risk category to be added under the fire risk class. This risk category is as follows:

• Maximum Risk Fire (Commercial)

It was determined that the agencies were sending too few resources to this incident type.

Since maximum risk fire suppression is a new risk category, no data exists as this risk category has yet to be programmed into computer-aided dispatch (CAD). This will occur because of this study and will be evaluated annually.

Fire Suppression Baseline Statements

For 90 percent of all maximum risk fire suppression incidents, the total response time for the arrival of the first due unit, staffed with two firefighters and one officer, is N/A due to maximum risk fire suppression being a new risk class, there are no 'N' values at this time. The first due unit shall be capable of providing 500 gallons of water and 1,500 gallons per minute (gpm) pumping capacity, initiating command, requesting additional resources, establishing and advancing an attack line flowing a minimum of 150 gpm, establishing an uninterrupted water supply, and containing the fire. These operations shall be done in accordance with departmental standard operating procedures while providing for the safety of responders and the public.

For 90 percent of all maximum risk fire suppression incidents, the total response time for the arrival of the effective response force (ERF) consisting of six engines staffed with twelve firefighters and six officers, two ladders staffed with four firefighters and two officers, two battalion chiefs, and one safety officer is N/A due to maximum risk fire suppression being a new risk class, there are no 'N' values at this time. The ERF shall be capable of establishing command, size up, incident command, fire control, multiple water supplies, rapid intervention crew(s), primary all clear, backup lines, ventilation, transfer and continuance of incident command, safety, exposure protection, ladder operations, operations, evacuations, search, and rescue.

For 90 percent of all high-risk fire suppression incidents, the total response time for the arrival of the first due unit, staffed with two firefighters and one officer, is 12 minutes and 33 seconds in the urban planning zones and 16 minutes and 42 seconds in the rural planning zones. The first due unit shall be capable of providing 500 gallons of water and 1,500 gallons per minute (gpm) pumping capacity, initiating command, requesting additional resources, establishing and advancing an attack line flowing a minimum of 150 gpm, establishing an uninterrupted water supply, and containing the fire. These operations shall be done in accordance with departmental standard operating procedures while providing for the safety of responders and the public.

For 90 percent of all high-risk fire suppression incidents, the total response time for the arrival of the effective response force (ERF) consisting of four engines staffed with eight firefighters and four officers, and one battalion chief is 19 minutes and 35 seconds in the urban planning zones and 26 minutes and 18 seconds in the rural planning zones. The ERF shall be capable of establishing command, providing an uninterrupted water supply, advancing an attack line and a backup line for fire control, complying with the Occupational Safety and Health Administration (OSHA) requirements of two in-two out, completing forcible entry, searching and rescuing at-risk victims, ventilating the structure, controlling utilities, and performing salvage and overhaul.

For 90 percent of all moderate risk fire suppression incidents, the total response time for the arrival of the first due unit, staffed with two firefighters and one officer, is 12 minutes and 50 seconds in the urban planning zones and 13 minutes and 33 seconds in the rural planning zones. The first due unit shall be capable of providing 500 gallons of water and 1,500 gallons per minute (gpm) pumping capacity, initiating

command, requesting additional resources, establishing and advancing an attack line flowing a minimum of 150 gpm, establishing an uninterrupted water supply, and containing the fire. These operations shall be done in accordance with departmental standard operating procedures while providing for the safety of responders and the public. For 90 percent of all moderate risk fire suppression incidents, the total response time for the arrival of the effective response force (ERF) consisting of one engine staffed with two firefighters and one officer, and one battalion chief, is 16 minutes and 1 second in the urban planning zones and 20 minutes and 44 seconds in the rural planning zones. The ERF shall be capable of establishing command, providing an uninterrupted water supply, advancing an attack line for fire extinguishment, and transferring and continuing incident command. These operations shall be done in accordance with departmental standard operating procedures while providing for the safety of responders and the public.

For 90 percent of all low-risk fire suppression incidents, the total response time for the arrival of the first due unit, staffed with two firefighters and one officer, is 14 minutes and 48 seconds in the urban planning zones and 19 minutes and 19 seconds in the rural planning zones. The first due unit shall be capable of providing 500 gallons of water and 1,500 gallons per minute (gpm) pumping capacity, initiating command, requesting additional resources, establishing and advancing an attack line flowing a minimum of 150 gpm, establishing an uninterrupted water supply, and containing the fire. These operations shall be done in accordance with departmental standard operating procedures while providing for the safety of responders and the public.

Hazardous MaterialsBaseline to Benchmark Time Gap

Table 73: Baseline to Benchmark Time Gap - Hazardous Materials High Risk

High Risk – Hazardous Materials 90th Percentile Times Baseline Performance		Baseline	Benchmark	Gap	
Alarm	Pick-up to Dispatch	Urban	n/a	01:00	*
Handling	Fick-up to Dispatch	Rural	n/a	01:00	*
Turnout	Turnout Time	Urban	n/a	01:30	*
Time	First Unit	Rural	n/a	01:30	*
	Travel Time First Unit	Urban	n/a	05:30	*
Travel	Distribution	Rural	n/a	14:00	*
Time	Travel Time ERF Concentration	Urban	n/a	15:30	*
		Rural	n/a	21:30	*
		Urban	n/a	08:00	*
	Total Response Time First Unit on Scene	UIDall	n=0		*
	Distribution	Rural	n/a	14:00	*
Total Bosponso		Kulai	n=0		*
Response Time		Urban	n/a	18:00	*
	Total Response Time ERF	UIDall	n=0		*
	Concentration	Rural	n/a	24:00	*
	Ru	Rulai	n=0		*

Table 74: Baseline to Benchmark Time Gap - Hazardous Materials Moderate Risk

Moderate Risk - Hazardous Materials 90th Percentile Times Baseline Performance		Baseline	Benchmark	Gap	
Alarm	Pick-up to Dispatch	Urban	03:31	01:00	over 02:31
Handling	I lek-up to Dispatei	Rural	03:01	01:00	over 02:01
Turnout	Turnout Time	Urban	02:08	01:30	over 00:38
Time	First Unit	Rural	02:22	01:30	over 00:52
	Travel Time First Unit	Urban	11:59	05:30	over 06:29
Travel	Distribution	Rural	13:08	11:30	over 01:38
Time	Travel Time ERF	Urban	19:36	10:30	over 09:06
	Concentration	Rural	18:51	16:30	over 02:21
		Urban	14:52	08:00	over 06:52
	Total Response Time	Urban	n=193		
	First Unit on Scene Distribution	Rural	16:59	14:00	over 02:59
Total	2100110401011	Kurai	n=47		
Response Time		Urban	25:38	13:00	over 12:38
	Total Response Time ERF	orban	n=146		
	Concentration	Durral	28:56	19:00	over 09:56
	concentration	Rural	n=20		

75: basenne to benchmark Time Gap - Hazardous Materiais Low Risk							
	Low Risk - Hazardous Materials 90th Percentile Times Baseline Performance		Baseline	Benchmark	Gap		
Alarm	Pick-up to Dispatch	Urban	03:31	01:00	over 02:31		
Handling	Tiek up to Disputei	Rural	03:34	01:00	over 02:34		
Turnout	Turnout Time	Urban	02:08	01:30	over 00:38		
Time	First Unit	Rural	01:47	01:30	over 00:17		
Travel	Travel Time First Unit Distribution	Urban	12:26	05:30	over 06:56		
Time		Rural	13:20	11:30	over 01:50		
		Urban	15:50	08:00	over 07:50		
Total	Total Response Time First Unit on Scene Distribution	UIDall	n=483				
Response Time			17:31	14:00	over 03:31		
THIC		Rural	n=138				

Table 75: Baseline to Benchmark Time Gap - Hazardous Materials Low Risk

During critical tasking, the accreditation team identified one risk category to be added under the hazardous materials risk class. This risk category is as follows:

• High Risk Hazardous Materials.

It was determined that the agencies were sending too few resources to this incident type. Since this is a new risk category, no data exists as this risk category has yet to be programmed into computer-aided dispatch (CAD). This will occur because of this study and will be evaluated annually.

Hazardous Materials Baseline Statements

For 90 percent of all high-risk hazardous materials incidents, the total response time for the arrival of the first-due unit, staffed with two firefighters and one officer is N/A due to high-risk hazardous materials being a new risk class. There are no 'N' values currently. The first due unit shall be capable of size up, incident command, safety, investigation, and hazard control.

For 90 percent of all high-risk hazardous materials incidents, the total response time for the arrival of the ERF consisting of four engines staffed with eight firefighters and four officers, one hazardous materials unit cross-staffed, one battalion chief, and callout of the hazardous materials team members, is N/A due to high-risk hazardous materials being a new risk class. There are no 'N' values at this time. The ERF shall be capable of size up, incident command, establishment of a perimeter, denial of entry, public protection, identification/research of the hazardous condition, establishing a hazardous materials group supervisor, establishing a safety officer, establishing an entry and backup team, decontamination, and continuance of incident command. It is important to note that the hazardous materials team members coming in off-duty are not part of the ERF. The ERF consists of the number of qualified members and resources needed to begin to stabilize the incident.

For 90 percent of all moderate risk hazardous materials incidents, the total response time for the arrival of the first-due unit, staffed with two firefighters and one officer, is 14 minutes and 52 seconds in the urban planning zones and 16 minutes and 59 seconds in the rural planning zones. The first-due unit shall be capable of size up, incident command, safety, investigation, and hazard control.

For 90 percent of all moderate risk hazardous materials incidents, the total response time for the arrival of the ERF consisting of two engines staffed with four firefighters and two officers, and one battalion chief, is 25 minutes and 38 seconds in the urban planning zones and 28 minutes and 56 seconds in the rural planning

zones. The ERF shall be capable of size up, incident command, establishment of a perimeter, denial of entry, public protection, identification of the hazardous material, controlling the hazard, and continuance of incident command.

For 90 percent of all low-risk hazardous materials incidents, the total response time for the arrival of the first-due unit, staffed with two firefighters and one officer, is 15 minutes and 50 seconds in the urban planning zones and 17 minutes and 31 seconds in the rural planning zones. The first-due unit shall be capable of size up, incident command, safety, investigation, and hazard control.

Technical Rescue Baseline to Benchmark Time Gap

Table 76: Baseline to Benchmark Time Gap - Technical Rescue High Risk

Hig	High Risk -Technical Rescue 90th Percentile Times Baseline Performance		Baseline	Benchmark	Gap
Alarm	Pick-up to Dispatch	Urban	05:14	01:00	over 04:14
Handling	I lek-up to Dispateii	Rural	n/a	01:00	
Turnout	Turnout Time	Urban	02:09	01:30	over 00:39
Time	First Unit	Rural	n/a	01:30	
	Travel Time First Unit	Urban	18:46	05:30	over 13:16
Travel	Distribution	Rural	n/a	14:00	
Time	Travel Time ERF	Urban	00:00	15:30	
	Concentration	Rural	n/a	21:30	
	Total Response Time	Urban	26:27	08:00	over 18:27
		UIDall	n=23		
	First Unit on Scene Distribution	Rural	n/a	14:00	
Total	210011000000	Kurai	n=3		
Response Time		Urban	n/a	18:00	
	Total Response Time ERF	orban	n=0		
	Concentration	Rural	n/a	24:00	
		Kulai	n=0		

Table 77: Baseline to Benchmark Time Gap - Technical Rescue Moderate Risk

Moderate Risk -Technical Rescue 90th Percentile Times Baseline Performance		Baseline	Benchmark	Gap	
Alarm	Pick-up to Dispatch	Urban	05:01	01:00	over 04:01
Handling	Fick-up to Dispatch	Rural	05:24	01:00	over 04:24
Turnout	Turnout Time	Urban	01:53	01:30	over 00:23
Time	First Unit	Rural	02:28	01:30	over 00:58
	Travel Time First Unit	Urban	18:31	05:30	over 13:01
Travel	Distribution	Rural	21:04	11:30	over 09:34
Time	Travel Time ERF	Urban	24:35	10:30	over 14:05
	Concentration	Rural	23:09	16:30	over 06:39
		Urban	23:59	08:00	over 15:59
	Total Response Time	Urban	n=95		
	First Unit on Scene Distribution	Rural	25:29	14:00	over 11:29
Total	2100110401011	Kurai	n=11		
Response Time		Urban	30:01	13:00	over 17:01
	Total Response Time	orban	n=66		
	ERF Concentration	Rural	n/a	19:00	
	Concentration	Kulai	n=2		

Low Risk -Technical Rescue 90th Percentile Times Baseline Performance		Baseline	Benchmark	Gap	
Alarm	Pick-up to Dispatch	Urban	n/a	01:00	*
Handling	I lek-up to Dispateii	Rural	n/a	01:00	*
Turnout	Turnout Time	Urban	n/a	01:30	*
Time	First Unit	Rural	n/a	01:30	*
	Travel Time First Unit	Urban	n/a	05:30	*
Travel	Distribution	Rural	n/a	14:00	*
Time	Travel Time ERF Concentration	Urban	n/a	05:30	*
		Rural	n/a	11:30	*
		Urban	n/a	08:00	*
	Total Response Time First Unit on Scene	UIDall	n=0		*
	Distribution	Rural	n/a	14:00	*
Total Bosponso		Kulai	n=0		*
Response Time		Urban	n/a	08:00	*
Time	Total Response Time	UIDall	n=0		*
	ERF Concentration	Rural	n/a	14:00	*
		Kulal	n=0		*

Table 78: Baseline to Benchmark Time Gap - Technical Rescue Low Risk

During critical tasking, the accreditation team identified one risk category to be added under the Technical Rescue risk class. This risk category is as follows:

• Low Risk Technical Rescue.

It was determined that the agencies were sending too many resources to these types of incidents. Since this is a new risk category, no data exists as this risk category has yet to be programmed into computer-aided dispatch (CAD). This will occur because of this study and will be evaluated annually.

Technical Rescue Baseline Statements

For 90 percent of all high-risk technical rescue incidents, the total response time for the arrival of the firstdue unit, staffed with two firefighters and one officer, is 26 minutes and 27 seconds in the urban planning zones and N/A in the rural planning zones as the N number is below zero. The first-due unit shall be capable of establishing command, sizing up to determine if a technical rescue response is required, requesting additional resources, and providing advanced life support to any victim without endangering response personnel.

For 90 percent of all high-risk technical rescue incidents, the total response time for the arrival of the ERF consisting of four engines staffed with eight firefighters and four officers, one cross-staffed support unit, one battalion chief, and callout of the technical rescue team members is N/A as there are insufficient incidents to create reliable data. The incident count was below 10. The ERF shall be capable of technical level response, appointing a site safety officer, establishing patient contact, staging and apparatus placement and set-up, providing technical expertise, knowledge, skills, and abilities during technical rescue incidents, and providing advanced life medical support. Safety for rope, swift water, structural collapse, confined space, and trench rescue shall be in place. It is important to note that the technical rescue team members coming in off-

duty are not part of the ERF. The ERF consists of the number of qualified members and resources needed to begin to stabilize the incident.

For 90 percent of all moderate risk technical rescue incidents, the total response time for the arrival of the first-due unit, staffed with two firefighters and one officer, is 23 minutes and 59 seconds in the urban planning zones and 25 minutes and 29 seconds in the rural planning zones. The first-due unit shall be capable of establishing command, sizing up to determine if a technical rescue response is required, requesting additional resources, and providing advanced life support to any victim without endangering response personnel.

For 90 percent of all moderate risk technical rescue incidents, the total response time for the arrival of the ERF consisting of two engines staffed with four firefighters and two officers, one cross-staffed support unit, and one battalion chief is 30 minutes and 1 second in the urban planning zones and N/A in the rural planning zones as there is insufficient incidents to create reliable data. The incident count was below 10. The ERF shall be capable of technical level response, appointing a site safety officer, establishing patient contact, staging and apparatus placement and set-up, providing technical expertise, knowledge, skills, and abilities during technical rescue incidents, and providing advanced life medical support.

For 90 percent of all low-risk technical rescue incidents, the total response time for the arrival of the firstdue unit, staffed with two firefighters and one officer is N/A due to low risk ARFF being a new risk class, there are no 'N' values at this time. The first due unit shall be capable of establishing command, sizing up to determine if a technical rescue response is required, requesting additional resources, and providing advanced life support to any victim without endangering response personnel.

For 90 percent of all low-risk technical rescue incidents, the total response time for the arrival of the effective response force (ERF) consisting of one engine staffed with two firefighters and one officer, and one battalion chief is N/A due to low risk ARFF being a new risk class. There are no 'N' values currently. The ERF shall be capable of establishing command, sizing up to determine if a technical rescue response is required, requesting additional resources, and providing advanced life support to any victim without endangering response personnel.

Wildland Fire Suppression Baseline to Benchmark Time Gap

Table 79: Baseline to Benchmark Time Gap - Wildland Fire High Risk

High Risk -Wildland Fire 90th Percentile Times Baseline Performance		Baseline	Benchmark	Gap	
Alarm	Pick-up to Dispatch	Urban	02:56	01:00	over 01:56
Handling	Fick-up to Dispatch	Rural	02:44	01:00	over 01:44
Turnout	Turnout Time	Urban	01:55	01:30	over 00:25
Time	First Unit	Rural	02:03	01:30	over 00:33
	Travel Time First Unit	Urban	16:35	05:30	over 11:05
Travel	Distribution	Rural	16:55	11:30	over 05:25
Time	Travel Time ERF Concentration	Urban	00:00	15:30	
		Rural	21:30	21:30	over 00:00
	Total Response Time	Urban	20:32	08:00	over 12:32
		UIDall	n=58		
_	First Unit on Scene Distribution	Rural	19:53	14:00	over 05:53
Total		Kurai	n=81		
Response Time		Urban	n/a	18:00	
1 1110	Total Response Time	UIDall	n=0		
	ERF Concentration	Rural	n/a	24:00	
	Concentration	Ruial	n=3		

Table 80: Baseline to Benchmark Time Gap - Wildland Fire Moderate Risk

Moderate Risk -Wildland Fire 90th Percentile Times Baseline Performance			Baseline	Benchmark	Gap
Alarm Handling	Pick-up to Dispatch	Urban	03:14	01:00	over 02:14
		Rural	03:51	01:00	over 02:51
Turnout Time	Turnout Time First Unit	Urban	01:55	01:30	over 00:25
		Rural	01:56	01:30	over 00:26
Travel Time	Travel Time First Unit Distribution	Urban	11:56	05:30	over 06:26
		Rural	19:27	11:30	over 07:57
	Travel Time ERF	Urban	14:16	10:30	over 03:46
	Concentration	Rural	21:20	16:30	over 04:50
Total Response Time	Total Response Time First Unit on Scene Distribution	Urban	15:35	08:00	over 07:35
			n=72		
		Rural	23:38	14:00	over 09:38
			n=93		
	Total Response Time ERF Concentration	Urban	n/a	13:00	
			n=8		
		Rural	n/a	19:00	
			n=6		

Low Risk -Wildland Fire 90th Percentile Times Baseline Performance			Baseline	Benchmark	Gap
Alarm Handling	Pick-up to Dispatch	Urban	03:47	01:00	over 02:47
		Rural	04:28	01:00	over 03:28
Turnout Time	Turnout Time First Unit	Urban	01:51	01:30	over 00:21
		Rural	01:54	01:30	over 00:24
Travel Time	Travel Time First Unit Distribution	Urban	20:38	05:30	over 15:08
		Rural	12:13	14:00	under 01:47
Total Response Time	Total Response Time First Unit on Scene Distribution	Urban	25:04	08:00	over 17:04
			n=19		
		Rural	16:13	14:00	over 02:13
			n=17		

Table 81: Baseline to Benchmark Time Gap - Wildland Fire Low Risk

Wildland Suppression Baseline Statements

For 90 percent of all high-risk wildland fire suppression incidents, the total response time for the arrival of the first-due unit, staffed with two firefighters and one officer, is 20 minutes and 32 seconds in the urban planning zones and 19 minutes and 53 seconds in the rural planning zones. The first-due unit shall be capable of size up, incident command, pump operations, and fire control.

For 90 percent of all high-risk wildland fire suppression incidents, the total response time for the arrival of the ERF consisting of four engines staffed with eight firefighters and four officers, cross-staffed wildland brush units if needed, cross-staffed water tenders if needed, and one battalion chief is N/A as there is insufficient incidents to create reliable data. The incident count was below 10. The ERF shall be capable of size up, incident command, pump operations, water supply, fire attack with two lines, hand tool work, and transfer and continuance of incident command.

For 90 percent of all moderaterisk wildland fire suppression incidents, the total response time for the arrival of the first-due unit, staffed with two firefighters and one officer, is 15 minutes and 35 seconds in the urban planning zones and 23 minutes and 38 seconds in the rural planning zones. The first-due unit shall be capable of size up, incident command, pump operations, and fire control.

For 90 percent of all moderate risk wildland fire suppression incidents, the total response time for the arrival of the ERF consisting of two engines staffed with four firefighters and two officers, cross-staffed wildland brush units if needed, cross-staffed water tenders if needed, and one battalion chief is N/A as there are insufficient incidents to create reliable data. The incident count was below 10. The ERF shall be capable of size up, incident command, pump operations, water supply, fire attack, hand tool work, and transfer and continuance of command.

For 90 percent of all low-risk wildland fire suppression incidents, the total response time for the arrival of the first-due unit, staffed with two firefighters and one officer, is 25 minutes and 04 seconds in the urban planning zones and 16 minutes and 13 seconds in the rural planning zones. The first-due unit shall be capable of size up, incident command, pump operations, and fire control.

Community Areas for Program Delivery and Coverage Improvement

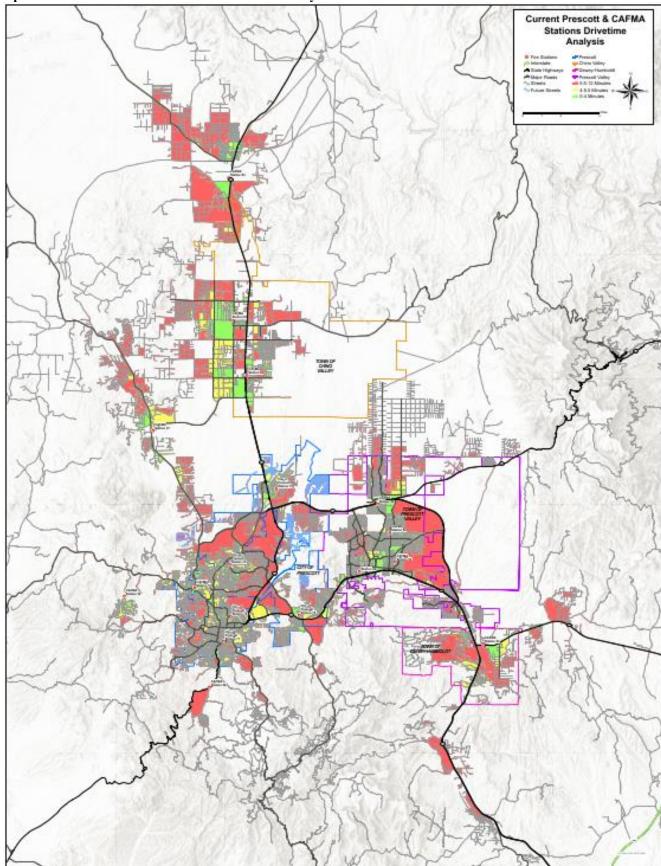
Drive time analysis is a method used to evaluate and optimize the response times of fire emergency services. This analysis involves examining the time it takes for fire engines or other emergency vehicles to reach various locations within a community after receiving an alarm. The intent is to ensure that resources are deployed effectively to minimize response times and improve overall public safety.

The key components of a drive time analysis include:

- 1. Geographic Information Systems (GIS): Tools to map out service areas, road networks, and potential obstacles.
- 2. Response Time Standards: Establishing benchmarks for acceptable response times based on local regulations or best practices.
- 3. Traffic Patterns: Considering factors such as peak traffic hours, road conditions, and potential delays.
- 4. Incident Data: Analyzing historical data on emergency calls to identify high-demand areas and patterns.
- 5. Resource Allocation: Determining the optimal placement of fire stations and resources to enhance coverage and minimize travel times.

By conducting a drive-time analysis, the agencies can make informed decisions about station locations, staffing levels, and deployment strategies, ultimately enhancing the effectiveness in responding to emergencies.

The following illustration reflects drive time analysis, whereas green is a 0–4-minute response, yellow is a 4-5.5 minute response, and red is 5.5-12 minutes with in the service area.



Map 31: Prescott and CAFMA Stations Drivetime Analysis

Recommendations for Improved Effectiveness in Deployment and Coverage

Recommendation #1

PFD and CAFMA's commitment to accreditation and transparent reporting for the purpose of continual quality improvement should be recognized through the formal adoption of the Community Risk Assessment and Standards of Cover (CRA/SOC) by each agency's governance to codify the agreement between the agencies and the citizens/visitors within the response area.

Recommendation #2

The agencies should share and explain the purpose of the CRA/SOC document with all members and key stakeholders, internal and external, to ensure that it is understood by all as the agencies move forward with this one-of-a-kind collaboration.

Recommendation #3

During this study, it is evidenced that the collaborative approach to system-wide needs has been widely successful. The agencies have worked closely in identifying future needs and efficiencies. The joint CRA/SOC and strategic plans reflect this. It is recommended that the agencies utilize this foundation to identify additional distribution points, if needed, across the system rather than individually.

Recommendation #4

The agencies should work with one data platform as designed during this study and continue to improve data analysis via computer-aided dispatch (CAD) data and identical records management software (RMS). In addition, this platform should have the capability of disseminating data individually for each organization for internal governance needs or requests.

Recommendation #5

The information technology departments within each agency should work in a collaborative environment, utilizing the same data policy adopted by the agencies and working as a committee to further analyze data and refine processes. Any recommendations shall be approved by the accreditation compliance committee.

Recommendation #6

Considering the joint CRA/SOC process between PFD and CAFMA, the agencies will be on the same compliance and re-accreditation cycle. It is recommended that the agencies align their strategic plans in the same manner. It is also recommended that the agencies collaborate up to and including strategic planning retreats, as these plans are built to align strategic plans system-wide versus individually.

Recommendation #7

Complete the intergovernmental agreement (IGA) between the agencies with addendums by the end of fiscal year 24/25. Once completed, the IGA should allow the agencies to work seamlessly on collaborative measures without having redundant IGAs for each measure. This will also reduce the amount of administrative effort on behalf of each agency and its governance.

Recommendation #8

Create joint committee/divisional/department collaboration between the agencies. During the study it was evidenced that some efforts are being accomplished individually. Currently, the command staff, training divisions, and administrations of each agency meet by committee on a regular schedule; however, this same practice can be disseminated to other divisions/departments between the agencies.

Recommendation #9

The maximum risk ARFF category was identified during the study. It was critical tasked as an Alert 3 Aircraft Down (large aircraft greater than five souls on board). There is currently no data for this risk category because it has yet to be programmed as a response dispatch incident type. All new risk categories identified in the study will need to be programmed into computer-aided dispatch (CAD), with the corresponding ERF being dispatched for that incident type.

Recommendation #10

The low risk ARFF category was identified during the study. It was critical tasked as an Alert 1 Standby. There is currently no data for this risk class because it has yet to be programmed as a response dispatch incident type. All new risk categories identified in the study will need to be programmed into computer-aided dispatch (CAD) with the corresponding ERF being dispatched for that incident type.

Recommendation #11

The maximum risk EMS category was identified during the study. It was critical tasked as a maximum risk mass casualty incident type. There is currently no data for this risk class because it has yet to be programmed as a response dispatch incident type. All new risk categories identified in the study will need to be programmed into computer-aided dispatch (CAD) with the corresponding ERF being dispatched for that incident type.

Recommendation #12

The high-riskhazardousmaterials category was identified during the study. It was critical tasked as a Level III HazMat incident type. There is currently no data for this risk class because it has yet to be programmed as a response dispatch incident type. All new risk categories identified in the study will need to be programmed into computer-aided dispatch (CAD) with the corresponding ERF being dispatched for that incident type.

Recommendation #13

The low-risktechnical rescue category was identified during the study. It was critical tasked as a Level I TRT incident type. There is currently no data for this risk class because it has yet to be programmed as a response dispatch incident type. All new risk categories identified in the study will need to be programmed into computer-aided dispatch (CAD) with the corresponding ERF being dispatched for that incident type.

Recommendation #14

The maximum risk fire suppression category was identified during the study. It was critically tasked as a commercial structure fire incident type. There is currently no data for this risk class because it has yet to be programmed as a response dispatch incident type. All new risk categories identified in the study will need to be programmed into computer-aided dispatch (CAD) with the corresponding ERF being dispatched for that incident type.

Recommendation #15

Data dashboards and interactive mapping were discussed at length during the study. The utilization of technology in the form of screens in each facility that showed these dashboards running live might lend valuable information to responders and affect cultural change in response.

Recommendation #16

Data analysis and benchmarking analysis will need to be ongoing to refine these measures in the future.

Recommendation #17

It was noted during the study that significant disparity in pickup-to-dispatch times exists across all risk categories. Factors like the programming of CAD, training, and more effective technology should be analyzed, which may have a significant impact on total response time. It was noted in the study that pickup-to-dispatch times are largely extended, which affects the overall total response time.

Recommendation #18

It was noted during the study that some disparity exists in turnout time. Factors like station alerting, countdown timers, station design, culture, and training should be analyzed which may have an impact on total response time.

Recommendation #19

It was noted during the study that travel time first unit distribution and travel time ERF concentration are over the benchmark in all risk categories. This reflects distribution, call volume, call concurrency, unit hour utilization, and should be analyzed system-wide for more effective response.

Recommendation #20

The ARFF unit does not have a vehicle location device installed or any type of mobile data computer (MDC) that would provide time stamping for data retrieval. It is noted that the ARFF unit communicates directly with the Federal Aviation Administration tower; therefore, time stamping by the regional communications center is also difficult. It is recommended that an MDC platform be placed on this unit.

J. Performance Maintenance and Improvement Plans

Compliance Model

Compliance is best achieved through a systematic approach. Prescott Fire Department (PFD) and Central Arizona Fire and Medical Authority (CAFMA) utilize the following six-step compliance model for the service delivery system. A compliance team exists, which includes the following members:

- The Command Staff from each agency.
- The Accreditation Managers from each agency.
- The Information Technology (IT) teams from each agency.
- Stakeholders affected by compliance. Many divisions within each agency are affected by changes in strategy, goals, and objectives. In addition, the system's community stakeholders are considered in this process through outreach processes.



Figure 36:L Maintenance of Effort Compliance Model

Step 1: Establish/Review Performance Measures

PFD and CAFMA have completed the initial joint community risk assessment and standards of cover (CRA/SOC) system wide. This is the first ever collaboration between two fire agencies in doing so. A full review of the performance measures was completed.

PFD and CAFMA will maintain an updated CRA/SOC annually with a thorough audit and update every five years in accordance with the Commission on Fire Accreditation International (CFAI)model. The same will occur with each agency's respective strategic plans. Through this compliance model, PFD and CAFMA intend to maintain the joint CRA/SOC and strategic plans as 'living' documents.

Step 2: Evaluate Performance

PFD and CAFMA will evaluate performance measures as a system and work to address deficiencies in performance. In addition to system-wide performance delivery, first due area, unit level, and effective response force performance will be evaluated. Additional performance evaluations not related to emergency responses will also occur. The intent is to be as closely aligned in all aspects as feasible. The agencies currently have regularly scheduled command staff meetings every three months to evaluate performance.

A new Power BI interactive dashboard has been created to measure performance across all risk categories. This was developed through the accreditation team and IT departments from both agencies. CAD data that has been validated through collective data outlier policy shall be uploaded to the platform monthly. This platform allows the compliance team and all members from both organizations to interact with and analyze system-wide, agency-wide, or even unit-wide data. The platform is interactive in that the end user can toggle distinctive features on or off to customize what the end user is looking to analyze.

Data will be analyzed and reported using five-year increment aggregations. At the beginning of each month, data from the previous month will be uploaded onto the platform, and a month's worth of data from five years ago will be removed.

System performance that will be evaluated will include:

- Incident counts by geographic planning zone.
- Fire loss system wide.
- Calls by time of day and day of week.
- Calls by month system wide.
- Total call volume system wide.
- Call volume is by first due station system wide.
- Call volume is system-wide by risk category.
- Calls by unit and shift system wide.
- Unit hour utilization system wide.
- Call concurrency percentages system wide.
- Unit concurrency percentages system wide.
- Call processing times.
- Turnout times by station and shift.
- Response times by station and shift.
- Effective response force assembly times.
- Review of benchmark and baseline metrics.

It is also important to note that each agency can analyze metrics respectively to their jurisdiction with the *Power BI* platform. This is useful for internal processes and decision-makers within each jurisdiction like the city council and authority boards.

Step 3: Develop Compliance Strategies

During quarterly scheduled command staff meetings and annual retreats, PFD and CAFMA will determine issues and opportunities. This will include determining what needs to be done to close identified gaps between goals and actual performance, seeking alternative methods to provide service at desired levels, determining if resources can or should be reallocated or shared, developing budget estimates as a system while considering added value and efficiencies, and seeking additional funding commitment or alternatives as necessary.

Step 4: Communicate Expectations to Organization and Stakeholders

PFD and CAFMA will communicate expectations to the organizations and their stakeholders. The methodology used in the compliance model will be explained to personnel who are expected to perform the services. Feedback mechanisms will be in place, and policy will define the consequences of noncompliance.

Collectively, personnel will be trained through PFD and CAFMA's joint training divisions. This training shall provide appropriate levels of training and direction for all affected personnel. Internal processes, application systems, and technical infrastructure will be modified (remediated) as necessary to comply.

Step 5: Validate Compliance

PFD and CAFMA will develop and deploy verification tools and/or techniques that can be used by divisions of the organizations on an ongoing basis to verify that they are meeting performance benchmarks. This will include all divisions within the organizations and not solely relate to response. This will be accomplished by following the Commission of Fire Accreditation International model of program appraisals, which include:

- Description of the performance measure.
- Appraisal of the performance.
- A plan to maintain, modify, or increase performance.

The identified compliance team will validate compliance and program appraisals have already become part of the culture within the organizations. These are also considered 'living documents' that all members have access to.

Step 6: Make Adjustments/Repeat Process

The PFD and CAFMA compliance team will review changes to ensure service levels are maintained or improved. Any adjustments to performance standards will be approved and adopted by the respective governing body. Updates to the joint CRA/SOC or agency strategic plans will be communicated to all stakeholders annually and approved or adopted by the governing body.