

PS COMMITTEE #3  
February 24, 2010

**MEMORANDUM**

February 22, 2010

TO: Public Safety Committee  
FROM: Minna K. Davidson, Legislative Analyst *MKD*  
SUBJECT: Update to the Fire, Rescue, Emergency Medical Services, and Community Risk Reduction Master Plan

**Council Review of Amendments**

The Council approved the Fire, Rescue, Emergency Medical Services, and Community Risk Reduction Master Plan in October 2005. The Fire Chief has proposed amendments to the Plan.

County Code Section 21-12 (© 75-76) requires that the Fire Chief draft a master fire, rescue, and emergency medical services plan. Among other things, it requires that the Executive forward the master plan or any amendment, with any comments, to the Council which may approve the master plan as proposed or with amendments.

The Public Safety Committee is scheduled to review the amendments in two worksessions. For the first session on February 24, staff from the Montgomery County Fire and Rescue Service (MCFRS) will present an overview of the amendments (briefing outline on © 34-49), and the Committee will have an opportunity to discuss them and request additional information as needed. The Fire Chief will be unable to attend this worksession.

For the second worksession on March 4, the Fire Chief will be present to comment on the amendments. The Committee will have an opportunity to review any additional information that was requested. If no further issues are raised, the Committee will be able to develop its recommendation to the Council. Introduction of an approval resolution is tentatively scheduled for March 9, and action for March 16.

## **Requirements for Master Plan Reviews and Public Hearings**

The approved Master Plan provides for comprehensive reviews of the Plan at 18 months and again at 5½ years (© 78). The amendments submitted to the Council are the result of the 18 month review. The 2005 Master Plan was drafted before the transition from the Fire Administrator to the Fire Chief. The 18 month review was originally intended to enable the new Fire Chief to incorporate his vision and priorities into the Plan. The review was delayed during the transition from Chief Carr to Chief Bowers, but the proposed amendments now reflect the vision and priorities of the current Fire Chief.

County Code Section 21-12 requires that the Fire Chief conduct at least one public hearing before proposing any significant amendment. The Executive initially transmitted the proposed amendments to the Council in September 2009, before the Fire Chief held a public hearing on them. The Fire Chief subsequently held a public hearing on November 30, 2009. The Executive re-transmitted the amendments and reported the results of the public hearing in January 2010.

One person testified at the public hearing on behalf of the Mid-County Citizens Advisory Board. The major concern expressed was that the MCFRS has fire-related performance measures, but does not have comparable EMS-related measures. (This relates to Recommendation 102 on © 15.) They felt that the development of EMS patient outcome measures should be a high priority in the Master Plan. The Fire Chief does not believe that further Master Plan amendments are needed to address this concern because MCFRS implemented a cardiac care measure in June 2009, and will eventually develop patient outcome measures jointly with local hospitals. Public hearing testimony is attached on © 27-28. A summary of the proceedings, including Chief Bowers' comments in response to the testimony, is on © 25-26.

## **Proposed Amendments**

The Executive recommends several amendments to the Master Plan, some of which are technical updates, and some of which are substantive changes. Some of the key amendments include changes to the Fire and Rescue Service vision, mission, and guiding principles; response time goals; advanced life support service delivery model; and implementation schedule for four-person staffing. Amendments also include additional service and facility needs and three new recommendations on risk reduction.

The following table lists the amendments, and provides the circle number for the text of each amendment, and for the original recommendation in the approved 2005 Plan. MCFRS responses to Council staff questions on some of the key recommendations are attached on © 50-53.

<b>Section/ Rec. #</b>	<b>Recommendation</b>	<b>Amendment ©</b>	<b>Current Rec. ©</b>
<b>Global</b>	Change unit numbers to COG designations	3	
<b>Section 2</b>			
	Update MCFRS Organizational Chart	6, 21	54, 58
	Move Honor Guard to Office of Fire Chief	6	55
	Membership of Career F/R Officers Association begins at Battalion Chief level	6	56
	Revised Vision, Mission, Guiding Principles	6	57
<b>Sections 5 &amp; 6</b>			
1A	Add eighth phase of Station Location Study – White Flint/Twinbrook area	7	59
3	Add 3g – establish Interim Travilah Service	7	62
	Add 3h – expand Station 25 to support special operations and EMS flex unit	8	
	Add 3i – Resources for White Flint/Twinbrook area	8	
	Add 3j – Public Safety Headquarters at GE Tech Park	9	
9	Start numbering additional stations at #43	10	65
27	Change frontline aerial unit ratio to two aerial towers to one ladder truck	10	66
32	Specify order for four-person staffing implementation	10	67
34	Five additional EMS captains (Duty Officers) - to deploy one per battalion	12	68
41	MCFRS “1 + 1” ALS delivery model	13	70
68	Update response time goals, including changing BLS goal from 6 to 12 minutes	14, 22	71, 72
102	Update performance measures to reflect CountyStat program	15	73
104	Maintain (rather than seek) CFAI accreditation	16	74
<b>Additions</b>			
105	Minimize fire risk to senior citizens	16	
106	Timely transfer of apparatus to cover short-term gaps during responses to major incidents	18	
107	Adequate resources for “worst credible scenario”	18, 23, 24	
<b>Deletion</b>			
71	Made obsolete by revision of #68	19	71

## Discussion Issues

1. Recommendation 1A would add an eighth phase of the Station Location Study to cover the White Flint/Twinbrook area. Recommendation 3i would address resource/facility enhancements for the same area. Considering the discussion of a new station in the context of the White Flint Sector Plan, Council staff had asked whether these recommendations are still timely. On © 50-51, MCFRS staff replied that the recommendations continue to apply.

**The Committee may want to ask MCFRS staff to provide an update on the consideration of station locations in conjunction with the White Flint Sector Plan, and discuss how a station location decision for the Sector Plan will relate to the broader service issues for the White Flint/Twinbrook area.**

2. Recommendation 32 would change the implementation schedule for four-person staffing from a general plan (8 units at rural stations in the first year, 8 aerial units in high density areas in the second, etc.) to a specific list of units in each phase. It also would reflect the intent that the fourth position on each engine will be a paramedic. In responses on © 50-51, MCFRS clarified that eventually all engines will have paramedic capability with ALS equipment, but most aerial units and rescue squads will not.

**The Committee may want to ask MCFRS staff to describe in more detail the rationale for the new implementation schedule for four-person staffing.**

3. Recommendation 68 would replace the current matrix of response time goals (© 72) with the revised matrix on © 22. The major changes in the matrix involve EMS response time goals. At the overview, MCFRS staff will provide a table comparing the current approved goals with the proposed new ones. The most noteworthy proposal is to change the Basic Life Support (BLS) goal from 6 minutes to 12 minutes. MCFRS' rationale is that since BLS incidents involve non-life threatening occurrences, a longer response time is acceptable. Increasing the BLS response time will enable the service to be better prepared for Advanced Life Support (ALS) incidents. Instead of dispatching an ALS unit to a BLS call, a more distant BLS unit could be dispatched leaving the ALS unit available for ALS response.

**The Committee may want to ask MCFRS staff to discuss the advantages and disadvantages of the proposed approach, and to comment how the proposed BLS response time goal relates to NFPA response time standards.**

4. Recommendation 106 would establish policies and a standard operating procedure for the transfer of apparatus to address short-term gaps in service created by responses to major incidents. The description of this issue says that there is no automated or manual procedure to aid the ECC Supervisor in determining which apparatus to transfer, and when and where to transfer them. In response to a question, MCFRS indicated that this

issue is not being addressed in the current business analysis of the ECC, but rather, is an operations issue.

**Council staff agrees that there must be operational policies about these transfers, but after the policies are developed, automation may be helpful in implementing them. The Committee may want to ask about the timeframe for developing the policies, and how MCFRS plans to coordinate this initiative with the CAD replacement project.**

5. Recommendation 107 says that MCFRS should have adequate resources to provide an effective response to a “worst credible scenario” of concurrent incidents. This would address typical types of incidents (rather than unseal disasters) that could occur concurrently within a two-hour period. MCFRS has included an analysis that shows which incidents might occur (© 22) and how many resources would be needed to respond to them (© 24). In response to questions about the implications of this analysis (© 52-53), they have indicated that for this scenario the County would have a shortfall of 6-7 engines, and 2-3 aerial units. In their view, this analysis supports the need for more stations. They note that new stations at Travilah, Shady Grove, and the East County will house some of the needed units. Future phase of the station location study may indicate that new stations will be needed where additional units could be housed.

**The Committee may want to ask MCFRS staff to discuss this approach to planning, and its implications for resources in more detail.**

<b><u>This packet contains:</u></b>	<b><u>circle #</u></b>
Executive transmittal, 1/8/10	1
Executive transmittal, 9/8/09	2
Master Plan Update	3
Public hearing documents	
Summary of Proceedings	25
MCCAB testimony	27
Letter from MCCAB	29
Public hearing advertisement	31
News Advisory for public hearing	32
Public hearing sign-in sheet	33
Briefing outline	34
Responses to Council staff questions	50
Recommendations from approved 2005 Master Plan	54
County Code Section 21-12	75
Requirements for reviews of the Master Plan	77



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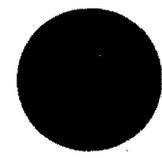
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Isiah Leggett  
County Executive

MEMORANDUM

January 8, 2010



TO: Nancy Floreen, President  
Montgomery County Council

FROM: Isiah Leggett  
County Executive 

SUBJECT: Update to the Fire, Rescue, Emergency Medical Services, and Community Risk Reduction Master Plan

As follow up to my September 8, 2009 memorandum to former Council President Phil Andrews (copy attached) concerning the "Update of the Fire, Rescue, Emergency Medical Services, and Community Risk Reduction Master Plan" (a.k.a., "Master Plan Update"), I am submitting this addendum for consideration by the County Council. In view of the extent and far-reaching impact associated with certain of the proposed updates, Fire Chief Richard Bowers hosted a public hearing on November 30, 2009 to provide an opportunity for the public to testify regarding the Master Plan Update.

The purpose of this addendum is to report the results of the public hearing. To that end, you will find attached a summary of the public's comments as well as a copy of testimony provided at the public hearing and an accompanying letter mirroring that testimony. Based on these comments, Chief Bowers and I do not feel that any changes are needed to the Update document. The individual providing testimony stated that the Montgomery County Fire and Rescue Service (MCFRS) had fire-related performance measures in place but no comparable emergency medical-related performance measures; therefore the MCFRS needed to develop EMS patient outcome measures as a high priority within the Master Plan. As the MCFRS has had a cardiac care-related performance measure in place since June 2009, and patient outcome measures will eventually be developed jointly by MCFRS and local hospitals, I do not feel that a related addition to the Master Plan Update document is warranted at this time.

Thank you in advance for your review and approval of the "Update of the Fire, Rescue, Emergency Medical Services, and Community Risk Reduction Master Plan."

Attachments

IL:sg

cc: Tim Firestine, CAO  
 Diane Schwartz-Jones, ACAO  
 Kathleen Boucher, ACAO  
 Fire Chief Richard Bowers, MCFRS  
 Division Chief Michael Love, CRRS Division, MCFRS  
 Scott Gutschick, Planning Section, MCFRS  
 Minna Davidson, Legislative Analyst, County Council

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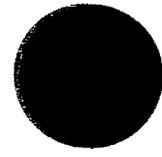
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OFFICE OF THE COUNTY EXECUTIVE  
ROCKVILLE, MARYLAND 20850

Isiah Leggett  
County Executive

MEMORANDUM

September 8, 2009



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RECEIVED  
MONTGOMERY COUNTY  
COUNCIL

TO: Phil Andrews, President  
Montgomery County Council

FROM: Isiah Leggett  
County Executive

SUBJECT: Update to the Fire, Rescue, Emergency Medical Services, and Community Risk Reduction Master Plan

I am pleased to submit the "Update of the Fire, Rescue, Emergency Medical Services, and Community Risk Reduction Master Plan" (herein referenced as "Master Plan Update") for consideration by the County Council. In addition to the attached Master Plan Update, I have attached a summary of the key changes for your convenience.

The Master Plan Update has been written in response to the 18-month update requirement established by the County Council at the time of Master Plan adoption in October 2005. The update requirement was predicated on the first County Fire Chief needing approximately 18 months into his tenure to review the Master Plan and determine whether it reflected his vision and priorities. While the subsequent transition of the Fire Chief position from former Fire Chief Thomas Carr, Jr. to current Fire Chief Richard Bowers delayed the completion and approval of the Master Plan Update, the document now reflects the vision and priorities of the current Fire Chief.

Key elements of the Master Plan Update include changes to the Fire and Rescue Service vision, mission and guiding principles; response time goals; advanced life support service delivery model; and the strategic order in which fourth-person staffing of suppression units will be implemented. Other key elements of the Master Plan Update include additional service and facility needs as well as three new recommendations addressing risk reduction.

Thank you in advance for your review and approval of the Fire-Rescue Master Plan Update.

Attachments

IL:ld

cc: Tim Firestine, CAO  
Kathleen Boucher, ACAO  
Fire Chief Richard Bowers, MCFRS  
D/C Michael Love, CRRS Division, MCFRS

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**UPDATE OF THE  
FIRE, RESCUE, EMERGENCY MEDICAL  
SERVICES, AND COMMUNITY RISK  
REDUCTION MASTER PLAN**



**AUGUST 2009**

**APPROVED BY: FIRE CHIEF RICHARD R. BOWERS**

**WRITTEN BY: SCOTT GUTSCHICK, PLANNING SECTION MANAGER**

**2009 UPDATE OF THE  
FIRE, RESCUE, EMERGENCY MEDICAL SERVICES, AND  
COMMUNITY RISK REDUCTION MASTER PLAN**

**TABLE OF CONTENTS**

	<u>Page</u>
BACKGROUND	3
MASTER PLAN UPDATES AND REVISIONS:	3
• GLOBAL UPDATES	3
• SECTION 2 UPDATES	4
• SECTIONS 5 AND 6 UPDATES	5
MASTER PLAN ADDITIONS	14
MASTER PLAN DELETIONS	17
ATTACHMENTS:	18
• FIGURE 2.1	19
• FIGURE 5.6	20
• FIGURE 5.8	21
• FIGURE 5.9	22

# 2009 UPDATE OF THE FIRE, RESCUE, EMERGENCY MEDICAL SERVICES, AND COMMUNITY RISK REDUCTION MASTER PLAN

## BACKGROUND

The *Fire, Rescue, Emergency Medical Services, and Community Risk Reduction Master Plan* (page 1-20) states that the Master Plan should undergo a comprehensive review at the 18-month mark following its initial adoption by the County Council in October 2005. This requirement was predicated on the new County Fire Chief - who took office in January 2005 - requiring 18 months into his tenure to review the Plan and determine whether its content reflected his vision and priorities for the Montgomery County Fire and Rescue Service (MCFRS). The review began in July 2006 and concluded about ten months later. Written updates (more specifically: updates, revisions, additions, and deletions) were drafted during 2007, finalized in 2008, and approved in 2009.

This document presents and describes the updates resulting from the production and review process. It is organized into sections addressing Master Plan updates/revisions, additions, and deletions.

## MASTER PLAN UPDATES AND REVISIONS

The following updates and revisions should be incorporated into the Master Plan:

### GLOBAL UPDATE - ALL SECTIONS

Apparatus designations used throughout the Master Plan reflect the former unit numbering system used by MCFRS. Effective October 15, 2007, MCFRS modified its unit designations to reflect the Washington Metropolitan Area Council of Governments Unit Numbering System whereby each member county/city has been assigned a jurisdictional identifier between the numbers 0 and 9 for its fire-rescue units. Under the COG system, all Montgomery County units now begin with the number "7" followed by the station number; e.g., Engine 11 is now "Engine 701," Medic 89 is now "Medic 708," Truck 12 is "Truck 712," Rescue Squad 15 is "Rescue Squad 715," etc. When multiple units of the same type are housed in the same station, the additional units use the suffix "Bravo, Charlie, Delta," etc. following their unit number; e.g., Ambulance 86 is now "Ambulance 708-Bravo," Engine 32 is now "Engine 703-Bravo." The new numbering system also applies to Command Officers and Battalions; e.g., Chief 17 is now "Chief 717," Battalion 4 is now "Battalion 704." Under the COG system, Rescue Station 1 is known as "Rescue Station 41" and Rescue Station 2 as "Rescue Station 42;" and their units have designations such as "Ambulance 741-Foxtrot" (formerly Ambulance 15), "Medic 741-Bravo" (formerly Medic 11), "Rescue Squad 742" (formerly Rescue Squad 29), etc.

# 2009 UPDATE OF THE FIRE, RESCUE, EMERGENCY MEDICAL SERVICES, AND COMMUNITY RISK REDUCTION MASTER PLAN

## SECTION 2

### **Organizational Chart [p. 2-1 and Figure 2.1]**

Replace the MCFRS organizational chart (located at the back of Section 2) with the attached updated chart (Figure 2.1). Revisions include:

- Adding “MCFRS Recruiting” to Community Risk Reduction Services Division
- Removing “Budget & Grant Administration” and “Training & Risk Management Support” from the Volunteer Services Division. [Note: These functions have been assigned to the Administrative Services Division and the Wellness, Safety and Training Division, respectively, as elements of existing functions.]

### **Office of the Fire Chief [p. 2-2]**

Revise page 2-2 to indicate that the MCFRS Honor Guard is assigned to the Office of the Fire Chief rather than the Operations Division – Special Operations Section.

### **Career Fire-Rescue Officers Association [p.2-10]**

Revise the first bullet to state that membership in the Career Fire-Rescue Officers Association includes the ranks of Battalion Chief, Assistant Chief, and Division Chief.

### **Vision and Mission [p. 2-27]**

Replace the MCFRS vision and mission with the revised versions appearing below. Revisions were approved by the Interim Fire Chief and based upon input provided by career and volunteer participants of the FY08 MCFRS Planning Forum during and subsequent to the forum. Revisions/additions are highlighted in **boldface font**.

Vision: The Montgomery County Fire and Rescue Service vision is to keep our communities safe and healthy by providing the best fire, rescue, and emergency medical services, **utilizing career and volunteer resources**.

Mission: The Mission of the Montgomery County Fire and Rescue Service is to protect lives, property, and the environment with comprehensive risk reduction programs; and safe, efficient, and effective emergency response provided by skilled, motivated, and compassionate **career and volunteer service providers** representing Montgomery County’s diverse population.

# 2009 UPDATE OF THE FIRE, RESCUE, EMERGENCY MEDICAL SERVICES, AND COMMUNITY RISK REDUCTION MASTER PLAN

Guiding Principles: Our Montgomery County Fire and Rescue Service providers will:

- Deliver services to our customers with impartiality and excellence
- Promote the highest standards of safety and welfare
- Serve with integrity and mutual respect
- Recognize the importance of diversity of our workforce and communities
- Promote the efficient and effective utilization of our resources, **and ensure that all organizations and personnel comprising the MCFRS share the responsibility for continuously improving their capabilities, effectiveness, and efficiency**
- Be responsible for the honor of our profession and public service
- **Promote equity and harmony among career and volunteer personnel**
- Maintain and promote open **honest** communication, creativity, and competence
- Be accountable and ethical
- Continuously improve public confidence and trust

## SECTIONS 5 and 6

### Recommendation 1

Update Recommendation 1A by adding the requirement for an eighth phase of the Station Location and Resource Allocation Study. Phase 8 will address the general area of South Rockville and North Bethesda - including the White Flint, Twinbrook, and Grosvenor Park areas - where urbanization is occurring and additional urbanization is recommended or proposed within M-NCPPC sector plans – some under development at the time this Master Plan Update was written. Phase 8 needs to address an existing gap in 6-minute response coverage within the general area where first-due areas of Stations 5, 20, 23 and 26 converge in the vicinity of the Rockville Pike/Strathmore Avenue and Rockville Pike/Tuckerman Lane intersections.

### Recommendation 3

Update Recommendation #3 by inserting subsections “g” through “j” as follows:

- Recommendation 3.g.

The County should establish an interim Travilah Fire Station to serve the Travilah/Traville/Fallsgrove area until the permanent Travilah Station is built and becomes operational on a nearby property within the FY13-14 time frame. Considering the high call load within this area (almost 4200 incidents in FY08) and the inability of existing units from Stations 3, 31, 33, 8 and 28 to reach much of this area within 6-minute response time goals, an interim station is needed by FY11. The envisioned interim station would be located at the PSTA, using the existing infrastructure to the greatest extent possible. One alternative is to use a portion of the PSTA apparatus room to house

## **2009 UPDATE OF THE FIRE, RESCUE, EMERGENCY MEDICAL SERVICES, AND COMMUNITY RISK REDUCTION MASTER PLAN**

the interim station's apparatus, with temporary living quarters established in an adjacent trailer or renovated classroom. The interim Travilah Fire Station would be the last function to remain on the PSTA property should the PSTA be relocated during the FY11-14 time frame.

- Recommendation 3.h.

Expand Station 25 to support the recently established special operations capability at the station, making possible the placement of apparatus and equipment related to hazmat, water/ice rescue, high-angle rope rescue, and collapse/confined space/trench rescue inside the station. The improvement of special operations response to the east side of the county is critical, providing personnel and equipment that can stabilize/mitigate incidents of a technical nature before dedicated special teams arrive.

Existing apparatus assigned to Station 25 includes two EMS units (Medic 725, Ambulance 725), an engine (Engine 725), ladder truck (Truck 725), and a battalion chief vehicle (Battalion 704). Station 25 must be expanded to accommodate a third EMS unit (i.e., Ambulance 725-Bravo - an EMS "flex" unit established in FY07) as well as vehicles, equipment, and personnel associated with the special operations capability initiated at Station 25 in FY07.

Presently, Ambulance 725-Bravo ("flex" unit operating 12 hours, 7 days/week) and special operations vehicles (i.e., hazmat support vehicle, rescue boat, collapse rescue reconnaissance vehicle, decontamination equipment, and mass causality supplies) must be parked/stored outdoors due to lack of bay space inside the apparatus room. Special operations equipment must be stored in several sheds in the rear parking area due to lack of storage space inside the station. This equipment must be pulled outside these temporary structures for critical daily assessments to be performed. An expansion of the station would allow for indoor parking of Ambulance 725-Bravo and special operations vehicles as well as indoor storage of special operations equipment. Moving these vehicles and equipment indoors will allow for quicker special operations response, increased protection of apparatus and equipment from the elements and vandals, more efficient storage and inventorying of equipment, and easier access to apparatus and on-board equipment for the purpose of training, maintenance, and daily equipment checks.

- Recommendation 3.i.

The County must address resource enhancements and associated facility needs within the adjoining areas of Twinbrook, White Flint, and North Bethesda. While current call load and level of risk justify the need for additional resources within this area at present, planned high-density development for Twinbrook and White Flint will create even greater need for MCFRS services in the future and the associated resources to deliver those services. In addition to needs related to call load and risk, there exists a gap in 6-minute response time coverage in the North Bethesda area that must be addressed. The

## **2009 UPDATE OF THE FIRE, RESCUE, EMERGENCY MEDICAL SERVICES, AND COMMUNITY RISK REDUCTION MASTER PLAN**

gap includes some or all of four box areas: 20-09, 26-06, 23-03 and 5-03. Generally described, the gap encompasses the Rockville Pike corridor from I-495 to Flanders Avenue (immediately south of White Flint Mall) and the Tuckerman Lane corridor from Gloxnia Drive to the portion east of the Grosvenor METRO Station. Analysis points to the need for additional EMS resources within the Twinbrook/White Flint/North Bethesda area and potentially additional suppression resources.

To address the facility needs associated with additional operational resources, new and/or renovated facilities will be required. Several alternatives must be considered, including the following:

- Alternative A: Expand existing Station 23 by adding a fourth apparatus bay to house an additional (i.e., third) EMS Unit. Space limitations related to the small parcel on which the station now stands will dictate the feasibility of this alternative. If it is feasible to add an additional bay, all on-site parking would be eliminated, and off-site parking would have to be found for station personnel.
- Alternative B: Build an additional station to be located within the North Bethesda area in the vicinity of Rockville Pike and Tuckerman Lane. The station would house an EMS unit and an engine. If sufficient acreage was available, additional bay space could be included for future frontline units (if needed) and/or reserve units. The Station would have a first-due area encompassing the 6-minute gap described above plus adjacent areas in White Flint and Garrett Park Estates. If Station 23 were to be relocated as described below, then the need for a North Bethesda Fire Station might be nullified.

Note: Both Alternatives A and B would need to be implemented in conjunction.

- Alternative C: Relocate Station 23 approximately 1/2-3/4 mile south on or near Rockville Pike. A station with four or more bays could then be built to adequately house all existing and proposed apparatus, including a third EMS Unit. This alternative could nullify the need for a new station in North Bethesda, as it would position EMS and suppression units closer to that area and reduce the gap described above.
- Recommendation 3.j.

MCFRS should continue working with DGS and future co-located departments (MCP, OEM, and DOT) to establish the Public Safety Headquarters adjacent to the Lakelands Community of Gaithersburg at the former General Electric Services building on Edison Park Drive. The joint headquarters will be a viable alternative to the outgrown, obsolete headquarters facilities being used presently by each agency. Relocating these agencies to a joint headquarters would offer the advantages of co-locating public safety functions and associated cost efficiencies. From the MCFRS perspective alone, the new headquarters

## 2009 UPDATE OF THE FIRE, RESCUE, EMERGENCY MEDICAL SERVICES, AND COMMUNITY RISK REDUCTION MASTER PLAN

would allow consolidation of many MCFRS work sites under one roof, thus improving cohesiveness, communication, and cost efficiencies within the department. Occupancy by MCFRS should occur during FY10.

### Recommendation 9

Revise the second sentence in the last paragraph to state [revisions shown in boldface]:  
“Any future stations beyond these three should be numbered sequentially beginning with #43 since #40 is assigned to an existing **Sandy Spring Volunteer Fire Department station and #41 and #42 have been assigned to the Bethesda-Chevy Chase Rescue Squad (formerly Rescue Station 1) and Wheaton Volunteer Rescue Squad (formerly Rescue Station 2), respectively, in accordance with the newly implemented Council of Governments unit/station numbering system.**”

### Recommendation 27

Revise Recommendation #27 by changing the desired aerial unit ratio to two aerial towers for every one tractor-drawn or straight aerial ladder in the frontline aerial fleet.

### Recommendation 32

Revise Recommendation #32 to specify the order in which suppression units will receive fourth-person staffing. The specific order reflects a change in strategy brought about by a shortage of paramedics within the department and the subsequent need to maximize the efficient utilization of available paramedics. The new deployment strategy involves the reassignment of one of two paramedics from select medic units to serve as the fourth person (i.e., firefighter-paramedic) on engines located at the same stations. The strategy also involves the assignment of a paramedic to other designated engines located at stations without medic units. Eventually, all engines would have an assigned paramedic (firefighter-paramedic or officer-paramedic) as one of four riding positions on each engine. The strategy addresses both ALS unit deployment as well as increased staffing on suppression units. The new ALS deployment model is described in Recommendation #41 below.

The planned order in which units would receive fourth-person staffing is indicated below. The order could be further adjusted during any given fiscal year to address any emergent factors and circumstances wherein altering the order of units receiving fourth-person staffing would be advantageous.

- Phase 1: Engines 708, 714, 717, 723, 728, 729, and 731, and Aerial Tower 708. This phase was implemented in the 4<sup>th</sup> quarter of FY07. The fourth person is typically a firefighter-paramedic; therefore these eight engines have the on-board capability to respond as ALS first-responder apparatus (AFRAs) in addition to providing suppression services.

## 2009 UPDATE OF THE FIRE, RESCUE, EMERGENCY MEDICAL SERVICES, AND COMMUNITY RISK REDUCTION MASTER PLAN

- Phase 2:
  - Phase 2A: Fourth-person staffing on Engines 701, 716, 721, and 724 was implemented in September 2007 (1<sup>st</sup> quarter FY08). The fourth person on each engine is a firefighter-paramedic or officer-paramedic; therefore these four engines have the on-board capability to respond as ALS first-responder apparatus (AFRAs) in addition to providing suppression services.
  - Phase 2B: Fourth-person staffing on Engines 706, 712, 718, and 719 was implemented in September 2008. The fourth person on each engine is a firefighter-paramedic or officer-paramedic; therefore these four engines have the on-board capability to respond as AFRAs in addition to providing suppression services.

Note: Selection of specific units for inclusion in Phases 3-6 is based upon the following factors supporting various MCFRS staffing strategies:

- Transition to the “1 and 1” ALS deployment model
  - Provision of tanker drivers (using the 4<sup>th</sup> person from the engine for infrequent responses of the station’s tanker, if applicable)
  - Provision of additional staffing for special teams/special operations
  - Provision of additional staffing for high call load areas
  - Current level of volunteer staffing on apparatus
  - Staffing levels that will assist the MCFRS in confining structure fires to the room of origin
- Phase 3: The 3<sup>rd</sup> phase of fourth-person staffing on eight additional engines (potentially including Engines 702, 704, 710, 713, 720, 726, 730 and 733) is planned for implementation - fully or partially - during FY10 and FY11, although fiscal circumstances could delay implementation. Engines having an ALS kit plus a firefighter-paramedic as the fourth person, or an officer-paramedic as one of the four personnel, will have the on-board capability to respond as AFRAs in addition to providing suppression services.
  - Phase 4: The 4<sup>th</sup> phase of fourth-person staffing is planned for implementation - fully or partially - in FY12, although fiscal circumstances could delay implementation. The 4<sup>th</sup> phase will address a combination of aerial units, engines, and rescue squads (potentially including Trucks 702, 712 and 731; Aerial Towers 718, 729 and 735; Engines 711 and 740; and Rescue Squad 729). Engines having an ALS kit plus a firefighter-paramedic as the fourth person or an officer-paramedic as one of the four personnel will have the on-board capability to respond as AFRAs in addition to providing suppression services.

## 2009 UPDATE OF THE FIRE, RESCUE, EMERGENCY MEDICAL SERVICES, AND COMMUNITY RISK REDUCTION MASTER PLAN

- Phase 5: The 5<sup>th</sup> phase of fourth-person staffing is planned for implementation – fully or partially - in FY13, although fiscal circumstances could delay implementation. The 5<sup>th</sup> phase will address a combination of aerial units, a rescue squad, and an engine-tanker (potentially including Trucks 706, 710, 725, and 740; Aerial Towers 719 and 723; Engine-Tanker 709; and Rescue Squad 703).
- Phase 6: The 6<sup>th</sup> phase of fourth-person staffing is planned for implementation – fully or partially - in FY14, although fiscal circumstances could delay implementation. The 6<sup>th</sup> phase will address a combination of aerial units, rescue squads, and engines (potentially including Truck 715; Aerial Tower 703; Rescue Squads 715, 717 and 742; and Engines 705 and 715). Engines having an ALS kit plus a firefighter-paramedic as the fourth person or an officer-paramedic as one of the four personnel will have the on-board capability to respond as AFRAs in addition to providing suppression services. Unlike Phases 1-5 where career personnel (with exceptions) would typically staff the fourth position on a 24/7 basis, Phase 6 may rely upon volunteer staffing of the fourth position during nights and weekends, with career staffing Monday-Friday during the daytime. Phase 6 also involves staffing of frontline tankers (i.e., Tankers 704, 709, 714, 717, 722, 730, and 731) with a driver on a 24/7 basis.
- Phase 7, addressing the new position of “Battalion Chief Aide” (i.e., one per battalion) remains as indicated in the existing Master Plan. Implementation of Phase 7 is planned for FY15, although fiscal circumstances could delay implementation.

As phases of fourth-person staffing are implemented, a determination will be made as to whether a reduction in the number of engines assigned to a standard box alarm can be reduced from five to four. With minimum staffing of only three personnel, five engines are needed to bring a minimum of 15 firefighters to the fire scene (or more if volunteer personnel were to provide additional staffing); whereas with four-person minimum staffing, four engines would bring a minimum of 16 firefighters to the fire scene<sup>1</sup> (or more if volunteer personnel were to provide additional staffing).

### Recommendation 34

Update this recommendation to indicate that five additional EMS Officer (Captain) positions are needed to deploy one per battalion as recommended, including the recommended 6<sup>th</sup> Battalion. In FY07 and FY08, MCFRS had three EMS Officers on duty at all times (although two were funded with overtime monies), each assigned

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<sup>1</sup> The fifth engine on existing box alarm assignments under the existing 3-person minimum staffing situation is needed primarily for personnel and less so for its pumping capability and hose lines. When 4-person minimum staffing of engines is completed, the fifth engine on standard box alarms may no longer be needed (decision to be made by the Fire Chief).

## 2009 UPDATE OF THE FIRE, RESCUE, EMERGENCY MEDICAL SERVICES, AND COMMUNITY RISK REDUCTION MASTER PLAN

responsibility for ALS/BLS quality assurance for a designated area although permitted to respond elsewhere in the County as needed. While progress in achieving the existing recommendation has occurred, five additional EMS Officer positions are needed, including two that had been funded with overtime monies and one for the recommended 6<sup>th</sup> Battalion (reference: Master Plan Recommendation #33).

### Recommendation 41

Revise Recommendation #41 to indicate MCFRS' new ALS service delivery model involving the use of alternatively-staffed medic units and increased use of ALS first-responder apparatus (AFRA). The department's intent is to implement the "1 and 1" ALS deployment model incrementally, whereby minimum staffing composition of medic units is changed from two paramedics to one paramedic and one Emergency Medical Technician (EMT) - typically a firefighter. The second paramedic position on existing medic units would be reassigned to serve as the fourth position (i.e., firefighter-paramedic) on an engine (or in one case on an aerial unit) at the same station as the medic unit, thus creating an AFRA in addition to the medic unit. The AFRA would typically respond along with that station's medic unit, or another available medic unit, to ALS incidents. This ALS delivery model would provide for the collective response of two paramedics and four EMTs (between the AFRA and medic unit), thus increasing the effectiveness of ALS patient care while also meeting NFPA Standard 1710 staffing requirements for engines with regard to fire suppression.

The "1 and 1" ALS deployment model, which has been implemented successfully at several MCFRS stations to date, accomplishes the following objectives:

- **Increases ALS service delivery to the public:** The 1 and 1 ALS deployment model greatly increases the number of MCFRS units capable of providing ALS services to the public; although only medic units have ALS transport capability. By placing a paramedic (firefighter or officer) on designated engines as the fourth person, these engines can provide ALS service, with transport being provided by an EMS Unit. With a greater number of ALS units (i.e., AFRAs and medic units) in service, ALS response time has improved county-wide.
- **Provides for a more effective utilization of available paramedics:** MCFRS data indicates that on only about 7% of ALS incidents are two paramedics needed for providing patient care during transport. On over 90% of ALS incidents, therefore, the AFRA is able to return immediately to service with four personnel on board, including the firefighter-paramedic or officer-paramedic (i.e., fourth person on AFRA), ready for the next ALS, fire, or other type of incident. On less than 10% of ALS incidents does the AFRA paramedic join the EMS transport unit's

## 2009 UPDATE OF THE FIRE, RESCUE, EMERGENCY MEDICAL SERVICES, AND COMMUNITY RISK REDUCTION MASTER PLAN

paramedic or EMT<sup>2</sup> in transporting patients to the hospital, while the engine returns to service as a three-person unit, minus the paramedic until that individual returns to the station from the hospital.

- **Provides paramedics with an enhanced opportunity to integrate into fire suppression activity:** This broadens career development opportunities for current paramedics and serves as incentive for more firefighters to become firefighter-paramedics, with the knowledge that they can remain in suppression services while serving as paramedics.

The new model is tied directly to the revised phases of fourth-person staffing of suppression units as described in Recommendation #32 above.

### Recommendation 68

Replace the matrix of fire-rescue response time goals on page 5-54 with the attached revised matrix (Figure 5.6). Changes are shown in boldface font. The primary change involves EMS response time goals to reflect the five categories of EMS calls – “Alpha, Bravo, Charlie, Delta, Echo” - used in the Emergency Medical Dispatch (EMD) protocol. Other changes include the addition of response time goals for 5<sup>th</sup> due engine on box alarms, 3<sup>rd</sup> due aerial unit on high-rise box alarms, and command officers on major fire-rescue incidents. Another revision involves the performance levels (i.e., percentages) associated with the three density zones, where all urban goals have been changed to the 90% performance level, all suburban goals to the 75% level, and all rural goals to the 50% level for consistency purposes.<sup>3</sup> In addition, a column showing corresponding NFPA 1710 response time guidelines has been added for comparison purposes.

One change requiring explanation is the response time associated with the basic life support (BLS) response goal – from 6 to 12 minutes. The increase is due to a philosophical premise: BLS incidents involve non-life threatening occurrences (e.g., sprains, fractures, contusions, unspecified sicknesses, etc.), so a longer response time is acceptable. Because of this, units responding to BLS incidents may, in some cases, not require use of emergency lights and sirens (i.e., travel in routine mode)<sup>4</sup> which would have the added benefit of a reduction in the number of collisions involving MCFRS apparatus. The increase in BLS response time will also allow for greater emphasis on advanced life support-“ALS” response (e.g., life threatening emergencies such as heart

<sup>2</sup> If the ALS incident is of the “Charlie”-level, then a BLS transport unit (staffed by EMTs) would transport the patient. If the ALS incident is of the “Delta” or “Echo”-level, then a medic unit (staffed by one paramedic and an EMT driver) would transport the patient.

<sup>3</sup> The lone exception is the goal for BLS response where the urban goal is 98%, suburban goal is 95%, and rural goal is 90% due to the increased time associated with BLS response.

<sup>4</sup> A decision on allowing response of BLS units in the routine mode for certain Alpha and Bravo-level incidents will be determined at a later date by the Fire Chief.

## **2009 UPDATE OF THE FIRE, RESCUE, EMERGENCY MEDICAL SERVICES, AND COMMUNITY RISK REDUCTION MASTER PLAN**

attack, respiratory distress, traumatic injury, anaphylactic shock, electrocution, etc.) by the department's limited number of ALS resources. For example, instead of dispatching a medic unit to a BLS incident (when no ambulance is readily available) to meet the existing 6-minute BLS response goal, a distant ambulance could respond to that incident within the new 12-minute goal; thus freeing the medic unit for response to a concurrent or impending ALS incident.

### Recommendation 102

Update Recommendation 102 addressing program evaluation to include the new format for performance measures established by County Executive Leggett in July 2007. Beginning on that date, County department heads have been required to have annual performance plans featuring "headline" performance measures that measure a department's performance in providing crucial services to the public. This approach holds the department head accountable for his/her department's performance. The headline measures also assist the department head in focusing the organization and in setting priorities. MCFRS headline measures address response time to ALS and structure fire incidents, heart attack care, fire confinement, reduction in the number of fire casualties, fire and injury prevention, and accreditation compliance. Beginning in FY10, the MCFRS divisions will develop performance measures that support the department's headline measures and MCFRS sections will develop performance measures that support division measures.

Throughout the fiscal year, MCFRS managers must collect and analyze data and other information to determine how well sectional, divisional, and departmental performance measures are being met. Ongoing performance must be communicated not only internally within MCFRS but also to the CAO, County Executive, and the public. The "CountyStat" Program, introduced by the CAO in FY08, serves as an instrument for reporting agency performance to the CAO, County Executive, and the public. Declining performance must be addressed by MCFRS managers, including the identification of causal factors, determination of actions required to turn declining performance into positive performance, and development of an implementation plan (addressing strategies, resource needs, costs, etc.) to implement required actions.

At the end of each fiscal year, MCFRS headline measures must be re-evaluated to determine whether they should remain as written, revised, or replaced with more appropriate measures for the upcoming fiscal year. MCFRS must then re-evaluate its division and section performance measures to determine whether they require revision or replacement based upon any changes made to departmental headline measures for the upcoming fiscal year.

## **2009 UPDATE OF THE FIRE, RESCUE, EMERGENCY MEDICAL SERVICES, AND COMMUNITY RISK REDUCTION MASTER PLAN**

### Recommendation 104

Replace Recommendation 104 addressing the objective of achieving departmental accreditation from the Commission on Fire Accreditation International (CFAI), as accreditation has since been awarded to MCFRS in August 2007. The new recommendation is that MCFRS remain in compliance with CFAI accreditation requirements through 2012 and then seek re-accreditation status that year as required by CFAI every five years.

To remain in compliance through 2011, MCFRS must submit an annual accreditation compliance report to CFAI each July. Then, assuming that MCFRS is re-accredited in 2012, annual compliance reports would be submitted each year beginning with 2013. The yearly report verifies that MCFRS remains in compliance with core competencies established by CFAI and reflects progress being made in addressing recommendations set forth by the CFAI Peer Assessment Team that evaluated MCFRS during its site visit in April 2007. A fee of approximately \$2000 is due to CFAI annually to cover the organization's administrative costs involved in administering the accreditation program.

### **MASTER PLAN ADDITIONS**

The following new recommendations should be added to the Master Plan:

#### **SECTION 5**

##### Recommendation #105

**The MCFRS, in conjunction with the Executive and Legislative branches of County Government, must identify and implement measures to minimize fire risk involving the County's senior population and to reduce the disturbing number of fire-related casualties involving senior citizens.**

Between 1997 and 2007, 29 senior citizens (defined as age 65 and over) died in fires in Montgomery County; 41% of 71 fire fatalities of all ages. Between CY04 and CY07, seventeen senior citizens living within the County died in fires, 59% of the 29 fatalities of all ages during that four-year period. These statistics are significant in view of the fact that senior citizens comprised no greater than 11% of the county's overall population between 1997 and 2007. Due to the disturbing trend of fire deaths and injuries involving seniors, the Senior Citizen Fire Safety Task Force was established in 2006 by the County Executive and County Fire Chief and was charged with identifying strategies for minimizing fire risk to senior citizens and reducing the disturbing number of fire fatalities and injuries involving seniors. As prescribed by Executive Order 103-06, the Senior Citizen Fire Safety Task Force was charged with completing its work and submitting a final report to the County Executive by June 2008.

## 2009 UPDATE OF THE FIRE, RESCUE, EMERGENCY MEDICAL SERVICES, AND COMMUNITY RISK REDUCTION MASTER PLAN

It is of the utmost importance that the County and MCFRS find ways to reduce fire risk involving senior citizens because the number of senior residents is projected to increase from approximately 102,000 (10.8% of the county-wide population) in 2005 to 114,330 (11.6% of the county-wide population) by 2010, to 152,650 (14.4% of the county-wide population) by 2020, and to 187,790 (16.5% of the county-wide population) by 2030. Between 2005 and 2030, the senior population is expected to almost double in size (i.e., increase by 85%) compared to an overall population growth (i.e., all ages combined) of about 20%. Absent a significant reduction in fire risk involving seniors, the earlier described upward trend of fire casualties will continue or worsen.

The Senior Citizen Fire Safety Task Force had been addressing this issue before it was elevated within this Master Plan Update as an independent initiative.<sup>5</sup> The Task Force had been given the responsibility for:

- Identifying strategies to reduce fire risk among senior citizens
- Identifying strategies to reduce fire casualties among senior citizens
- Identifying needed changes to building and fire codes for new and existing structures that incorporate safety features addressing the needs of seniors
- Exploring the addition of a new “independent living” occupancy use group within national building codes/standards and model fire codes/standards
- Identifying off-the-shelf technologies that bridge the gap between new code-compliant residential occupancies and existing non-compliant residential occupancies
- Identifying demographic and community changes that impact the safety of seniors
- Identifying personal and community-based requirements and procedures that seniors and caregivers can practice to increase fire safety

As prescribed by Executive Order 103-06, the Senior Citizen Fire Safety Task Force was charged with completing its work and submitting a final report to the County Executive. Now that the report has been approved, MCFRS and its partner agencies must work diligently to implement the report’s recommendations. Due to the importance of this overall initiative, MCFRS elevated it to high-priority status beginning in FY09, with emphasis placed on establishing programs and processes to implement the Task Force’s recommendations.

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<sup>5</sup> The *Fire, Rescue, Emergency Medical Services, and Community Risk Reduction Master Plan*, adopted in 2005, had included fire safety for seniors as part of a larger risk reduction and injury prevention initiative covered in Master Plan recommendations #77 and #78. The seniors’ initiative has been elevated in significance to a stand-alone risk reduction initiative and recommendation to provide needed emphasis.

## 2009 UPDATE OF THE FIRE, RESCUE, EMERGENCY MEDICAL SERVICES, AND COMMUNITY RISK REDUCTION MASTER PLAN

### Recommendation #106

**The MCFRS must establish a comprehensive methodology and corresponding standard operating procedure (SOP) for the timely transfer of apparatus to address short-term gaps in response coverage resulting from a large-scale incident requiring many apparatus (e.g., apartment fire) or multiple concurrent incidents requiring numerous apparatus (e.g., house fire, PIC with persons pinned, several ALS incidents, several BLS incidents, and a hazmat box -- all occurring simultaneously throughout the county).**

Presently, transfer of apparatus during on-going incidents is accomplished at the discretion of the on-duty MCFRS supervisor (i.e., Captain) at the ECC. There is no automated or manual procedure in place to aid the ECC Supervisor in determining which type and number of apparatus to transfer, when to transfer them, and where to transfer them. Delays in filling temporary gaps in response coverage can place large populations and a significant number of properties at substantial risk. This problem can have serious implications when life-threatening incidents occur and apparatus must travel considerable distances from distant stations resulting in response times far exceeding goals.

The up-county area is particularly vulnerable to this capacity problem due to lack of resources and large distances between stations. For example, a “working” house fire in Germantown easily depletes much of the up-county of suppression apparatus considering the initial assignment plus the Rapid Intervention Dispatch and/or an additional alarm. If adequate numbers and types of suppression units are not transferred quickly to several of the vacated up-county stations, a large area containing well over 100,000 people and tens of thousands of occupancies will be placed at higher risk, potentially resulting in severe consequences. Having a comprehensive emergency transfer procedure in place will allow for timely transfer of appropriate apparatus to strategic locations, thus holding risk to acceptable levels.

### Recommendation #107

**The MCFRS should have adequate resources (i.e., uniformed personnel, apparatus, and equipment) in place at all times to provide an effective response to a “worst credible scenario” of concurrent incidents.**

An example of a worst credible scenario is described in Figure 5.8 (see attached). The scenario is comprised of concurrent emergency medical, fire, rescue, and special hazard (e.g., hazmat) incidents. Collectively, these incidents comprise a worst credible scenario for Montgomery County over a two-hour period. This scenario differs from a “worst case” scenario involving a series of infrequently occurring disasters happening concurrently (e.g., tornado, commercial airliner crash, passenger train derailment, building collapse, and terrorist attack – occurring concurrently), collectively having an extremely low probability of occurrence in Montgomery County. In contrast, the worst

## **2009 UPDATE OF THE FIRE, RESCUE, EMERGENCY MEDICAL SERVICES, AND COMMUNITY RISK REDUCTION MASTER PLAN**

credible scenario involves concurrent incidents, most of which – individually - occur on a frequent to moderately-frequent basis in the County. The probability of all these incidents happening concurrently over a two-hour period is relatively low but of much greater probability than a “worst case” scenario. While MCFRS may never have the quantity of resources in place to respond effectively to a worst case scenario (i.e., an acceptable risk), the department should have the resources in place to respond effectively to a worst credible scenario (i.e., an unacceptable risk).

The rationale for having adequate resources for a worst credible scenario is largely one of self-sufficiency in that the County cannot be confident that mutual-aid resources will always be available to assist. Bordering jurisdictions may be stretched thin handling their own concurrent incidents, thus providing few, if any, resources to Montgomery County. Weather events (e.g., winter storms, severe thunderstorms) may also curtail mutual aid response or delay it substantially. Having adequate MCFRS resources for a worst credible scenario also provides MCFRS a better opportunity to meet response time goals during that two-hour period. Figure 5.9 (see attached) indicates the quantity and type of resources required for each incident comprising the “worst credible” scenario. Figure 5.9 also indicates the total number and types of resources required for a “worst credible” scenario.

### **MASTER PLAN DELETIONS**

The following deletion should be made to the Master Plan:

#### Recommendation #71

Revision of Recommendation #68 (see above) will nullify the need for retaining Recommendation #71, as Recommendation #68 now includes response time goals for command officers. Recommendation #71 can; therefore, be deleted from the Master Plan. This deletion will not result in renumbering of existing recommendations higher than #71. The word “Deleted” should replace the existing language in Recommendation #71.

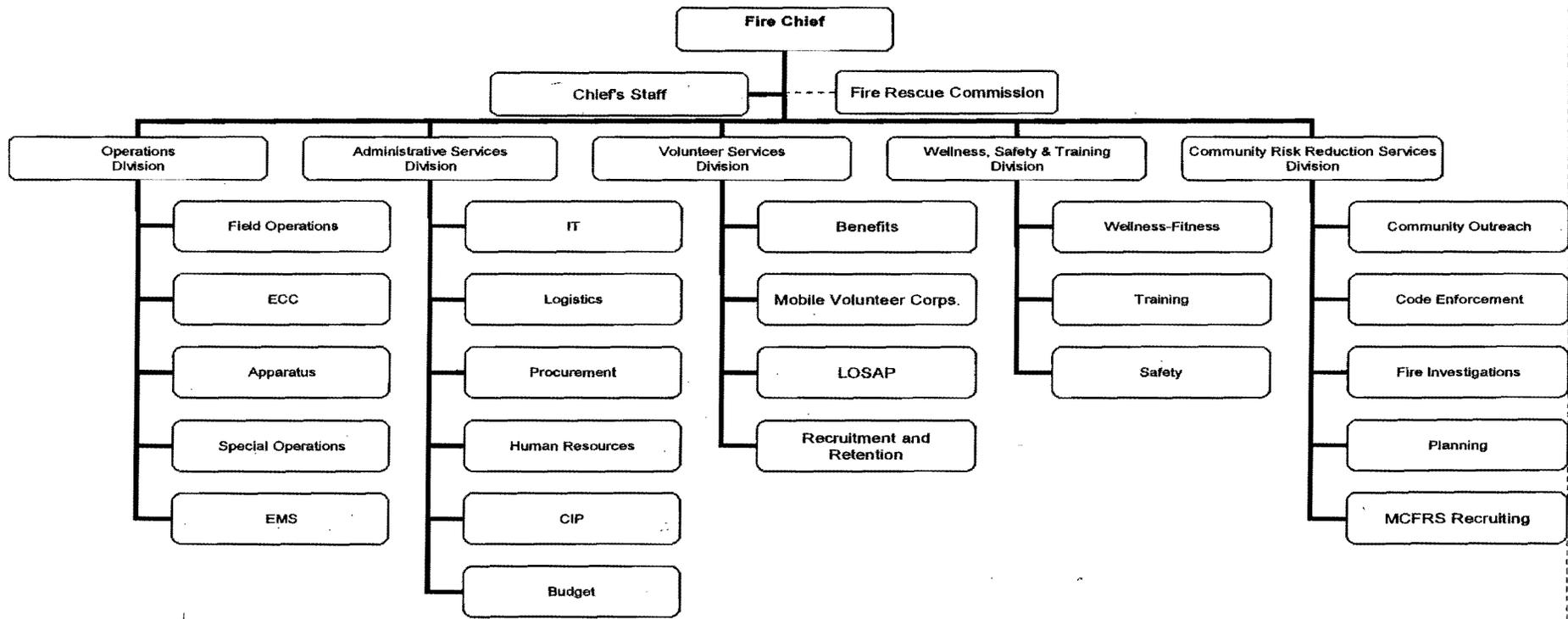
**2009 UPDATE OF THE  
FIRE, RESCUE, EMERGENCY MEDICAL SERVICES, AND  
COMMUNITY RISK REDUCTION MASTER PLAN**

**ATTACHMENTS**

- Figure 2.1**            **MCFRS Organizational Chart [Revised]**
- Figure 5.6**            **MCFRS Response Time Goals [Revised]**
- Figure 5.8**            **Worst Credible Scenario Over Two-Hour Period**
- Figure 5.9**            **Apparatus Requirements for Worst Credible Scenario  
Over Two- Hour Period**

# 2009 UPDATE OF THE FIRE, RESCUE, EMERGENCY MEDICAL SERVICES, AND COMMUNITY RISK REDUCTION MASTER PLAN

## Figure 2.1 - MCFRS ORGANIZATIONAL CHART [REVISED]



## 2009 UPDATE OF THE FIRE, RESCUE, EMERGENCY MEDICAL SERVICES, AND COMMUNITY RISK REDUCTION MASTER PLAN

**FIGURE 5.6 – MCFRS RESPONSE TIME GOALS [Revised]**

Service	Response Time Goal	Travel Time	Urban Goal	Suburban Goal	Rural Goal	NFPA 1710 Goal
Unit w/AED <sup>6</sup> to Delta- or Echo-EMS Incident	<b>6 min</b>	<b>4 min</b>	<b>90%</b>	<b>75%</b>	<b>50%</b>	<b>90%</b>
ALS response <sup>7</sup> to Charlie, Delta or Echo EMS Incidents	<b>10 min</b>	<b>8 min</b>	<b>90%</b>	<b>75%</b>	<b>50%</b>	<b>90%</b>
BLS response <sup>8</sup> to Alpha, Bravo, or certain Charlie EMS Incidents	<b>12 min<sup>9</sup></b>	<b>10 min<sup>4</sup></b>	<b>98%</b>	<b>95%</b>	<b>90%</b>	<b>N/A</b>
Transport Unit - ALS Patient <sup>10</sup>	<b>12 min</b>	<b>10 min</b>	<b>90%</b>	<b>75%</b>	<b>50%</b>	<b>N/A</b>
1 <sup>st</sup> arriving Engine to fire	<b>6 min</b>	<b>4 min</b>	<b>90%</b>	<b>75%</b>	<b>50%</b>	<b>90%</b>
2 <sup>nd</sup> arriving Engine to fire	<b>8 min</b>	<b>6 min</b>	<b>90%</b>	<b>75%</b>	<b>50%</b>	<b>N/A</b>
3 <sup>rd</sup> arriving Engine to fire	<b>10 min</b>	<b>8 min</b>	<b>90%</b>	<b>75%</b>	<b>50%</b>	<b>N/A</b>
4 <sup>th</sup> arriving Engine to fire	<b>12 min</b>	<b>10 min</b>	<b>90%</b>	<b>75%</b>	<b>50%</b>	<b>N/A</b>
5 <sup>th</sup> arriving Engine to fire	<b>14 min</b>	<b>12 min</b>	<b>90%</b>	<b>75%</b>	<b>50%</b>	<b>N/A</b>
1 <sup>st</sup> arriving Tanker <sup>11</sup>	<b>8 min</b>	<b>6 min</b>	<b>NA</b>	<b>NA</b>	<b>50%</b>	<b>N/A</b>
2 <sup>nd</sup> arriving Tanker <sup>12</sup>	<b>12 min</b>	<b>10 min</b>	<b>NA</b>	<b>NA</b>	<b>50%</b>	<b>N/A</b>
3 <sup>rd</sup> arriving Tanker <sup>13</sup>	<b>18 min</b>	<b>16 min</b>	<b>NA</b>	<b>NA</b>	<b>50%</b>	<b>N/A</b>
Extrication <sup>14</sup>	<b>9 min</b>	<b>7 min</b>	<b>90%</b>	<b>75%</b>	<b>50%</b>	<b>N/A</b>
Heavy Rescue <sup>15</sup>	<b>12 min</b>	<b>10 min</b>	<b>90%</b>	<b>75%</b>	<b>50%</b>	<b>N/A</b>
1 <sup>st</sup> arriving Aerial Unit <sup>16</sup> to fire	<b>8 min</b>	<b>6 min</b>	<b>90%</b>	<b>75%</b>	<b>50%</b>	<b>90%</b>
2 <sup>nd</sup> arriving Aerial Unit <sup>17</sup> to fire	<b>12 min</b>	<b>10 min</b>	<b>90%</b>	<b>75%</b>	<b>50%</b>	<b>N/A</b>
3 <sup>rd</sup> arriving Aerial Unit <sup>18</sup> to fire	<b>14 min</b>	<b>12 min</b>	<b>90%</b>	<b>75%</b>	<b>50%</b>	<b>N/A</b>
Full Assignment - Structure Fire <sup>19</sup>	<b>14 min</b>	<b>12 min</b>	<b>90%</b>	<b>75%</b>	<b>50%</b>	<b>10 mins. - 90%</b>
1 <sup>st</sup> -due Command Officer	<b>10 min</b>	<b>8 min</b>	<b>90%</b>	<b>75%</b>	<b>50%</b>	<b>90%</b>
2 <sup>nd</sup> -due Command Officer	<b>14 min</b>	<b>12 min</b>	<b>90%</b>	<b>75%</b>	<b>50%</b>	<b>N/A</b>

**Note A:** All stated response times are at X minute, zero seconds. Example: A first-due engine response of 6 minutes (or under) would meet the 6-minute goal, whereas 6 minutes 1 second (and above) would not.

**Note B:** New or modified goals are shown in boldface type.

<sup>6</sup> Any MCFRS unit having an AED and a minimum of 2 EMT-B or higher level providers to operate it.

<sup>7</sup> Units with ALS equipment whose combined staffing includes a minimum of 2 EMT-I (or higher level) providers and 2 EMT-B (or higher level) providers. Example: Two-person EMS unit and four-person engine having a combined staffing of an EMT-P, an EMT-I, and 4 EMT-B personnel.

<sup>8</sup> Unit (e.g., ambulance) having basic life support (BLS) equipment and a minimum of 2 EMT-B or higher level providers. Examples of BLS incidents: strains, fractures, contusions, unspecified sicknesses.

<sup>9</sup> New (i.e., higher) goal for BLS response to Alpha-, Bravo-, and certain Charlie-level incidents (as determined via Emergency Medical Dispatch protocol) reflects non-life threatening nature of these calls.

<sup>10</sup> Ambulance or medic unit. EMT-P or EMT-I from AFRA will accompany patient to hospital, if required.

<sup>11</sup> 1<sup>st</sup>-due tanker on fires in areas lacking hydrants arrives within 2 minutes of 1<sup>st</sup>-due engine

<sup>12</sup> 2<sup>nd</sup>-due tanker's arrival coincides with arrival of 4<sup>th</sup>-due engine

<sup>13</sup> 3<sup>rd</sup>-due tanker arrives approximately 2-3 minutes before 2<sup>nd</sup> tanker's water is expended

<sup>14</sup> Extrication capable unit – extrication-equipped engine or aerial unit, or heavy rescue squad

<sup>15</sup> Rescue Squad response required

<sup>16</sup> Arrival time of 1<sup>st</sup>-due aerial unit is in relation to arrival of 1<sup>st</sup> and 2<sup>nd</sup>-due engines on box alarms or adaptive responses.

<sup>17</sup> Arrival time of 2<sup>nd</sup>-due aerial unit is in relation to arrival of 3<sup>rd</sup> and 4<sup>th</sup>-due engines on box alarms.

<sup>18</sup> Arrival time of 3<sup>rd</sup>-due aerial unit (on high-rise box alarms) is in relation to arrival of 5<sup>th</sup>-due engine.

<sup>19</sup> All initial alarm units due on a standard box alarm, high-rise box alarm or non-hydranted area box alarm.

**2009 UPDATE OF THE  
FIRE, RESCUE, EMERGENCY MEDICAL SERVICES, AND  
COMMUNITY RISK REDUCTION MASTER PLAN**

**FIGURE 5.8  
WORST CREDIBLE SCENARIO OVER TWO-HOUR PERIOD**

In a “worst credible scenario,” the following types of concurrent incidents might occur over a two-hour period in Montgomery County:

- 4-alarm urban structure fire, or two 2-alarm urban structure fires
- Rural structure fire (in area lacking fire hydrants)
- A personal injury collision on a high-speed highway involving one patient with traumatic injuries (ALS patient) requiring helicopter transport and three patients with non-life threatening injuries (BLS patients) to be transported by ground
- Two personal injury collisions (PICs) on low-speed roadways involving one patient with non-life threatening injuries per PIC
- Seven single-patient ALS incidents, with five requiring AFRA or manpower unit
- Ten single-patient BLS incidents, with two requiring a manpower unit
- Fire incident requiring an adaptive response
- Fire-related service call
- EMS-related service call
- Brush fire in an area lacking hydrants
- Auto fire on interstate highway
- Unknown rescue
- Emergency transport of ALS patient between two hospitals
- Special event standby

**2009 UPDATE OF THE  
FIRE, RESCUE, EMERGENCY MEDICAL SERVICES, AND  
COMMUNITY RISK REDUCTION MASTER PLAN**

**FIGURE 5.9  
APPARATUS REQUIREMENTS FOR WORST CREDIBLE OCCURRENCE  
OVER TWO-HOUR PERIOD**

Incident Type	Engine	Aerial	Squad	Medic	Amb.	Tanker	Brush	Command
4-alarm urban structure fire, or two 2-alarm urban structure fires*	17-18	9-10	5-6	2	4			16
Rural structure fire (in area lacking hydrants)**	7	3	1	1	1	5		6
High-speed PIC: 1 patient w/traumatic injuries, 3 w/lesser injuries	2***		1	1	3			1
2 low-speed PICs: 1 patient w/non-life threatening injury per PIC	2				2			2
7 single-patient ALS incidents, 5 requiring AFRA or manpower	4	1		7				
10 single-patient BLS incidents, 2 requiring manpower unit	1	1			10			
Fire incident requiring an adaptive response	1	1						
Fire-related service call	1							
EMS-related service call					1			
Brush fire in area lacking hydrants	1					1	1	1
Auto fire on interstate highway	2****				2****			
Unknown rescue	1				1			
Special event standby				1	1			
Emergency transport of ALS patient from one hospital to another				1				
<b>TOTALS</b>	<b>39-40</b>	<b>15-16</b>	<b>7-8</b>	<b>13</b>	<b>25</b>	<b>6</b>	<b>1</b>	<b>26</b>

Amb. - ambulance

PIC - personal injury collision

RID - rapid intervention dispatch (i.e., aerial unit, rescue squad, and medic unit)

\* Resources include RID following initial alarm assignment

\*\* Resources include RID and Water Supply Task Force

\*\*\* Includes a 2nd engine to handle a helicopter standby at a nearby landing zone

\*\*\*\* Includes an engine and ambulance dispatched to each of opposing traffic lanes (e.g., inner-loop and outer-loop of I-495)

**SUMMARY OF THE PROCEEDINGS  
OF THE NOVEMBER 30, 2009 PUBLIC HEARING ON THE  
“UPDATE OF THE FIRE, RESCUE, EMERGENCY MEDICAL SERVICES,  
AND COMMUNITY RISK REDUCTION MASTER PLAN”**

On November 30, 2009, Fire Chief Richard R. Bowers hosted a public hearing on the “Update of the Fire, Rescue, Emergency Medical Services, and Community Risk Reduction Master Plan” (a.k.a., “Master Plan Update”). The public hearing was held at the Executive Office Building in the Lobby Level Auditorium beginning at 7:00 p.m. Assistant Chief Michael Donahue of the MCFRS Fire Marshal’s Office served as Hearing Officer.

**Background**

The public hearing had been announced in the Montgomery County edition of the *Gazette Newspaper* on October 28, 2009 (see attached letter of certification) and also appeared in the County’s Register for November. The public hearing announcement (copy attached) was also posted on the “mcfirs.org” web site and on MCFRS’ Facebook and Twitter sites. In addition, a MCFRS News Advisory was issued on November 23, 2009, and separate notification of the hearing was made via email to all MCFRS personnel as well as to the Montgomery County Volunteer Fire-Rescue Association, International Association of Firefighters – Local 1664, and Montgomery County Fire and Emergency Services Commission. The public hearing announcement directed interested parties to view the “Master Plan Update” on the “mcfirs.org” web site. Hard copies were made available at MCFRS headquarters and at the County’s five Regional Services Centers.

**Summary of Proceedings**

The public hearing began with a welcome by Chief Bowers followed by a presentation by MCFRS Planning Section Manager Scott Gutschick consisting of an overview (copy attached) of the “Master Plan Update.” Those who had signed up to testify were then invited to testify. First to testify was Mr. Sheldon Fishman, Chairman, Mid-County Citizens Advisory Board. The second person who had signed up to testify did not attend and did not submit a copy of her testimony to Chief Bowers beforehand or afterward.

In summary, Mr. Fishman’s testimony acknowledged the Mid-County Citizens Advisory Board’s (MCCAB) support for the Master Plan, the MCFRS mission, and the “dedicated and heroic efforts of the department’s career and volunteer personnel.” He further testified that the MCCAB supports the Master Plan’s and County Executive’s emphasis on reducing residential fire deaths/injuries and the related outcome-focused performance measure used by MCFRS. Mr. Fishman also raised the MCCAB’s concern that MCFRS had no comparable outcome measures for emergency medical services (EMS). The Board urges the County Executive to “adopt EMS patient outcome measures as a new high-priority recommendation.” One potential outcome measure suggested by the Board relates to survivability of the patient (i.e., discharge from the hospital) following EMS services provided by MCFRS as well as services provided by the hospital. The Board recommends coordination between MCFRS and hospitals in developing practical EMS outcome measures. Mr. Fishman provided copies of his testimony (copy attached). Via email, he also provided a copy of his letter (on behalf of the

## Proceedings (cont.)

MCCAB) to County Executive Isiah Leggett dated November 30, 2009 which mirrored the comments made in his public hearing testimony.

Following Mr. Fishman's testimony, Chief Bowers informed Mr. Fishman and other attendees that MCFRS had recently developed an EMS headline measure pertaining to cardiac care. The measure addresses advanced life support services for ST-segment elevation myocardial infarction (STEMI) patients. The indicator for this EMS measure is the percentage of EMS-identified STEMI patients receiving balloon catheterization in a cardiac catheterization lab within 90 minutes of STEMI onset, for 90% of STEMI incidents. Chief Bowers noted that MCFRS had recently reported results to the CountyStat Office [FY09 – Quarter 4 and FY10 – Quarter 1] and that performance concerning this measure would be reported quarterly from this point forward. He also mentioned that MCFRS had achieved a 100% result during one of the quarters [FY09 – Quarter 1].

The audience was then encouraged by Chief Bowers to ask questions or provide comment. As there were none, Chief Bowers adjourned the public hearing and thanked those attending and testifying.

### Notes:

- A digital recording of the public hearing was made by the Hearing Officer. A transcript will be prepared and made available upon request.
- A copy of the public hearing sign-in sheet is attached to this summary of proceedings (attachment)

### Attachments

**Fire, Rescue, Emergency Medical Services, and  
Community Risk Reduction Master Plan  
Public Hearing  
November 30, 2009**

Montgomery County Fire Chief Richard Bowers,

Thank you for the opportunity to provide comments on the Fire, Rescue, Emergency Medical Services, and Community Risk Reduction Master Plan. I am Sheldon Fishman, Chair of the Mid-County Citizens Advisory Board (MCCAB). With me is Gam Wijetunge, MCCAB's Parliamentarian and Chair of our Quality of Life Committee.

The Mid-County Citizens Advisory Board (MCCAB) strongly supports the mission of the Montgomery County Fire Rescue Service (MCFRS) to keep our communities safe and healthy. We applaud the dedicated and heroic efforts of MCFRS' career and volunteer personnel in providing our County with world class fire, rescue and emergency medical services (EMS). The MCCAB's comments on the Master Plan are intended to help build on this tradition of excellence.

In general, the MCCAB is pleased with the Master Plan's emphasis on performance measures and ongoing performance improvement. This is in keeping with the County Executive's use of the CountyStat program to foster outcome-focused performance management.

The MCCAB notes that the Master Plan, as well as the County Executive's FY10 budget proposal, includes reducing residential fire deaths and injuries as an outcome-focused performance measure. Mid-County residents, particularly the many senior citizens living in the Mid-County area, have previously expressed support for reducing residential fire deaths and injuries. This outcome measure justifies the process-oriented measures included in the Master Plan such as response time goals for fire engines.

However, the MCCAB is concerned that no comparable EMS outcome measures are included. The MCCAB urges the County Executive to adopt EMS patient outcome measures as a new high priority recommendation in the Master Plan. Outcome measures such as survival to hospital discharge and other EMS patient outcomes should be considered. Process measures such as EMS response times should accompany these outcome measures provided they have demonstrated impact on the patient outcome. The MCCAB recognizes the technical complexity of patient outcome measures and recognizes the additional legal and regulatory requirements, such as the Health Insurance Portability and Accountability Act (HIPAA). We recommend coordination with stakeholders, such as hospitals, in developing practical outcome measures.

The MCCAB sincerely believes that the MCFRS saves lives and contributes significantly to our quality of life in Montgomery County. However, we must be able to measure that contribution and to determine how it can be improved. A Master Plan which focuses on

measuring this impact can only improve the MCFRS, improve the quality of life of Montgomery County citizens, and assist with the wise allocation of County resources.

We urge you to incorporate these important changes into the 2009 update of the Master Plan.

Submitted by:

Sheldon Fishman, Chair  
Mid-County Citizens Advisory Board  
2424 Reddie Drive – Wheaton, MD 20902



MID-COUNTY CITIZENS ADVISORY BOARD

November 30, 2009

The Honorable Isiah Leggett  
Montgomery County Executive  
101 Monroe Street  
Rockville, Maryland 20850

Dear Mr. Leggett:

The Mid-County Citizens Advisory Board (MCCAB) strongly supports the mission of the Montgomery County Fire Rescue Service (MCFRS) to keep our communities safe and healthy. We applaud the dedicated and heroic efforts of MCFRS' career and volunteer personnel in providing our County with world-class fire, rescue and emergency medical services (EMS). The MCCAB's comments on the Master Plan are intended to help build on this tradition of excellence.

In general, the MCCAB is pleased with the Master Plan's emphasis on performance measures and ongoing performance improvement. This is in keeping with the use of the CountyStat program to foster outcome-focused performance management.

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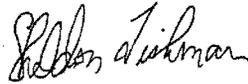
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The Honorable Isiah Leggett  
November 30, 2009  
Page 2

We urge you to incorporate these important changes into the 2009 update of the Master Plan.

Sincerely,

A handwritten signature in cursive script, appearing to read "Sheldon Fishman".

Sheldon Fishman  
Chair

cc: County Council  
Chief Richard Bowers

# The Gazette

9030 Comprint Court, Gaithersburg, MD 20877 301-846-2100

This is to certify that the annexed advertisement of PUBLIC HEARING DRAFT FIRE-RESCUE MASTER PLAN UPDATE was published in all of the Montgomery county Gazette newspapers, a weekly newspaper published in Montgomery County, Maryland. The ad appeared once a week for 1 week (s), before 10/29/09.

Copy of Ad Attached  
Ad Order Number 1623361

Publication Dates

10/28/09

**PUBLIC HEARING ON  
DRAFT FIRE-RESCUE MASTER PLAN UPDATE**

A Public Hearing concerning the draft "Update of the Fire, Rescue, Emergency Medical Services, and Community Risk Reduction Master Plan" ("Master Plan Update") will be hosted by Montgomery County Fire Chief Richard R. Bowers on Monday, November 30, 2009 at 7 p.m. in the Lobby Auditorium of the Executive Office Building, 101 Monroe Street, Rockville. Public parking is available on the lower level of the nearby County Office Building Parking Garage located at Monroe Street and East Jefferson Street.

The draft Master Plan Update includes proposed changes to response time goals, delivery of advanced life support services, and four-person staffing implementation, among other changes. The document also proposes additional recommendations addressing various aspects of fire-rescue related risk. Major revisions, additions and deletions being proposed in the document could require amendments to the "Fire, Rescue, Emergency Medical Services, and Community Risk Reduction Master Plan." The draft Master Plan Update can be viewed at the Montgomery County Fire and Rescue Service headquarters at 101 Monroe Street, any of the County's Regional Services Centers, or on-line at [www.mcfrrs.org](http://www.mcfrrs.org).

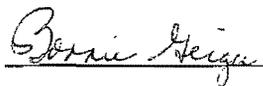
Those wishing to testify during the Public Hearing must contact Cecilia Johnson no later than November 24, at 240-773-8945 or at [Cecilia.Johnson@montgomerycountymd.gov](mailto:Cecilia.Johnson@montgomerycountymd.gov). The opportunity to testify will be given to the first 30 persons requesting to testify.

Individuals representing themselves or their household will be given 3 minutes to testify, and those representing a group or organization will have 5 minutes. Those testifying are asked to provide a written copy of their testimony to Chief Bowers at the Public Hearing.

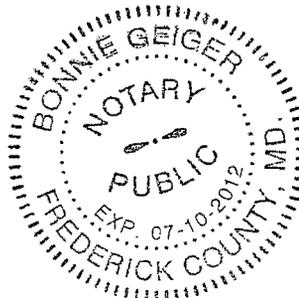
Persons having disabilities that need any services or aids to participate should contact Mrs. Johnson no later than November 23.

1623361 (10-28-09)

Gazette Legal Advertising Department

  
\_\_\_\_\_

Notary  
My Commission Expires \_\_\_\_\_





# Montgomery County Fire and Rescue Service

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## NEWS ADVISORY

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**Richard Bowers, Fire Chief**

Executive Office Building, 101 Monroe St, 12th Floor, Rockville, MD 20850

CONTACT: Scott Gutschick 240.777.2417

IMMEDIATE RELEASE: November 23, 2009

### PUBLIC HEARING ON DRAFT FIRE-RESCUE MASTER PLAN UPDATE

A Public Hearing concerning the draft "Update of the Fire, Rescue, Emergency Medical Services, and Community Risk Reduction Master Plan" ("Master Plan Update") will be hosted by Montgomery County Fire Chief Richard R. Bowers on Monday, November 30, 2009 at 7 p.m. in the Lobby Auditorium of the Executive Office Building, 101 Monroe Street, Rockville. Public parking is available on the lower level of the nearby County Office Building Parking Garage located at Monroe Street and East Jefferson Street.

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###

**NOVEMBER 30, 2009 PUBLIC HEARING ON FIRE-RESCUE MASTER PLAN UPDATE**

NAME	ADDRESS	AFFLIATION	PHONE NUMBER	EMAIL ADDRESS
Minna Davidson	100 Maryland Ave Rockville 20850	Council staff	240 777-7935	minna.davidson@montgomerycounty.md.gov
Gannu Wijetunge	350 G St. SW #1612 Washington DC 20024	MCCAB	240-535-5709	gann@wvrs.org
Shelley Fishman	9913 Danna Dr Silver Spring MD	MCCAB	301-881-6986	shelley.fishman@gmail.com
KUMAR VASWANI	PO Box 5946 Bethesda MD	BCCRS	301-326-7883	kumar.vaswani@bccrs.org
MARGIE HYSLOP	GAZETTE	GAZETTE	301-670-2042	mhslop@gazette.net
Jeff Hearle	7529 Heatherston Ln Potomac MD 20854	Western MCCAB	3/641-0493	jeff.hearle@verizon.net

# OVERVIEW OF MASTER PLAN UPDATE FOR PUBLIC HEARING



NOVEMBER 30, 2009

# MANDATE FOR UPDATING MASTER PLAN

- ***FIRE-RESCUE MASTER PLAN* (p. 1-20) CALLS FOR COMPREHENSIVE REVIEW 18 MONTHS AFTER COUNTY FIRE CHIEF TAKES OFFICE**
- **REQUIREMENT PREDICATED ON COUNTY FIRE CHIEF REQUIRING 18 MONTHS INTO TENURE TO REVIEW PLAN AND DETERMINE WHETHER IT REFLECTED HIS VISION AND PRIORITIES**

# **TIMELINE FOR DEVELOPMENT & REVIEW**

- **STAFF REVIEW BEGAN JULY 2006**
- **STAFF REVIEW CONCLUDED MAY 2007**
- **UPDATES DRAFTED 2007; FINALIZED 2008**
- **DRAFT UPDATE CIRCULATED FOR REVIEW  
FEBRUARY- MARCH 2008**
- **DRAFT SUBMITTED TO FIRE CHIEF APRIL 2008**
- **DRAFT REVIEWED BY ACTING FIRE CHIEF IN  
NOVEMBER 2008**

# VISION AND MISSION CHANGES

- **Vision**: The Montgomery County Fire and Rescue Service vision is to keep our communities safe and healthy by providing the best fire, rescue, and emergency medical services, utilizing career and volunteer resources.
- **Mission**: The Mission of the Montgomery County Fire and Rescue Service is to protect lives, property, and the environment with comprehensive risk reduction programs; and safe, efficient, and effective emergency response provided by skilled, motivated, and compassionate career and volunteer service providers representing Montgomery County's diverse population.

# CHANGES TO GUIDING PRINCIPLES

**Our Montgomery County Fire and Rescue Service providers will:**

- **Deliver services to our customers with impartiality and excellence**
- **Promote the highest standards of safety and welfare**
- **Serve with integrity and mutual respect**
- **Recognize the importance of diversity of our workforce and communities**
- **Promote the efficient and effective utilization of our resources, and ensure that all organizations and personnel comprising the MCFRS share the responsibility for continuously improving their capabilities, effectiveness, and efficiency**

# **CHANGES TO GUIDING PRINCIPLES (cont.)**

- **Be responsible for the honor of our profession and public service**
- **Promote equity and harmony among career and volunteer personnel**
- **Maintain and promote open honest communication, creativity, and competence**
- **Be accountable and ethical**
- **Continuously improve public confidence and trust**

# **UPDATES TO RECOMMENDATION #3**

## **ADD THE FOLLOWING FACILITY AND SERVICE NEEDS TO RECOMMENDATION #3:**

- **INTERIM SERVICE FOR TRAVILAH AREA**
- **STATION 25 EXPANSION**
- **SERVICE AND FACILITY NEEDS IN WHITE FLINT/NORTH  
BETHESDA AREA**
- **JOINT PUBLIC SAFETY HEADQUARTERS**

# ALS FOUR-PERSON STAFFING IMPLEMENTATION

Update Recommendation #32 to specify the order in which units will receive ALS four-person staffing:

- Phase 1: Engines 708, 714, 717, 723, 728, 729, 731;  
AT708 IMPLEMENTED
- Phase 2A: Engines 701, 716, 721, 724 IMPLEMENTED
- Phase 2B: Engines 706, 712, 718, 719 IMPLEMENTED

## ALS FOURTH-PERSON STAFFING IMPLEMENTATION (cont.)

- Phase 3: Engines 702, 704, 710, 713, 720, 726, 730, 733, 734
- Phase 4: E711, E740, T702, T712, T731, AT718, AT729, AT35, RS729
- Phase 5: Trucks 706, 710, 725, 740; AT19, AT23, EW709, RS703
- Phase 6: Rescue Squads 715, 717, 742; E705, E715, T715, AT703

NOTE: Phases 3-6 of the staffing strategy also call for providing dedicated drivers for Tankers 704, 709, 714, 717, 722, 730, and 731

# **REORDERING OF ALS FOUR-PERSON STAFFING IMPLEMENTATION (cont.)**

**Selection of specific units for inclusion in each of Phases 3 - 6 is based upon the following factors:**

- **Transition to the “1 and 1” ALS deployment model**
- **Provision of tanker drivers, using the 4th person from the engine for tanker responses (applies until Phase 6 is completed)**
- **Provision of additional staffing for special teams/special operations**
- **Provision of additional staffing for high call load areas**
- **Current level of volunteer staffing on apparatus**
- **Staffing levels that will assist in confining structure fires to room of origin**

# **NEW ALS SERVICE DELIVERY MODEL**

**Revise Recommendation #41 to indicate new ALS service delivery and staffing model:**

- **Fire-based EMS system**
- **Implement “1 and 1” ALS deployment model incrementally**
- **Minimum staffing composition of medic units changed from 2 paramedics to 1 paramedic and 1 EMT-B**
- **2<sup>nd</sup> paramedic position on existing medic units reassigned to serve as 4<sup>th</sup> position (i.e., firefighter-paramedic) on engine at same station as medic unit, thus creating an ALS first-responder apparatus (AFRA) in addition to the medic unit**

## **NEW ALS SERVICE DELIVERY MODEL (cont.)**

- **Advanced life support (ALS) first-responder apparatus (“AFRA”) would typically respond along with that station’s medic unit, or another available medic unit, to ALS incidents**
- **Configuration provides for collective response of 2 paramedics and 4 Emergency Medical Technicians – Level B (EMTBs) onboard AFRA and medic unit**
- **Increases effectiveness of ALS patient care while also meeting National Fire Protection Association Standard 1710 staffing requirements for engines**
- **Provides paramedics with enhanced opportunity to integrate into fire suppression activity**

# REVISION OF RESPONSE TIME GOALS

- **Replace matrix (Table 5.6) of fire-rescue response time goals, with changes shown in bold**
- **Primary change involves EMS goals to reflect 5 categories of EMS calls (Alpha, Bravo, Charlie, Delta, Echo) used in EMD**
- **Change of percentages associated with density zones for consistency purposes: all urban goals changed to 90%, all suburban goals to 75%, all rural goals to 50%**
- **Change of BLS goal from 6 to 12 minutes due to non-life threatening nature of BLS incidents. Change would result in less incidences of medic units dispatched to BLS incidents when closest ambulances are committed.**
- **Addition of goals for 5th due engine, 3rd due aerial unit, and command officers on major incidents**

## REVISED RESPONSE TIME GOALS

+ Service	Response Time Goal	Travel Time	Urban Goal	Suburban Goal	Rural Goal	NFPA 1710 Goal
Unit w/AED to Delta- or Echo- EMS Incident	6 min	4 min	90%	75%	50%	90%
ALS response to Charlie, Delta or Echo EMS Incidents	10 min	8 min	90%	75%	50%	90%
BLS response to Alpha, Bravo, or certain Charlie EMS Incidents	12 min	10 min	98%	95%	90%	N/A
Transport Unit - ALS Patient	12 min	10 min	90%	75%	50%	N/A
1 <sup>st</sup> arriving Engine to fire	6 min	4 min	90%	75%	50%	90%
2 <sup>nd</sup> arriving Engine to fire	8 min	6 min	90%	75%	50%	N/A
3 <sup>rd</sup> arriving Engine to fire	10 min	8 min	90%	75%	50%	N/A
4 <sup>th</sup> arriving Engine to fire	12 min	10 min	90%	75%	50%	N/A
5 <sup>th</sup> arriving Engine to fire	14 min	12 min	90%	75%	50%	N/A
1 <sup>st</sup> arriving Tanker	8 min	6 min	NA	NA	50%	N/A
2 <sup>nd</sup> arriving Tanker	12 min	10 min	NA	NA	50%	N/A
3 <sup>rd</sup> arriving Tanker	18 min	16 min	NA	NA	50%	N/A
Extrication	9 min	7 min	90%	75%	50%	N/A
Heavy Rescue	12 min	10 min	90%	75%	50%	N/A
1 <sup>st</sup> arriving Aerial Unit to fire	8 min	6 min	90%	75%	50%	90%
2 <sup>nd</sup> arriving Aerial Unit to fire	12 min	10 min	90%	75%	50%	N/A
3 <sup>rd</sup> arriving Aerial Unit to fire	14 min	12 min	90%	75%	50%	N/A
Full Assignment - Structure Fire	14 min	12 min	90%	75%	50%	10 mins. - 90%
1 <sup>st</sup> due Command Officer	10 min	8 min	90%	75%	50%	90%
2 <sup>nd</sup> due Command Officer	14 min	12 min	90%	75%	50%	N/A

Note A: All stated response times are at X minute, zero seconds. Example: A first-due engine response of 6 minutes (or under) would meet the 6-minute goal, whereas 6 minutes 1 second (and above) would not.

Note B: New or modified goals are shown in boldface type.

# **ADDITIONAL RECOMMENDATIONS**

## **Addition of Recommendations 105-107:**

- **#105: Minimization of fire risk as it relates to senior residents**
- **#106: Minimization of countywide fire, rescue, and EMS risk related to apparatus transfer during single or concurrent in-County incidents involving large deployment of resources**
- **#107: Minimization of fire, rescue, and EMS risk related to having adequate everyday resources in place throughout the County to respond effectively to “worst credible” scenarios involving concurrent in-county incidents over a 2-hr period**

APPARATUS REQUIREMENTS FOR WORST CREDIBLE SCENARIO OF CONCURRENT INCIDENTS OVER 2-HOUR PERIOD

Incident Type	Engines	Aerials	Squads	Medics	Ambulances	Tankers	Brush Units	Command
4-alarm urban structure fire, or two 2-alarm urban structure fires*	17-18	9-10	5-6	2	4			16
Rural structure fire (in area lacking hydrants)**	7	3	1	1	1	5		6
High-speed PIC: 1 patient w/traumatic injuries, 3 w/lesser injuries	2***		1	1	3			1
2 low-speed PICs: 1 patient w/non-life threatening injury per PIC	2				2			2
7 single-patient ALS incidents, 5 requiring AFRA or manpower	4	1		7				
10 single-patient BLS incidents, 2 requiring manpower unit	1	1			10			
Fire incident requiring an adaptive response	1	1						
Fire-related service call	1							
EMS-related service call					1			
Brush fire in area lacking hydrants	1					1	1	1
Auto fire on interstate highway	2****				2****			
Unknown rescue	1				1			
Special event standby				1	1			
Emergency transport of ALS patient from one hospital to another				1				
<b>TOTALS</b>	<b>39-40</b>	<b>15-16</b>	<b>7-8</b>	<b>13</b>	<b>25</b>	<b>6</b>	<b>1</b>	<b>26</b>
PIC - personal injury collision    RID - rapid intervention dispatch (aerial unit, rescue squad, and medic unit)								
* Resources include RID following initial alarm assignment								
** Resources include RID and Water Supply Task Force								
*** Includes a 2nd engine to handle a helicopter standby at a nearby landing zone								
**** Includes an engine and ambulance dispatched to each of opposing traffic lanes (e.g., inner-loop and outer-loop of I-495)								

64

**ANSWERS TO PUBLIC SAFETY COMMITTEE QUESTIONS  
ON FIRE-RESCUE MASTER PLAN UPDATE  
FOR FEBRUARY 24, 2010 WORKSESSION**

**Q: Page 5, Recommendation 1 - add an eighth phase of the Station Location Study for the White Flint, Twinbrook area. Considering the discussions of a new station in the context of the White Flint Sector Plan, will a station location study still be needed?**

A: Yes, the 8<sup>th</sup> Phase of the Station Location and Resource Allocation Study – addressing the White Flint/North Bethesda/Twinbrook area – is still needed and, in fact, is in progress. While land is being earmarked for a fire station/police substation in the White Flint Sector Plan as a suitable location for that joint-use facility, the Phase 8 Study is examining the area-wide fire-rescue needs and will make recommendations for facility and resource needs for serving the greater White Flint/North Bethesda/Twinbrook/South Rockville area concerning fire-rescue service demand.

**Q: Page 6-7, Recommendation 3i - similar issue. Are the three alternatives described in the recommendation still in play?**

A: Yes, the three alternatives described in Recommendation 3i remain in play. Although the third alternative (Alt. “C” – relocation of Station 23) is gaining momentum within discussion of the draft White Flint Sector Plan, the other two alternatives will also be considered within the context of the Phase 8 Study. If Alternative C – relocating Station 23 about ½ to ¾ mile further south along the Rockville Pike corridor – was to be recommended as a result of the Phase 8 Study, potential sites would need to be identified and evaluated during a site evaluation process. While the potential Randolph Road /Maple Avenue site identified during the White Flint Sector Plan discussions looks promising, an equal or more suitable site in that vicinity could evolve. If Alternatives “A” and “B” (taken individually or together) were recommended as a result of the Phase 8 Study, then potential sites for an additional station in the vicinity of Rockville Pike and Tuckerman Lane would need to be evaluated and/or Station 23 would need to be expanded on its existing site, utilizing any adjacent property that might become available.

**Q. Pages 9-10, Recommendation 32 - New phases for 4-person staffing. In Phases 3 and 4, it says that engines with an ALS kit plus a paramedic will have the capacity to respond as AFRAs. Will some 4-person engines be staffed without paramedics? Will the ECC have to keep track of which 4-person engines are AFRAs and which are not?**

A: It is MCFRS' intention to have all frontline engines serve as AFRAs in conjunction with implementation of 4-person staffing. Presently, all 4-person engines and Tower 708 have paramedic capability with ALS equipment.

**Q: Phases 4, 5, and 6 would add 4-person staffing for aerial units and rescue squads. Would these units also be staffed to serve as AFRAs?**

A: For the most part, aerial units and rescue squads will not function as AFRAs. Depending upon ALS service demand in a particular station area, certain aerial units and rescue squads might be staffed and equipped to function as AFRAs, but this decision would be made on a case-by-case basis. One such case is Aerial Tower 708 that has served as an AFRA for several years, along with Engine 708, due to the extraordinary ALS demand in the Gaithersburg/Montgomery Village area which is also served by two medic units staffed 1 and 1 (i.e., 1 paramedic and 1 EMS provider at the EMT-B or higher level).

**Q: Page 11, Recommendation 41 - new ALS service delivery model. I had trouble understanding this explanation, especially the following sentences:**

**"The department's intent is to implement the "1 and 1" ALS deployment model incrementally, whereby minimum staffing composition of medic units is changed from two paramedics to one paramedic and one emergency Medical Technician (EMT) - typically a firefighter. The second paramedic position on existing medic units would be reassigned to serve as the fourth position (i.e., firefighter-paramedic) on an engine..."**

**Is the model really being changed incrementally? The minimum staffing regulation has already been amended to say that one ALS provider and one provider at either the ALS or BLS level must ride on an ALS unit. How many ALS units are currently staffed with two paramedics?**

A: Yes, the model has been, and continues to be implemented incrementally, and implementation is nearly complete. Career-staffed Medic Units 704 (Sandy Spring) and 730 (Cabin John) remain staffed 24/7 by two paramedics. At such time when 4-person staffing is implemented at Stations 4 and 30 (i.e., adding a fourth person on Engines 704 and 730), staffing of Medic Units 704 and 730 will be changed to 1 and 1, with the 2<sup>nd</sup> paramedic position moving to the engine to function as a firefighter-paramedic. In addition, Medic 741 (B-CC Rescue Squad), career-staffed during daytime hours, Monday-Friday, is staffed by two paramedics. Discussions between the Operations Division Chief and the BCCRS leadership are underway concerning potential 1 and 1 staffing of Medic 741.

**Q: Page 16, Recommendation 106 - establish an SOP to transfer apparatus to address short-term gaps in service. The description of this issue says that there is no automated or manual procedure to aid the ECC Supervisor in determining which type and number of apparatus to transfer, when to transfer them, and where to**

**transfer them. Is this issue being addressed in the current business process analysis of the ECC?**

A: No, this issue is not being addressed in the current business analysis of the ECC. The issue must be addressed at the division level by the Operations Division, not at the section level [ECC]. While ECC staff will be responsible for implementing the SOP once it has been established, it is the Operations Division that must develop a SOP and any associated technological means to execute apparatus transfers quickly and effectively to address countywide risk during times of heavy call volume and/or major incidents.

**Q: Page 16, Recommendation 107 - resources for worst credible scenario. How did MCFRS determine which events might make up a worst credible scenario (see Figure 5.8)? Figure 5.9 shows how many resources might be needed for the worst credible scenario in Figure 5.8, but does not indicate whether the County has enough resources to meet the demand, or enough resources to meet the demand and adequately staff for general business while the worst case is going on. The Committee may want to know more about the implications of this recommendation before they approve it.**

A: This was a first time attempt at producing this type of risk assessment. The purpose of creating the “worst credible scenario” is to identify a credible combination of incident types over a two-hour period, so that the County can determine whether there are sufficient resources and the capacity to handle the concurrent service demand without relying upon mutual aid from other jurisdictions that might be facing their own worst credible scenarios. The recent back-to-back major snowstorms that impacted the entire DC metropolitan area, including all counties sharing our borders, is a prime example of each county – Montgomery County included - needing to establish a comfortable and reasonable level of self-sufficiency.

The incidents included in the worst credible scenario (see Figure 5.8) came about by examining MCFRS data to determine two-hour averages (e.g., number of ALS, BLS and PIC incidents) and through drawing upon the knowledge of experienced fire-rescue personnel. We feel that it represents a valid cross-section of incident types that would be credible over a two-hour period. It represents a combination of everyday, routine incidents having a high probability of occurrence with plausible incidents having a lower probability of occurrence (e.g., 4-alarm urban structure fire, or two 2-alarm fires) in order to create a worst credible scenario.

The chart in Figure 5.9 indicates that given the worst credible scenario described in Figure 5.8, MCFRS needs the following minimum quantity and type of apparatus to effectively handle the corresponding service demand without relying upon mutual aid resources: 39-40 engines, 25 ambulances, 15-16 aerial units, 13 medic units, 7-8 rescue squads, 6 tankers, and a brush unit, plus 26 command units/personnel. When comparing these units to that which the County has presently, the result is a deficiency/shortfall of 6-7 engines and 2-3 aerial units. From a planning perspective, it is obvious that additional stations are needed if we are to deploy these units strategically and effectively. Planned

additional stations including Station 32 (Travilah), Station 36 (Shady Grove), and Station 37 (East County) will house some of these needed units. As a result of ongoing and future phases of the Station Location and Resource Allocation Study, additional stations could well be needed in the northeastern and western portions of the County where the remainder of these units could be deployed in the future.

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AND COMMUNITY RISK REDUCTION MASTER PLAN**

**SECTION 2**

**MCFRS ORGANIZATIONAL STRUCTURE,  
DOCTRINE, GOALS, PERSONNEL, AND  
PARTNERSHIPS**

Section 2 addresses the organizational structure of the Montgomery County Fire and Rescue Service, MCFRS vision, mission, guiding principles and goals; partnerships with other fire-rescue service organizations, governmental agencies and private sector organizations; and the personnel who administer, manage, and operate the MCFRS.

**ORGANIZATIONAL STRUCTURE AND PARTNERSHIPS**

The Fire-Rescue Service in Montgomery County is comprised of several organizations and partner organizations working together with the common goal of providing quality fire-rescue services to our primary customers -- the County's residents, businesses, and visitors. Although each component organization plays an important role, the main organizational structure<sup>1</sup> of the day-to-day operation consists of the Office of the Fire Chief; Operations Division; Volunteer Services Division; Community Risk Reduction Services Division; Wellness, Safety, and Training Division; and Administrative Services Division; together comprising the Montgomery County Fire and Rescue Service (see organizational chart in **Figure 2.1** below). The MCFRS is a public-private partnership between the County and 19 local fire and rescue departments (LFRDs), which are independent, state-chartered corporations. This partnership has existed for over 75 years and is expected to continue in accordance with Chapter 21, County Code, as amended.

As of January 1, 2005, the Fire and Rescue Commission is a stand-alone body within the Executive Branch of the County Government whose primary duty is advising the Fire Chief, County Executive, and County Council on policies, standards, procedures, plans and programs pertaining to fire, rescue, and EMS services.

Each fire-rescue organization and its component divisions, sections, and offices are described below.

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<sup>1</sup> Established January 1, 2005 in accordance with County Code, Chapter 21, as amended (by Bill 36-03). The Divisions of Community Risk Reduction Services; Wellness, Safety, and Training; and Administrative Services were established by the Fire Chief in January 2005.

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**AND COMMUNITY RISK REDUCTION MASTER PLAN**

OFFICE OF THE FIRE CHIEF, MCFRS

The Fire Chief is the uniformed department head of the MCFRS and has all powers of a County department director. The Fire Chief has full authority over all fire, rescue and EMS services in the County, including those provided by the LFRDs. The Fire Chief must implement County law, regulations, and policies to effectively administer the MCFRS. The Fire Chief must also meet regularly with senior MCFRS staff and the authorized LFRD representative to communicate policy, evaluate the effectiveness of the integrated MCFRS, and receive advice on the development of policies and delivery of services. In addition, the Fire Chief may take disciplinary action against any employee or volunteer in the MCFRS, including those in LFRDs, for violating any County law, regulation, policy, procedure, or any lawful order of the Fire Chief or his/her designee. Reporting directly to the Fire Chief are five Division Chiefs, all of equal rank (i.e., Deputy Chief). Each division is described below.

OPERATIONS DIVISION, MCFRS

The Division Chief of the Operations Division (“Operations Chief”) is a merit position reporting directly to the Fire Chief. The Operations Chief must meet the requirements of chief officer adopted under Section 21-8 of Chapter 21. The Operations Chief has operational authority over fire, rescue, and EMS activities of the MCFRS, as assigned by the Fire Chief. The Operations Chief, along with the Volunteer Services Division Chief, promotes the integration of activities of career and volunteer firefighter-rescuers. The Operations Chief, subject to the authority of the Fire Chief, may take disciplinary action against any merit system employee in the MCFRS, subject to applicable merit system regulations and collective bargaining agreements.

The Operations Division is comprised of the following sections:

- Field Staffing
- Emergency Medical Services (EMS) Section
- Special Operations Section:
  - Hazardous Incident Response Team (HIRT)
  - River Rescue and Tactical Services (RRATS) Team – swift water and under water
  - Urban Search and Rescue (Collapse Rescue) Team
  - Honor Guard
- Emergency Communications Center
- Apparatus Section

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AND COMMUNITY RISK REDUCTION MASTER PLAN**

**\* CAREER FIRE-RESCUE OFFICERS ASSOCIATION**

- Membership includes the ranks of Lieutenant through Division Chief.
- Addresses issues related to salaries and benefits, policies, and budget, and provides input on issues related to the fire-rescue service.

**\* HISPANIC FIREFIGHTERS ASSOCIATION**

Purpose:

- Provides life safety education for all Montgomery County citizens with a focus on the Hispanic community.
- Creates and implements programs that foster feelings of security and confidence from the Hispanic community toward the fire-rescue service.
- Achieves HFA goals by actively participating in the Hispanic community and producing quality programs benefiting the total community.

5-10 Year Goals:

- Delivery of a Pedestrian Safety Program, with an overall Fire Safety Program, aimed at children and adults.
- Visibility of MCFRS personnel at community events.
- Continued recruitment of Hispanic firefighters.
- Bringing the National HFA Conference to Montgomery County.
- Bringing the National HFA Office to Montgomery County.
- Creating two new educational programs aimed at the Hispanic community.
- Continued monitoring of recruitment, retention and promotion of Hispanic firefighters.
- Participating in political issues that affect the fire-rescue profession.

**\* PROGRESSIVE FIREFIGHTERS UNITED OF MONTGOMERY CO.**

Purpose:

- To create a liaison between African American firefighter-rescuers throughout the County
- To aid the County's African American community in the area of fire safety
- To promote interracial progress throughout the Fire Service
- To participate in recruiting competent African Americans for MCFRS employment
- To motivate MCFRS African American firefighter-rescuers to seek advancement to elevated ranks throughout the MCFRS

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AND COMMUNITY RISK REDUCTION MASTER PLAN**

**MCFRS ORGANIZATIONAL DOCTRINE**

**MCFRS VISION STATEMENT**

The Vision of the Montgomery County Fire and Rescue Service is to **keep our communities safe and healthy by providing comprehensive and effective life safety and property protection services through diverse partnerships.**

**MCFRS MISSION STATEMENT**

The Mission of the combined and integrated Montgomery County Fire and Rescue Service is to **protect life, property and the environment with:**

- **comprehensive emergency medical, fire, and disaster prevention/educational programs, and**
- **delivery of efficient and effective readiness, response, and emergency management;**

**through skilled, motivated and compassionate service providers.**

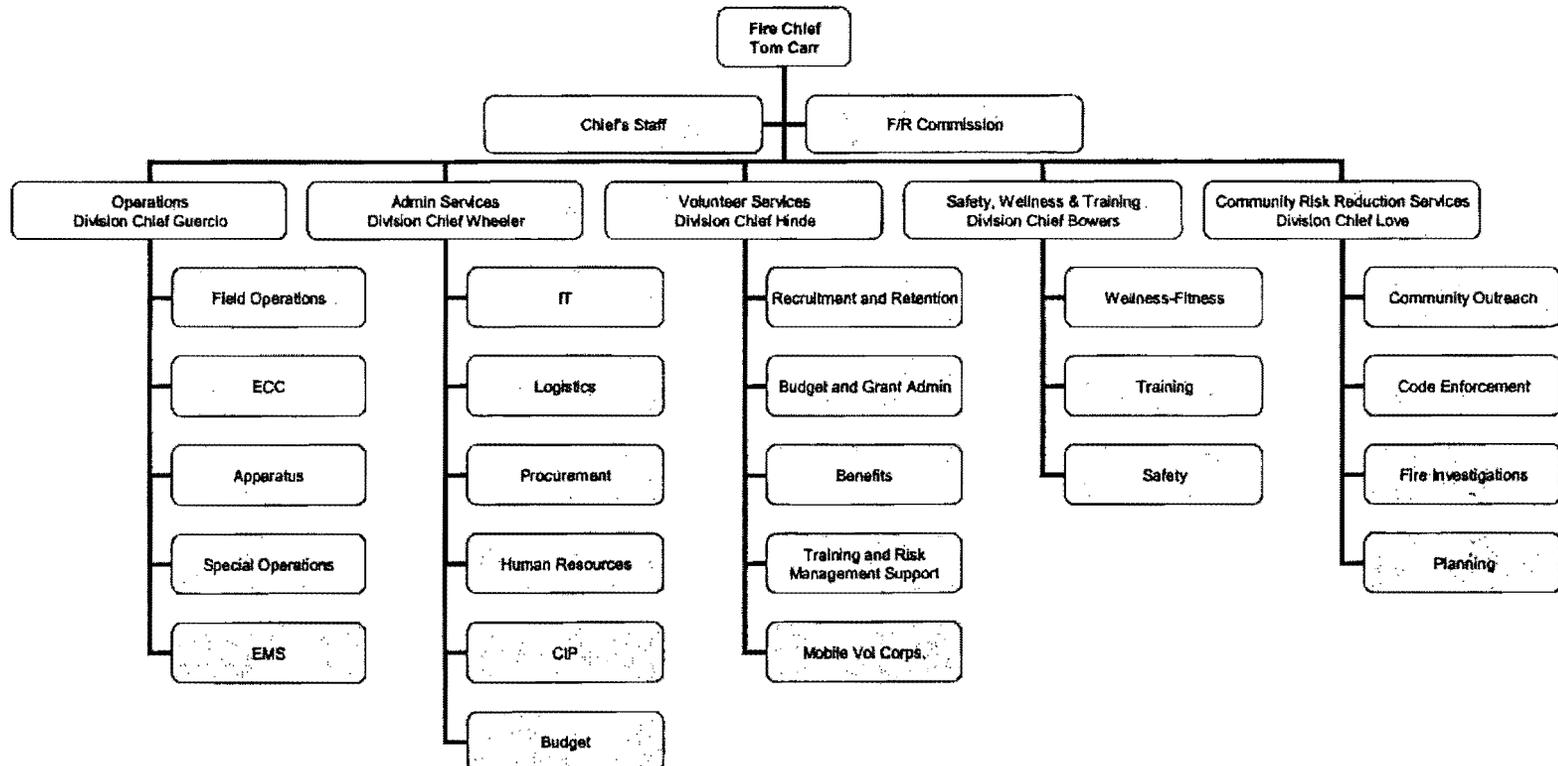
**MCFRS GUIDING PRINCIPLES**

Our empowered Montgomery County Fire and Rescue Service providers will:

- Serve with integrity and mutual respect
- Recognize the importance of diversity of our workforce and communities
- Promote the efficient and effective utilization of our resources
- Deliver services to our customers with impartiality and excellence
- Promote the highest standards of safety and welfare
- Be responsible for the honor of our profession and public service
- Maintain and promote open communication, creativity and competence
- Be accountable and ethical
- Continuously improve public confidence and trust

Figure 2.1

# MCERS ORGANIZATIONAL CHART (JANUARY 2005)



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## **NEW RECOMMENDATIONS**

► NOTE: A table summarizing Master Plan recommendations and priorities appears at the end of this Section.

### MCFRS PLANNING INITIATIVES

1. HIGH PRIORITY RECOMMENDATION: The Planning Office should take a lead or primary role in addressing the following planning initiatives between 2005 and 2015:
  - a. Conduct additional phases of the Station Location and Resource Allocation Study, as follows:
    - Phase 3 - Shady Grove, King Farm, and Derwood areas
    - Phase 4 - Northeast quadrant of County (Station 13's, 17's, 4's and 28's first-due areas), including the Route 27 corridor north of Brink Road, Route 108 corridor between Routes 97 and 650, and Route 124 corridor north of Snouffer School Road
    - Phase 5 - Eastern County, with emphasis on the Route 29 corridor north of University Boulevard
    - Phase 6 - Western County, west of Stations 9, 22 (Germantown West), 30, 31, 33, and 35 (Clarksburg)
    - Phase 7 - Norbeck Road corridor east of Gude Drive

Note: Phases 3, 5, and 7 should include a component examining the Inter-County Connector as it relates to MCFRS service needs and the delivery of fire-rescue services along the highway and adjacent areas.
  - b. Develop an annual work plan for the *Fire, Rescue, EMS, and Community Risk Reduction Master Plan* and coordinate its implementation, including the anticipated need for plan amendments
  - c. Coordinate the development of a MCFRS Business Plan that will set a course for how the MCFRS will be managed and operated to meet its Vision, Mission Statement, and Guiding Principles, and will be integrated with the *Fire, Rescue, EMS, and Community Risk Reduction Master Plan*

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AND COMMUNITY RISK REDUCTION MASTER PLAN**

- d. Participate in site evaluation/selection of the following MCFRS facilities:
- “Shady Grove” fire-rescue station, including expanded bays, quarters, and offices
  - Station 18 (relocated)
  - MCFRS apparatus maintenance facilities
  - MCFRS warehouse (if multi-agency facility does not prove feasible)
  - Any stand alone facilities for housing the "Ready-Reserve Fleet"
  - Any other facilities that require site selection (e.g., Stations 17 and 28, if not renovated on existing sites)
- e. Coordinate and integrate the continued implementation of recommendations of FRC-approved studies (e.g., *2000 Water Supply Study*, *2001 Aerial Unit Study*, *2003 Rescue Squad Report*). A comprehensive review and revision of the Water Supply Study may be in order in the FY05-06 time frame due to the number of recommendations already implemented and the impact of deploying CAFS-equipped engines.
- f. Coordination of fire-rescue needs with community master planning initiatives by MNCPPC, municipalities, and Regional Service Centers and associated Citizen Advisory Boards
- g. Preparation of documentation and related testimony for the Montgomery County Planning Board’s mandatory referral process for MCFRS CIP projects
- h. Foster positive relationships with local and regional departments, agencies and organizations involved in community planning for the purpose of furthering joint initiatives and resource needs
- i. Provide research and planning support for the department’s readiness initiatives, focusing on local and regional approaches to planning, preparedness, training and response in preparation for widespread emergency events, acts of terrorism and other mass casualty incidents
- j. Participate in the process to achieve improved ISO ratings in non-hydranted areas of the County and, if cost-effective, within hydrated areas
- k. Develop recommendations for implementation of NFPA 1710 policies for adoption by the County Executive and County Council.
- l. Expand research and development efforts, with emphasis on new technologies and innovative concepts, policies, and procedures that cost-effectively improve the delivery and outcomes for fire, rescue and EMS services.

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**AND COMMUNITY RISK REDUCTION MASTER PLAN**

- m. Provide research and planning support to the department's wellness and safety initiatives to improve the physical condition of firefighter-rescuers and to minimize deaths and injuries caused by occupational dangers and exposures.
- n. Coordinate comprehensive reviews of this Master Plan at designated intervals, including 18 months from the date (i.e., 1-1-05) the County Fire Chief took office in accordance with the provisions of Bill 36-03, and 5½ years following the adoption of this Plan by the County Council
- o. Coordinate the comprehensive replacement of this Master Plan for the next ten-year cycle (2015-2025)

To accomplish this extensive list of planning tasks and initiatives, the MCFRS Planning Office will require additional planning and GIS personnel in the immediate and mid-term future.

**FACILITIES**

**New, Relocated or Renovated Stations and Other Facilities**

- 2. HIGH PRIORITY RECOMMENDATION: As reflected in the FY05-10 Capital Improvements Program (CIP), the following MCFRS facilities are planned for implementation:
  - a. The "**Germantown West**" **Fire-Rescue Station** is scheduled for completion in FY07. It will be a modified Class II station<sup>1</sup> and will house an engine, ambulance, and possibly a second EMS unit upon opening. It is further recommended that this station be designated "Station 22."
  - b. The "**Travilah**" **Fire-Rescue Station** should be a modified-Class IV station and should house an engine and EMS unit upon opening in FY08. It is further recommended that this station be designated "Station 32."
  - c. The "**Germantown East**" **Fire-Rescue Station** should be a Class 1 station with a community room, and should house an engine, aerial unit, EMS unit (type to be determined), and a fourth unit (type to be determined) upon opening. This station should also serve as a satellite facility for the MCFRS Collapse Rescue Team. It is further recommended that this station be designated "Station 34."
  - d. The **Clarksburg Fire-Rescue Station** should be a modified Class 1 station with a training room that could be used by the community for meetings or small-scale events. The station should initially house an engine or engine-tanker, medic unit, tanker, and brush unit. It is

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<sup>1</sup> Site constraints have lead to a modified apparatus room design, including one full-size bay and five smaller bays, all requiring units to back in. The typical Class II station design includes 3 full-size, drive-through bays.

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FIRE, RESCUE, EMERGENCY MEDICAL SERVICES,  
AND COMMUNITY RISK REDUCTION MASTER PLAN**

further recommended that this station be designated "Station 35." To address the fast pace of development in Clarksburg, corresponding increase in incident call load, and inability of units based at existing stations to meet response time goals within Clarksburg, **an interim fire-rescue facility should be established in Clarksburg during FY06.** The interim station would serve Clarksburg until the permanent station is completed in FY09. Apparatus and staffing at the interim station should include a medic unit and engine or engine-tanker. The interim facility may be co-located with another County facility, or located on another appropriate site.

- e. **The Wheaton Volunteer Rescue Squad (WVRS)** is to be relocated to the intersection of Georgia and Arcola Avenues in Wheaton. The WVRS station will be a Class I, four-bay station, including a community room. The complete fleet of EMS and rescue apparatus should be moved from the existing station to the new facility. Upon relocation, the WVRS should retain its station designation as "Rescue Company 2."
  - f. **Cabin John Park Volunteer Fire Department (CJPVFD) Station 30** is in the process of being renovated on its existing site located at 9404 Falls Road under a joint CJPVFD-County partnership. Phase 1 of the renovation included an expansion of the apparatus room, from two bays to four. Phase 2 will include an extensive renovation to the living quarters. It is further recommended that this station retain its designation as "Station 30."
  - g. **Burtonsville Volunteer Fire Department Station 15**, located at 13900 Old Columbia Pike, is to be expanded to better accommodate its volunteer and career staff. The planned additions include an expanded bunkroom (i.e., ten additional beds) and the addition of a meeting/training room that can also be used by community groups. It is further recommended that this station retain its designation as "Station 15."
3. The need for the following fire-rescue stations has been determined, and these facilities will be included in future MCFRS CIP requests:
- a. **HIGH PRIORITY RECOMMENDATION: Kensington Volunteer Fire Department (KVFD) Station 18** should be relocated to a site within the vicinity of its existing site at Georgia Avenue and Randolph Road before the State Highway Administration's project to reposition Randolph Road under Georgia Avenue. [The land upon which Station 18 now stands will be condemned by the State to accommodate the widened road network; thus Station 18 must be relocated. The timing of the highway project is unknown due to State fiscal issues and highway project priorities; therefore the timing of relocating the station is equally unclear.] To ensure that a site is readily available when relocation becomes necessary, a site evaluation process was conducted in FY05, with input from Glenmont area residents, KVFD, Maryland-National Capital Park & Planning Commission (M-NCPPC), and the County. As this Master Plan was written, the site had not yet been selected by the County Executive. The relocated facility should be a modified Class II station, with 4 apparatus bays to accommodate the existing engine, aerial unit, brush unit, and, potentially, a future EMS unit

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**AND COMMUNITY RISK REDUCTION MASTER PLAN**

and/or reserve apparatus. Upon relocation, the station should retain its designation as "Station 18."

- b. **HIGH PRIORITY RECOMMENDATION: The "Shady Grove" Fire-Rescue Station** should be the fifth priority in the order of new/additional fire-rescue stations. It should be a 5-6 bay station initially housing an engine and EMS unit (type to be determined), plus several specialty units, ready reserve apparatus, and potentially an aerial unit and/or a second EMS unit in the future. The Shady Grove facility, due to its centralized location, should also house the Duty Operations Chief, an EMS Supervisor (position proposed in this Plan), Fire and Explosive Investigations staff, and personnel to operate specialty vehicles that serve the entire County such as the Bomb Squad, MCFRS Command Post bus, up-county hazmat unit, decontamination unit(s), air cascade unit, and proposed EMS bus. Furthermore, this site should house a portion of the MCFRS "Ready-Reserve Fleet" within the station, or in an adjacent building, if an appropriate sized parcel of land is available for all intended uses. The recommended MCFRS warehouse (see below) could also be located on this site if an appropriate sized parcel of land can be acquired for all intended uses. The recommended MCFRS central maintenance facility is another candidate for this site, if the property can accommodate it in addition to the facilities listed above. It is further recommended that this station be designated "Station 36."
- c. **Glen Echo Volunteer Fire Department Station 11**, located at 5920 Massachusetts Avenue, should be renovated on the station's existing site. Extensive renovation will be required due to the building's age, obsolete layout, and condition. As of 2005, a Program of Requirements had been prepared. Following renovation, the station should continue to house two primary apparatus (i.e., engine and EMS unit), and it should retain its designation as "Station 11."
- d. **Laytonsville District Volunteer Fire Department (LDVFD) Station 17**, located at 21400 Olney-Laytonsville Road, should be renovated on the station's existing site or relocated to a nearby site. If renovated on site, the station will require extensive renovation to the entire building due to its size, layout, age and condition. If the station is to be relocated, then a site evaluation and selection process should be undertaken, with input from Laytonsville area residents, LDVFD, M-NCPPC, and the County. Whether renovated or relocated, the station should be a Class 1, or modified Class 1, facility with four bays to accommodate the large fleet of vehicles<sup>2</sup> housed at Station 17. The LDVFD and Town of Laytonsville may wish to include a community room in the design, as well. Whether or not it is relocated, the station should retain its designation as "Station 17."
- e. **Gaithersburg-Washington Grove Fire Department (GWGFD) Station 28**, located at the intersection of Muncaster Mill Road and Shady Grove Road, should be renovated on the station's existing site, or relocated to a nearby site. If renovated on site, the station will require extensive renovation to the entire building due to its size, layout, age, and condition. If the station is to be relocated, then a site evaluation and selection process should be

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<sup>2</sup> EW-17, RS-17, W-17, A-179, B-175, and E-172 (reserve)

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**FIRE, RESCUE, EMERGENCY MEDICAL SERVICES,**  
**AND COMMUNITY RISK REDUCTION MASTER PLAN**

undertaken, with input from area residents, GWGFD, M-NCPPC, and the County. Whether or not the station is relocated, it should be a 3- or 4-bay facility to accommodate an engine, EMS unit, specialty unit (i.e., foam unit or hazmat unit), and, potentially, an additional service (e.g., 2<sup>nd</sup> EMS unit or an aerial unit) or reserve apparatus. The station should retain its designation as "Station 28."

- f. Consideration should be given to relocating **Upper Montgomery County Volunteer Fire Department Station 14**, located at 19801 Beallsville Road, into or closer to Poolesville where most of that station's call load occurs. The station should retain its designation as "Station 14," whether or not the station is relocated.
4. **HIGH PRIORITY RECOMMENDATION: Warehouse** - The MCFRS should construct or lease a central warehouse that would allow for the storage and distribution of clothing, protective gear, SCBA, equipment, and supplies used throughout the MCFRS (see Figure 4.4 in Section 4 for a complete listing of MCFRS items requiring storage at this facility). The warehouse must be configured and operated such that it can support rapid deployment of items during large-scale incidents and/or times of County-wide or region-wide crisis. The facility should be centrally located within the County to conveniently accommodate customers from all fire-rescue stations and other MCFRS work sites. Space of approximately 50,000-60,000 square feet is required to store all equipment and supplies listed in Figure 4.4.
- If, due to budget constraints, neither the multi-agency warehouse nor the MCFRS warehouse is feasible over the ten year life cycle of this Master Plan, then the least costly alternative is to lease a smaller facility to, at a minimum, store uniforms, protective gear, SCBA, and a portion of the MCFRS readiness equipment.
5. **HIGH PRIORITY RECOMMENDATION: Maintenance Facilities** - The MCFRS should operate a large-capacity, **centrally-located maintenance facility** to which all MCFRS vehicles would be brought for major repairs and servicing needs **and two smaller maintenance shops** that would handle preventive maintenance and minor/"running" repairs. The smaller shops should be located elsewhere in the County.
6. The recommended **MCFRS "Ready Reserve Fleet"** (RRF), addressed in the "Apparatus and Equipment" section below, should be housed at a **centralized RRF facility** that should be built or leased to house a large portion of the RRF. A small portion of the RRF may be housed in **existing fire-rescue stations** wherever bay space is available. **Additional sites** for the remainder of the RRF must be identified and appropriate facilities built or modified (if privately-owned garage-type buildings are to be used).
7. While the PSCC is expected to remain at its existing location throughout the 10-year life cycle of this Master Plan, the **spatial and functional needs of the multi-functional Center must be reassessed during the latter years of this Plan's life cycle**. The assessment should

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**AND COMMUNITY RISK REDUCTION MASTER PLAN**

be a joint MCFRS, MCP, and DPWT effort. Regarding the Alternate PSCC, there are no plans to relocate or expand that facility during the 10-year period.

8. The MCFRS should plan for a **live-burn training site** in a rural portion of the County where such training fires will have minimal impact on residents, businesses, and the environment. [The existing Fire-Rescue Training Academy (FRTA) is limited in its ability to conduct live burn training at the PSTA, due to pressure from the surrounding community as well as restrictive environmental regulations.]

### **Numbering System for New Stations**

9. It is recommended that the MCFRS fill gaps in its sequential numbering system for fire-rescue stations. Accordingly, **numbers assigned to planned up-County stations** should be as follows:
- Station 22 - "Germantown West"
  - Station 32 - "Travilah"
  - Station 34 - "Germantown East"
  - Station 35 - Clarksburg
  - Station 36 - "Shady Grove"

To address the existing gap between 36 and 40, **any future MCFRS stations should be assigned the following numbers (in order): 37, 38, 39.** Any future stations beyond these three should be numbered sequentially beginning with #41, since #40 is assigned to an existing station.

### **Site Location and Site Suitability Criteria**

10. The following list of **site location and site suitability criteria should be used in all future MCFRS fire-rescue station site evaluations/selections:**

Site Location Criteria:

- Response time – in relation to County Council-adopted response time goals
- Population – density and total population served
- Special needs populations – e.g., elderly, handicapped, non-English speaking
- Incident call load – all fire, rescue and EMS incident types
- Area of coverage – square mileage within first-due area
- Proximity to surrounding stations
- High hazards – based on a hazards analysis
- Water supply for fire suppression – hydrants, certified drafting points, etc.

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**AND COMMUNITY RISK REDUCTION MASTER PLAN**

Apparatus and Equipment Recommendations from Recent Studies

25. In accordance with recommendations in the *2000 Water Supply Study*, the MCFRS should purchase **suppression units** with the following minimum capabilities and features:
- Engines – pumping capability of at least **1500 gpm**
  - Tankers – elliptical-shaped tanks of **3000-3500 gallon capacity**
26. The *2000 Water Supply Study* also recommends that coordination should continue between the County and the LFRDs to **standardize hose appliances** carried by engines, engine-tankers and quints.
27. MCFRS should move toward deploying an aerial unit fleet comprised of **75% tower-ladders** and **25% tractor-drawn ladder trucks**. In addition, the MCFRS should continue evaluating the **“all-steer” technology**.
28. The *2004 Rescue Squad Study* recommends the following equipment purchases:
- a. All rescue squads should have at least one **thermal imager** as part of the on-board inventory.
  - b. Any rescue squad equipped with an on-board air cascade system must have a **blast shield containment system** around the cascade system.

Pilot Testing of Apparatus and Equipment

29. The MCFRS should conduct pilot tests to determine the benefits and cost-effectiveness of the following equipment and apparatus:
- a. **A Personal Alert Safety System (PASS) that incorporates Global Positioning System (GPS) technology should be pilot tested.** The GPS component incorporated into the PASS **allows trapped, injured, or disoriented firefighters to be located quickly** within a burning or collapsed structure by means of the GPS pinpointing the wearer's exact location inside the structure.
  - b. **A "Telesquirt" device should be pilot tested in an area of high fire risk** within the County. Candidate sites for pilot testing a telesquirt include Station 1, 2, 3, 18, or 23; however, the optimal site should be identified by the Operations Division Chief.
  - c. **A mobile traffic signal control system should be further pilot tested** in the most congested areas of the County (e.g., within the Urban Zone). Optimal areas to conduct the pilot test should be identified by Operations Division managers from MCFRS, DPWT, and MCP (assuming that MCP participates in the pilot test).

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AND COMMUNITY RISK REDUCTION MASTER PLAN**

d. **A pilot test should be conducted to assess fire hydrant marking systems** that would allow firefighters to easily locate hydrants. The optimal area(s) to conduct the pilot test should be identified by the FRC's Operations Committee.

e. MCFRS should work with the local water utilities to design a **new style of hydrant** that employs one or more large-diameter outlets in place of 2½-inch outlets that have become obsolete. This design would go hand-in-hand with the use of large-diameter supply lines.

f. **One, or several (e.g., one per battalion), ManSAC® patient carrier system(s), or similar product, should be pilot tested.** The optimal area(s) to conduct the pilot test should be identified by the Operations Division Chief and EMS Section Chief.

30. The MCFRS must continue to stay abreast of the **newest/latest technologies and innovations**, and pilot test those that appear to best meet the present and future needs of MCFRS, as funding allows.

## **STAFFING**

31. **The Fire Chief must continuously assess the staffing needs at each station and must initiate steps to increase the level of career staffing on an as-needed basis.** Staffing levels should be consistent with that recommended in NFPA Standard 1710 (see Recommendation 32).

32. **HIGH PRIORITY RECOMMENDATION: The County must increase mandatory minimum staffing to four personnel for engines, aerial units, and rescue squads; ensure staffing of tankers, and staff the new position of Battalion Chief Aide.** These staffing levels are consistent with that recommended in NFPA Standard 1710, FEMA Publication 508-4, and appropriate for the level of hazards within the County. **A 7-phase, 7-year staffing plan is recommended to achieve these vital staffing needs as follows:**

- a. **Phase 1, 1<sup>st</sup> Year - Increase guaranteed 24/7 staffing to 4 personnel on 8 engines at predominantly rural stations** located on the periphery of the County by adding one firefighter-paramedic per engine on a 24/7 basis, thus establishing paramedic engines at these stations.
- b. **Phase 2, 2<sup>nd</sup> Year - Increase guaranteed 24/7 staffing to 4 personnel on 8 aerial units at stations located in high-density areas** of the County by adding one firefighter per aerial unit on a 24/7 basis.
- c. **Phase 3, 3<sup>rd</sup> Year - Increase guaranteed 24/7 staffing to 4 personnel on 8 engines at stations located in high-density areas** of the County by adding one firefighter-

**APPROVED  
FIRE, RESCUE, EMERGENCY MEDICAL SERVICES,  
AND COMMUNITY RISK REDUCTION MASTER PLAN**

paramedic per engine on a 24/7 basis, thus establishing paramedic engines at these stations.

- d. Phase 4, 4<sup>th</sup> Year - **Increase guaranteed 24/7 staffing to 4 personnel on 6 aerial units and 3 rescue squads at stations located in suburban areas** of the County by adding one firefighter per unit on a 24/7 basis for most of these units and a daytime only basis for the remainder (plan assumes volunteers will provide the remainder of the fourth person staffing).
- e. Phase 5, 5<sup>th</sup> Year - **Increase guaranteed 24/7 staffing to 4 personnel on 9 engines at stations located in suburban areas** of the County by adding one firefighter-paramedic per engine on a 24/7 basis, thus establishing paramedic engines at these stations.
- f. Phase 6, 6<sup>th</sup> Year - **Increase guaranteed 24/7 staffing to 4 personnel on 6 engines and one rescue squad at stations located in suburban areas** of the County by adding one firefighter per unit on a 24/7 basis. In addition, the MCFRS should provide **dedicated guaranteed staffing of one person per each of 8 tankers to ensure immediate response of tankers** on a 24/7 basis.
- g. Phase 7, 7<sup>th</sup> Year - **The MCFRS should provide Aides to assist career Fire-Rescue Battalion Chiefs in the field.** A Battalion Chief's Aide would be required on a 24/7 basis for each battalion, including the proposed sixth battalion.

**Note:** As new stations open, 4-person staffing should be provided for the frontline engines, aerial units, and rescue squads housed therein.

- 33. Based upon the addition of several new up-county stations and one interim station within the FY06-09 time frame as well as span of control principles, **the MCFRS must create a sixth battalion (i.e., Battalion 6) and staff it with a career Fire-Rescue Battalion Chief on a 24/7 basis.**
- 34. **HIGH PRIORITY RECOMMENDATION:** The MCFRS should establish battalion-based resources to improve effectiveness and efficiency of its operations/services through improved supervision, increased quality assurance oversight, and strategic deployment of specialized staff and apparatus. Battalion-based resources would work under the supervision of the six on-duty Fire-Rescue Battalion Chiefs, working together as a team to implement the Fire Chief's vision and policies. Battalion-based resources should include, but not be limited to, the following:
  - EMS Supervisor (i.e., EMS Captain) on a 24/7 basis. [See also Recommendation #47 pertaining to EMS quality assurance.]
  - Fire Code inspectors

**APPROVED  
FIRE, RESCUE, EMERGENCY MEDICAL SERVICES,  
AND COMMUNITY RISK REDUCTION MASTER PLAN**

- Community Resource Units on a 24/7 basis [See also Recommendation 37i]
  - Battalion Chief Aide on a 24/7 basis [See also Recommendation 32g]
  - Training Officer
35. HIGH PRIORITY RECOMMENDATION: The MCFRS must continuously recruit a sufficient number of diverse, qualified career and volunteer applicants to meet the department's staffing needs and retain these personnel for long-term service. **To this end, the MCFRS must continue supporting the fulltime Recruiter position established in FY05, as well as an annual budget for recruitment and retention activities, materials, advertising, and vehicle. To assist the Recruiter, additional fulltime and/or part time staff must be hired, as needed. The Recruiter must devise a comprehensive volunteer /career recruitment and retention plan and implement the plan as quickly as possible.**

In keeping with the MCFRS goal of **achieving and maintaining a diverse work force**, the volunteer and career firefighter-rescuer recruitment and retention program must ensure that recruitment efforts address this goal.

## **RESOURCE DEPLOYMENT**

36. HIGH PRIORITY RECOMMENDATION: The MCFRS should **identify resource needs** (i.e., facilities, apparatus, staffing) in the following areas not yet studied under the ongoing Station Location and Resource Allocation Study:
- Shady Grove, King Farm, and Derwood areas
  - Northeast quadrant of County (Station 13's, 17's, 4's and 28's first-due areas), with special emphasis on Route 27, 108, and 124 corridors
  - Eastern County, with special focus on the Route 29 corridor
  - Western County, west of Stations 9, "22"-Germantown West, 30, 31, "32"-Travilah, "34"-Germantown East and "35"-Clarksburg<sup>5</sup>
  - Norbeck Road corridor east of Gude Drive

Note: Also see Recommendation #1.

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<sup>5</sup> Stations 22, 32, 34 and 35 are up-County stations to be constructed between FY06 and FY09

**APPROVED**  
**FIRE, RESCUE, EMERGENCY MEDICAL SERVICES,**  
**AND COMMUNITY RISK REDUCTION MASTER PLAN**

## **EMERGENCY MEDICAL SERVICES**

Note: The topics of Additional EMS Units and EMS Response Threshold are addressed under "Resource Deployment" heading above. The topic of EMS training is addressed under the "Training" heading later in this section.

41. The MCFRS should **evaluate the current EMS model/system to determine how it can be improved**. Some areas on which to focus should include:
- Use of the "1 and 1" ALS deployment model where staffing on each medic unit would be changed from two paramedics to one paramedic and one firefighter-rescuer. The 2<sup>nd</sup> firefighter-paramedic would then be assigned as the third position on an engine, aerial unit, or rescue squad at the same station as the medic unit, thus creating an ALS first responder unit in addition to the medic unit.
  - Authorization to **transport patients to the most appropriate patient care facility** (e.g., crisis center, public health facility, hospital, etc.), not always to a hospital.
  - Increased efficiency, effectiveness, and distribution of the **EMS command structure** throughout the County.
  - Use of **BLS transport units and ALS chase cars** (with and without AFRA) versus using ALS transport units exclusively (with and without AFRA)
  - Use of **part-time BLS and ALS units** - additional units used during peak periods only
  - Develop **EMS-only career positions** versus all career positions having both fire suppression and EMS responsibilities
42. The MCFRS should **provide dedicated ALS support for all specialty teams** by:
- Dedicating at least one **ALS unit** to each specialty team
  - Identifying specific **EMS needs of specialty teams** and supporting those needs
  - Creating a **liaison** between the individual specialty teams and the EMS Section
  - Coordinating specialized **EMS needs for special operations** through the Special Operations Section.
  - Train HIRT technicians, who are also MCFRS paramedics, in toxicology so that they may more effectively treat HIRT members or other firefighter-rescuers exposed to toxic substances. Further, dedicate a minimum of four paramedics per shift, trained in toxicology and use of related medications, to respond to all incidents where MCFRS personnel will don hazmat entry suits and enter potentially toxic environments.
43. The MCFRS should **develop comprehensive plans for special events involving large gatherings** that address the following:
- Establishing a single point-of-contact within MCFRS for **special events**
  - Creating **partnerships with local hospitals** for providing medical care for special events
  - Coordinating County services and staging departments' resources in relation to special events.

**APPROVED**  
**FIRE, RESCUE, EMERGENCY MEDICAL SERVICES,**  
**AND COMMUNITY RISK REDUCTION MASTER PLAN**

- l. Establish an **ECC deployment strategy** by which MCFRS Emergency Communicators are given the opportunity to split their time between the PSCC and a designated fire-rescue station.
  
- m. Work closely with DTS and other public safety departments to develop a **plan for implementing the 800 MHz re-banding process** in Montgomery County.

### **RESPONSE TIME**

68. HIGH PRIORITY RECOMMENDATION: The MCFRS should adopt the **revised and expanded response time goals** presented in Figure 5.6 in Section 5 that incorporate revised MCFRS density zones based upon the following elements of density: population density, building density, future population, zoning, fire hydrant coverage, distance to the urban core, and distance to interstate highways. **The MCFRS should also consider developing a set of maximum response time goals that should not be exceeded except in rare cases.** Maximum response time goals would address situations when an incident occurs within an area where units that are normally first-due (or second-due or third-due in some cases) are committed on other incidents and distant units must be dispatched that cannot meet the lower response times appearing in Figure 5.6.
  
69. The County should **acquire a mobile traffic signal control system** for use in the most congested areas of County to improve response time and safety. This should be coordinated between MCFRS, MCP, and DPWT as a multi-agency project. [See related recommendation under "Pilot Testing of Apparatus and Equipment" above. ]
  
70. The MCFRS should develop response time goals for its specialty teams (i.e., HIRT, RRATS, CRT, Bomb Squad) to reach the scene of any incident to which they are dispatched. An alternative would be to establish variable response time goals for special operations apparatus based upon the type of special hazard involved in a given incident.
  
71. The MCFRS should consider developing response time goals for command staff to arrive on the scene of incidents to which they are dispatched. These goals would not likely apply to discretionary responses by command staff where they were not dispatched.

### **MCFRS RESPONSE READINESS**

72. It is vitally important that the MCFRS **continually take steps to ensure response readiness for large-scale incidents** such as terrorist attacks, natural disasters, transportation incidents, and other incidents involving mass casualties. Once the desired level of readiness has been defined, that level can be achieved by accomplishing the following actions and measures:

**APPROVED**  
**FIRE, RESCUE, EMERGENCY MEDICAL SERVICES,**  
**AND COMMUNITY RISK REDUCTION MASTER PLAN**

**FIGURE 5.6 - EXPANDED RESPONSE TIME GOALS**

Service	Response Time Goal	Travel Time	Urban Area Goal -%	Suburban Area Goal -%	Rural Area Goal -%
ALS -1 <sup>st</sup> Due <sup>22</sup>	8 min	6 min	90%	80%	45%
BLS -1 <sup>st</sup> Due <sup>23</sup>	6 min	4 min	90%	75%	50%
<b>Transport Unit for ALS Patient<sup>24</sup></b>	10 min	8 min	95%	80%	50%
<b>Transport Unit for BLS Patient<sup>25</sup></b>	12 min	10 min	95%	80%	50%
Fire -1 <sup>st</sup> Due Engine	6 min	4 min	90%	75%	50%
<b>Fire -2<sup>nd</sup> Due Engine</b>	8 min	6 min	90%	75%	40%
<b>Fire -3<sup>rd</sup> Due Engine</b>	10 min	8 min	90%	75%	40%
<b>Fire -4<sup>th</sup> Due Engine</b>	12 min	10 min	90%	75%	40%
<b>Tanker - 1<sup>st</sup> Due<sup>26</sup></b>	8 min	6 min	NA	NA	45%
<b>Tanker - 2<sup>nd</sup> Due<sup>27</sup></b>	12 min	10 min	NA	NA	35%
<b>Tanker - 3<sup>rd</sup> Due<sup>28</sup></b>	18 min	16 min	NA	NA	25%
<b>Extrication<sup>29</sup></b>	9 min	7 min	90%	75%	50%
<b>Heavy Rescue<sup>30</sup></b>	12 min	10 min	95%	80%	25%
1 <sup>st</sup> Due Aerial Unit <sup>31</sup> on Any Fire Incident When Due to Respond	8 min	6 min	85%	75%	40%
<b>2<sup>nd</sup> Due Aerial Unit<sup>32</sup> on Structure Fire</b>	12 min	10 min	80%	65%	25%
Full Assignment on Structure Fire <sup>33</sup>	12 min	10 min	95%	70%	25%

**NOTE: New or modified goals appearing under the "Service" heading are shown in boldface type.**

- <sup>22</sup> First arriving unit having ALS capability (minimum: paramedic & ALS kit) – medic unit or AFRA  
<sup>23</sup> First arriving unit having BLS capability (minimum: EMT & BLS kit) – ambulance or first responder unit  
<sup>24</sup> Arrival of transport unit, whether a medic unit or an ambulance that can be upgraded to a medic unit with a paramedic from the AFRA  
<sup>25</sup> Arrival of transport unit, whether an ambulance, or medic unit when an ambulance is unavailable  
<sup>26</sup> 1<sup>st</sup> due tanker on fires in areas lacking hydrants arrives within 2 minutes of 1<sup>st</sup> due engine  
<sup>27</sup> 2<sup>nd</sup> due tanker's arrival coincides with arrival of 4<sup>th</sup> due engine  
<sup>28</sup> 3<sup>rd</sup> due tanker arrives approximately 2-3 minutes before 2<sup>nd</sup> tanker's water is expended  
<sup>29</sup> Extrication capable unit – extrication-equipped engine or aerial unit, or heavy rescue squad  
<sup>30</sup> Rescue Squad response required  
<sup>31</sup> Arrival time of 1<sup>st</sup> due aerial unit is in relation to arrival of 1<sup>st</sup> and 2<sup>nd</sup> due engines on box alarms or adaptive responses  
<sup>32</sup> Arrival time of 2<sup>nd</sup> due aerial unit is in relation to arrival of 3<sup>rd</sup> and 4<sup>th</sup> due engines on box alarms  
<sup>33</sup> All initial alarm units due on a standard box alarm, high-rise box alarm or non-hydranted area box alarm

**APPROVED**  
**FIRE, RESCUE, EMERGENCY MEDICAL SERVICES,**  
**AND COMMUNITY RISK REDUCTION MASTER PLAN**

and interoperability among COG and NCR jurisdictions, MCFRS should continue evaluating the capabilities of CapWIN<sup>10</sup> and other interoperable networks and participate in regional discussions regarding their development and use. As CapWIN is further developed by local, State, and federal agencies, its capabilities may be useful to MCFRS in the sharing of data with nearby jurisdictions and/or in the potential interfacing of CAD systems between jurisdictions. Implementation of recommendations found in the report titled "Public Safety Communications Interoperability in Maryland" (dated February 28, 2005; developed through the Maryland Association of Counties and the Governor's Office of Homeland Security) should also improve interoperability between counties in Maryland. Most notably, these recommendations address 800 MHz rebanding and the eventual switchover to the 700 MHz band by public safety agencies.

## **PROGRAM EVALUATION**

102. **The MCFRS should expand the scope of its performance measures program to include measures that will address all programs and elements of the MCFRS and to make performance measures a routinely-used management tool by all MCFRS program managers. In addition, existing performance measures must be continuously assessed for needed improvements that will better measure performance, and standardized data gathering methods must be established to collect and compile the comprehensive data on which performance measures are based. MCFRS program managers must establish an ongoing routine of updating and utilizing these measures regularly (e.g., monthly or quarterly) to measure the performance of their programs. MCFRS might also find it beneficial to perform benchmarking with other fire-rescue departments, as long as departments and jurisdictions comparable to MCFRS and Montgomery County can be included. Another method of evaluation is the self-assessment process that an applicant fire department must conduct when seeking accreditation from the Commission on Fire Accreditation International, Inc. (CFAI). The Master Plan recommends (below) that MCFRS seek accreditation through the CFAI.**

## **ISO RATING IMPROVEMENT**

103. **HIGH PRIORITY RECOMMENDATION: Montgomery County should implement improvements to the County's overall fire protection capabilities with the goal to improve the County's ISO rating. Initial focus should be aimed at implementing water supply/application and other operational improvements within the portion of the County having an ISO Class 9 rating (i.e., area lacking hydrants but within 5 miles of a**

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<sup>10</sup> The Capital Wireless Integrated Network (CapWIN) is a partnership between Maryland, Virginia, and the District of Columbia to develop an interoperable first-responder data/information sharing network. As of 2005, CapWIN was being used by the U.S. Park Police, Maryland State Police, and several municipal police departments within the Washington DC Metropolitan Area. In 2005, fire departments within the metropolitan area were still evaluating its usefulness for their operations and functions.

**APPROVED**  
**FIRE, RESCUE, EMERGENCY MEDICAL SERVICES,**  
**AND COMMUNITY RISK REDUCTION MASTER PLAN**

fire station) in hopes of ISO lowering that rating to a Class 8 or lower. This reduction would lower property owners' insurance premiums considerably within the ISO Class 9 area. Subsequent efforts should focus on improving the ISO Class 4 rating within the urban portion of the County. Implementation of these improvements will assist the MCFRS in attaining accreditation, as well.

## **ACCREDITATION**

104. HIGH PRIORITY RECOMMENDATION: The **MCFRS should seek accreditation status** through the Commission on Fire Accreditation International, Inc. (CFAI). In implementing many of the recommendations in this Master Plan, the MCFRS will meet many of the accreditation criteria. When eventually meeting the 47 accreditation criteria, the MCFRS will become a much improved organization better able to meet the needs of its customers.

## **MASTER PLAN IMPLEMENTATION**

Master Plan implementation is addressed in Section 7 of this Plan. The “Strategic Plan for the Implementation of Master Plan Priorities” identifies the highest priority recommendations within the Master Plan and associated cost estimates. Priorities in the Strategic Plan include those requiring full or, in some cases, partial implementation within the initial two to three years of approval of this Master Plan. While each Master Plan recommendation is important in its own right, a small percentage of the recommendations have been determined to be of the highest priority requiring immediate attention. Section 7 addresses these highest priorities.

Implementation of the remaining Master Plan recommendations will be addressed in future updates of the Strategic Plan, beginning with the next set of MCFRS priorities as determined by the Fire Chief.

Note: A table summarizing Master Plan recommendations and priorities appears below in Figure 6.1.

**Sec. 21-12. Master fire, rescue, and emergency medical services plan.**

(a) The Fire Chief must draft a master fire, rescue, and emergency medical services plan and must propose any appropriate amendments to the Executive and Council. The master plan must include at least:

(1) a survey of the resources and personnel of existing fire, rescue, and emergency medical services, and an analysis of the effectiveness of the fire and building codes;

(2) an analysis of short- and long-term fire prevention and control needs and emergency medical services needs;

(3) a plan to meet the fire prevention and control and emergency medical services needs;

(4) an estimate of cost and realistic plans for financing the implementation and operation of the plan on a continuing basis, and a summary of problems anticipated in implementing the plan;

(5) a definition of the current and future fire protection and emergency medical environment by establishing and maintaining a comprehensive data base;

(6) a definition of goals and objectives for service levels;

(7) identification and justification of the resources and technology necessary to develop and operate the fire protection and emergency medical system as recommended by the plan;

(8) a detailed program of action to implement and maintain the system as recommended by the plan; and

(9) a program of action to coordinate with the Office of Emergency Management and Homeland Security, the County's fire prevention and control and emergency services resources into County-wide, regional, State, and national emergency management plans.

(b) The Fire Chief must draft the master plan and any amendments in coordination with the Commission, the local fire and rescue departments, the Maryland-National Capital Park and Planning Commission, the health systems planning agency, the Washington Suburban Sanitary Commission, other County departments, the Metropolitan Washington Council of Governments, the U.S. Department of Homeland Security, and any other interested parties. The County Council, the Commission, and any local fire and rescue department may ask the Fire Chief to consider an amendment to the plan at any time. The Fire Chief must conduct at least one public hearing before proposing any significant amendment. The County Executive must forward the master plan or any amendment proposed by the Fire Chief, along with any comments, to the County Council, which may approve the master plan as proposed or with amendments.

(c) The master plan must serve as a guideline for the Executive, Council, and Fire Chief in making decisions regarding delivery of fire and rescue services, does not have the force of law, and does not impose any legal obligation on any party. (1980 L.M.C., ch. 64, § 3; 1998 L.M.C., ch. 4, §1; 2004 L.M.C., ch. 5, § 1; 2004 L.M.C., ch. 25, § 1; 2008 L.M.C., ch. 5, § 1; 2009 L.M.C., ch. 5, § 1.)

**Editor's note**—2008 L.M.C., ch. 5, § 3, states: Sec. 3. Any regulation in effect when this Act takes effect that implements a function transferred to another Department or Office under Section 1 of this Act

75

continues in effect, but any reference in any regulation to the Department from which the function was transferred must be treated as referring to the Department to which the function is transferred. The transfer of a function under this Act does not affect any right of a party to any legal proceeding begun before this Act took effect.

Section 21-12, formerly § 21-4I, was renumbered, amended and retitled pursuant to 1998 L.M.C., ch. 4, § 1.

76

**APPROVED**  
**FIRE, RESCUE, EMERGENCY MEDICAL SERVICES,**  
**AND COMMUNITY RISK REDUCTION MASTER PLAN**

7. The fire, rescue and EMS incident call load in the County will continue increasing in relation to population growth, pace of development and other socio-economic factors.
8. The ongoing trend of EMS incidents comprising the vast majority of incident responses by the MCFRS will continue over the lifespan of this Master Plan.
9. County-wide risk related to terrorism will remain throughout the 2005-2015 period and may increase or decrease as the level of risk becomes better defined. The MCFRS will take an active role in the County's homeland security efforts to plan for, prepare for, respond to, and - to the greatest extent possible - mitigate acts of terrorism. The MCFRS will continuously increase its level of preparedness to a level commensurate with the perceived threat and risk.
10. Planning and preparedness for, and response to, large-scale emergencies (e.g., natural disasters, major transportation incidents, acts of terrorism, etc.) occurring in Montgomery County or within the Washington D.C. Metropolitan Area will be addressed from a more regional approach than in the past to ensure the most effective and efficient means of protecting the public.
11. While all age groups in the County will continue to increase in number, the largest percentage increase will occur in the 65 and over group. This growth will outpace all other age groups by a sizable margin. Due to this increase in elderly population, the EMS call load will rise sharply, particularly the ALS call load.
12. The trend of increasingly higher numbers of ethnically diverse populations residing in the County will continue. Likewise, the percentage of these diverse populations residing in the County in relation to all populations will continue to grow.
13. Residential and business development throughout the County will continue to grow at a steady rate between 2005 and 2015, particularly along the I-270 corridor, primarily in the up-County communities of Germantown and Clarksburg. Transportation infrastructure (highway and rail) will continue to expand within the County, as well.

## AMENDMENTS AND REVISIONS TO THIS PLAN

**In accordance with Montgomery County Code, Chapter 21 (as amended May 4, 2004), the Fire Chief must draft the Master Plan and any amendments.** These amendments and revisions must be developed in coordination with the Maryland-National Capital Park and Planning Commission, "health systems planning agency," Washington Suburban Sanitary Commission, other County departments, Metropolitan Washington Council of Governments, U.S. Department of Homeland Security, and other interested parties. The Fire Chief must conduct at least one public hearing before

**APPROVED**  
**FIRE, RESCUE, EMERGENCY MEDICAL SERVICES,**  
**AND COMMUNITY RISK REDUCTION MASTER PLAN**

proposing any significant amendment(s) to the County Executive. The Code also states that the County Executive must forward the Plan, or any amendment(s) proposed by the Fire Chief, along with any comments, to the County Council. The Council then approves the Master Plan, or amendments, as proposed, or with Council-directed revisions.

**An annual review of the Master Plan is in order to identify recommendations and actions that should be addressed in the annual work plan and to determine whether any amendments might be needed** to modify or add to existing strategies in response to a major change to the risk environment and/or current events. In addition, a review and updating of the Strategic Plan for Implementation of Master Plan Priorities (Section 7) is needed annually to coincide with upcoming fiscal year operating budget requests.

In addition to annual reviews, **the Plan will undergo comprehensive reviews at the 18-month mark, and again at the 5½-year mark, following its initial adoption by the County Council.** Revisions, possibly extensive in scope, will follow each comprehensive review, as needed. The Fire Chief, County Executive, or County Council may direct additional comprehensive reviews at any interval. Amendments to the Master Plan may be introduced at any time by the Fire Chief, as stated above.

The comprehensive review would begin in July 2006; eighteen months after Fire Chief Thomas Carr, Jr. took office. This approach is predicated on the new Fire Chief requiring 18 months into his tenure to review the Plan and determine whether its content reflects his vision and priorities for the MCFRS. It is envisioned that any necessary revisions /amendments would take approximately 6-12 months to complete, followed by a 6-12 month period of review by all stakeholders, and the required public hearing, prior to adoption by the County Council; therefore the entire process could take up to two years to complete.

**The next comprehensive review would occur 4 years after the first review was initiated,** which could be as little as 2 years since the revisions associated with the first review were adopted by the County Council. The revision/adoption process associated with the second comprehensive review may take up to two years to complete, as with the first review. By 4½ years following this second comprehensive review, the Master Plan will have sunset and been replaced by an entirely new Master Plan for 2015-2025. **It is envisioned that development of the 2015-2025 Master Plan will begin around the 8-year mark of the 2005-2015 Plan to ensure its adoption by the previous Master Plan's sunset date (i.e., December 31, 2015).** On or before January 1, 2016, a new Master Plan will likely be adopted by the County Council, following reviews by the Fire Chief, Fire and Rescue Commission, and County Executive as well as a public hearing.