Montgomery County Fire and Rescue Service Post Incident Analysis

Single Family Home Fire with a Fatality

16100 Willow Lane

March 2, 2017



Submitted by Chief Mike Kelley

I. Introduction

a. Provide a general overview of the incident including an area diagram of the building, exposure, water supply, time of day, weather conditions, etc.

Units were dispatched at 2215 hours for a house on fire. Company 40 arrived on the scene with a structure fully involved. The Rapid Intervention Dispatch (RID) was dispatched at 2216 hours based on the call information. The occupant was unaccounted for.

Chief 704 arrived as Paramedic Engine 740 was giving the initial report and he assumed command. A defensive attack was declared by Paramedic Engine 740 and confirmed by Chief 704. Command relocated to Battalion Chief 704's vehicle.

Truck 725 initiated aerial operations. Divisions Alpha and Charlie were assigned. The fire was controlled in approximately 30 minutes.

A Personnel Accountability Report (PAR) was conducted. There were no fire/rescue personnel injuries.

The scene was turned over to the fire investigators (FEI) group. Paramedic Engine 704 was called to assist with a wet down at 0222 hours as remaining initial assignment units cleared.

The lone home occupant was found deceased with assistance from a search and rescue canine at approximately 12 hours from time of dispatch.

Initial alarm 2215 hours. – Paramedic Engine 740, Paramedic Engine 725, Paramedic Engine 728, Paramedic Engine 721, Paramedic Engine 703 Bravo, Aerial Tower 740, Truck 725, Rescue Squad 703, Ambulance 740, Chief 704, Chief 704 Bravo, Chief 705, Chief 705 Charlie, Chief 705 Delta, Battalion Chief 703, Battalion Chief 702, Battalion Chief 704, Duty Chief 700, Volunteer Duty Chief, Chief 742 Foxtrot. RID at 2216 hours. – Aerial Tower 703, Rescue Squad 742 Bravo, Medic 725

Special at 2238 hours – Canteen 740

Special at 0222 hours March 3 – Paramedic Engine 704

b. Indicate unique circumstances/problems, etc.

Water supply was a challenge initially based on the split street and misleading apparatus water map of the house location. The first units approached from Pinetree Road and had to split lay and then maneuver over dirt and mud to the correct location of the structure on the opposite side of the road split.

- II. Building Structure/Sire Layout
- a. Review type of structure

Single family wood frame structure in an older established neighborhood with large lots and mature trees.

b. What construction or design features contributed to the fire spread, or prevented fire spread, i.e. sprinklers, fire doors, etc.

Wood frame; no sprinkler system; smoke alarm presence unknown.

c. Did the topography and/or type of fuel affect fire control efforts?

Based on the initial on scene inspection that noted old cars in the driveway and scattered junk around the property, probable hoarding conditions were recognized which likely contributed to rapid interior fire spread. There were no topography issues other than several mature trees, which slightly hampered placement of apparatus for aerial operations.

d. Did fire alarm and/or suppression devices work properly?

Unknown

e. Did personnel or apparatus encounter any problems in gaining access?

The split road that was not indicated on water maps made initial access challenging. Other incoming apparatus advised quickly to access off Holly Ridge Road rather than Pinetree Road.

f. What is needed to correct these problems?

Update running routes and water maps to correctly show road split.

III. Fire Code History

a. Review relevant Fire Code requirements and history.

N/A

IV. Communications

a. Did dispatcher verbally provide all information available at the time of dispatch?

Yes. And based on caller information, initiated the RID and advised units of same.

b. Was the fire ground channel adequate?

Yes. Utilization of 7 Charlie talkgroup was adequate.

c. Were proper communications procedures followed?

Yes.

d. Were there problems communicating with Mutual Aid companies?

N/A

e. Was the communication network controlled to reduce confusion?

N/A

f. Did units, division/groups/branches and Montgomery communicate effectively?

Yes. There were no communications issues.

g. Was radio discipline effective?

Yes.

h. Did Incident Commander provide timely updates to Communications?

Yes.

V. <u>Pre-emergency Planning</u>

a. Were pre-fire or other plans needed on the scene?

None, other than map books as indicated above.

i. Were they available?

Yes.

ii. Should they be updated?

Yes.

VI. On Scene Operations

a. What was the structural integrity of the building based on fire conditions on arrival, at 10 minutes, 20 minutes, 30 minutes, etc.

Structural integrity of the house was compromised prior to arrival based on fire load and heavy fire conditions. A collapse zone was established at approximately the 10 minute mark.

b. Was command identified and maintained throughout the incident?

Yes. Command was initiated by Paramedic Engine 704 and assumed by Chief 704 with assistance from Battalion Chief 704.

c. Was a command post established and readily identifiable? Flag, Green Light, or other?

Stationary command was initiated in Chief 704's car and relocated to Battalion Chief 704's vehicle upon arrival with the location announced.

d. Size up decisions by command.

Paramedic Engine 740 provided the initial size up and 360. The decision was made by Paramedic Engine 740 to initiate a defensive attack which was confirmed/announced by Chief 704 upon arrival.

e. Was additional apparatus requested in a timely manner?

Yes. The RID and a task force were requested and utilized.

f. Strategy/action plan.

Defensive all the way; consideration of an interior search for the missing occupant was quickly abandoned due to fire conditions not sustainable to life.

g. Did personnel/units, and teams execute tactics effectively?

Yes. Once water supply was established, aerial operations were initiated and continued until the fire was controlled.

h. Were any training needs identified? Provide examples.

N/A

i. Were Standard Operating Procedures used? Were they adequate? Do they need to be updated? If not used, why?

SOP for safe structure firefighting was used and was adequate at the time.

j. What offensive/defensive decisions were made by command?

Defensive operations from the start and throughout.

k. How was risk analysis applied to the incident?

Though the home's lone occupant was unaccounted for, an interior search was not possible and defensive attack was confirmed/announced.

I. Were the divisions/groups used appropriate to the incident's type and complexity?

Yes.

m. Was apparatus properly positioned? If not, why?

Initial apparatus placement prevented Aerial Tower 740 from initiating an aerial master stream. Truck 725 was the second due truck and well positioned to activate their master stream.

n. Attack line selection and positioning.

A Blitz line was initially used by Paramedic Engine 740 until aerial operations started.

o. Ventilation operations.

N/A

p. Salvage operations.

N/A

q. Night time and interior lighting operations.

Scene was adequately lighted; interior lighting N/A.

r. Were Mutual Aid companies effective in operation?

N/A

s. Was water supply adequate?

Yes, once the initial challenge was resolved.

VII. Staging

a. Location adequacy

N/A

b. Site Access

Limited to access off Holly Ridge Road but not an issue.

VIII. Support Functions

a. Was a rehab group established?

Yes, located on Willow Lane near the scene.

b. Were fire/rescue personnel provided with food/drinks?

Yes, by Canteen 740.

c. Was adequate shelter provided for fire/rescue personnel?

N/A

d. Were crews relieved by fresh crews regularly and frequently?

Yes, as needed but not an issue.

e. Were there any equipment or apparatus failures? Did these failures have a detrimental effect on the incident outcome?

N/A

f. Were functions with outside agencies properly coordinated? (i.e. Red Cross, power company, gas company)

Yes. Pepco and Washington Gas Light were requested. Only Pepco was used.

IX. Safety Group

a. Was a standby team established? If not, why?

No as operations were limited to exterior only.

b. Were any fire/rescue personnel injured?

No.

c. Were all safety SOPs and regulations enforced?

Yes.

d. If there was a Safety Dispatch, were they used for Safety, Accountability or RIC? If not, why?

Incident Scene Safety Officer (ISSO) was assigned to Chief 705 Delta, later reassigned to Safety 700. The Rapid Intervention Group (RIG) was assigned and established.

e. What actions are necessary to change or update current safety and health programs to improve the welfare of members?

N/A

X. Accountability

a. Were actions taken to ensure accurate personnel accountability?

A PAR was conducted.

b. Was the status of units/ divisions/groups/branches and support personnel maintained?

Yes.

c. Did personnel provide adequate feedback?

Yes, during the incident with regular updates. A hotwash held before the initial units were released.

d. Was the incident continuously controlled and monitored?

Yes.

XI. Investigations

a. Was the fire's origin and cause determined?

FEI Narriatve:

Just after 2213 hours on March 22, 2017, units were dispatched to the above address for a report of a house on fire. Upon arrival, the dispatched information was confirmed, advising that the home was one hundred percent involved. Upon hearing this information, FEI responded on the call.

Based on several circumstances/facts, the sole occupant of the home, a 71 y/o male was presumed to be home at the time of the fire and was unaccounted for throughout the event. Through investigatory avenues, FEI on-scene personnel were able to determine an address for a relative in the District of Columbia who confirmed the same.

After several hours of fire ground operations and the eventual day-break, FEI personnel found the remains of a deceased victim within the structure. Per normal protocol, MCPD Homicide as well as an FI from the Medical Examiners Office were also notified and subsequently responded.

Just before noon on this date, the remains of the deceased victim were removed and transported to the Medical Examiners Office in Baltimore for autopsy. As of this writing, the identity of the deceased has not been verified.

Due to the extent of the damage and lack of accessible areas impacted by the collapse, on-scene FEI personnel were only able to conduct limited Origin/Cause examination as this point.

b. What factors contributed to the fire's spread?

Heavy fire load.

XII.Lessons Learned

a. Were specific training needs identified?

N/A

b. Recommended improvements.

Water maps need to be regularly monitored even in older established neighborhoods. Though access from the Pinetree Road side was not

completely blocked, it was nonetheless difficult and slowed arrival, though not enough to affect the outcome.

Fire hydrants need to be inspected for easy access and operability. Paramedic Engine 725's driver had to dig out the hydrant on Pinetree Road in order to connect the Humat valve. This delayed completing Paramedic Engine 740's water supply.

XIII. Overall Analysis of Incident

A defensive attack was declared early, immediately upon arrival, and sustained throughout incident.

Adequate water supply was established from both ends of the street.

The ISSO was assigned to monitor two attack crews on Sides Alpha and Charlie, each crew consisting of two engines and one truck.

The RIG was set up on Side Alpha.

Once Company 40 units discovered that the house was on the a different section of Willow Lane (that was best accessed off of Holly Ridge Road), instructions for other incoming units was immediately broadcast to approach the scene from that side. This made the second water supply and apparatus placement much more efficient for a defensive attack. Had that broadcast not been made, other units may have attempted to approach from same end of Willow Lane. Despite the obvious negative outlook of survivability, Aerial Tower 740's crew pulled ladders for a possible rescue attempt and performed a 360 degree recon while Paramedic Engine 740 deployed a blitz line.

Once structural collapse appeared evident, that information was relayed, broadcast, and a collapse zone was established.

