Charlotte County

FIRE & EMS STUDY

In consultation with the Virginia Department of Fire Programs, and the Virginia Department of Health's Office of Emergency Medical Services.



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Charlotte County Sheriff's Office

Charlotte Court House Volunteer Fire Department

Cullen Volunteer Fire Department

Drakes Branch Volunteer Fire Department

Keysville Volunteer Fire Department

Red House Volunteer Fire Department

Phenix Volunteer Fire Department

EXECUTIVE SUMMARY

This report documents the findings and recommendations for the Charlotte County Fire and Emergency Medical Services (EMS) Study. The information contained is not to be construed as legal advice or as binding recommendations.

This report is intended to provide guidance for Charlotte County Board of Supervisors, County Administration and its fire and rescue stakeholders. The document details opportunities to build on what is working well, while recommending suggestions for improvement.

It should be noted that a Fire and EMS Study was completed for Charlotte County in 2009. Some of the findings discussed below are like those from the previous study. This should not be construed as an admonishment to the County but rather reinforcement that the recommendations in this report are proven best practices that should help Charlotte County improve delivery of Fire and EMS services. A copy of the 2009 study can be provided upon request.

This study was requested by the Charlotte County Board of Supervisors to analyze several areas of responsibility within the Charlotte County Fire and EMS systems. The Study Committee was comprised of representatives from the Virginia Fire Services Board, the Virginia Department of Fire Programs, and the Virginia Department of Health, Office of Emergency Medical Services.

The findings and recommendations are organized into four working themes to include:

- Organization and Delivery of Services
- Training
- Budget and Fleet Management (Equipment/Apparatus)
- Community Risk Reduction

Below is a high-level summary of the findings and recommendations, which will be discussed further in the report. Additional suggestions are within the report and are not highlighted below.

Theme 1: Organization and Delivery of Services (Page 9)

- <u>Hiring of Public Safety Director Position</u>: Charlotte County should move through the hiring process to fill the position of Public Safety Director. This position should be identified as the operational authority for county Fire and EMS departments.
- <u>Develop Tactical Playbook:</u> Under the direction of the Public Safety Director, the county Fire and Rescue Association should create a countywide tactical playbook or Standard Operating Guidelines for both Fire and EMS organizations to ensure emergency responder safety, continuity and level of service across the county.
- <u>Implement Long-Term, Strategic Plan:</u> The long-term plan should identify immediate, intermediate, and long-term goals with specific deadlines. These measures will serve as the basis for a strategic plan which will allow the Board of Supervisors to routinely evaluate service delivery.

Emergency Medical Services: The county should ensure an MOU-type agreement is in
place with the Charlotte County Rescue Squad and look to hire career EMS staff under
the supervision of the Public Safety Director. Additionally, the county should make other
operational improvements such as reviewing EMS station locations, moving to one EMS
license, and consider utilizing cross-trained fire and EMS personnel to respond to both
fire and EMS calls especially during the day.

Theme 2: Training (Page 14)

- <u>Create a Fire-EMS Training Captain/Volunteer Coordinator Position</u>: Charlotte County should consider creating a Fire-EMS Training Captain/Volunteer Coordinator position with the responsibility of scheduling training classes countywide and assisting with recruitment and public fire safety education.
- <u>Invest in Fire Service Training</u>: The county should consider leveraging a grant or partnering with surrounding counties to construct live fire training structures to enhance training opportunities available in Charlotte County.

Theme 3: Budget and Apparatus (Page 16)

- <u>Conduct Risk Assessment</u>: Charlotte County should complete a risk assessment for the fire and EMS services and use the quantitative data to make prudent budgetary decisions.
- <u>Develop a Capital Improvement Plan (CIP)</u>: The county needs to create a Capital Improvement Plan to routinely upgrade equipment and apparatus.
- <u>Leverage Available Grants</u>: Charlotte County should consider using a grants writer to assist with the acquisition and management of grants. There are several grants that are available depending on the identified risks of the county.
- <u>Standardization and Central Purchasing</u>: The county should develop and implement a centralized purchasing option to leverage purchasing power and reduce operational expenses to departments. The county should consider the possibility of insuring all emergency apparatus on one policy.

Theme 4: Community Risk Reduction (Page 18)

• <u>Virginia Fire Incident Reporting System (VFIRS)</u>: All non-reporting county fire departments are strongly encouraged to start or continue fire reporting via VFIRS. This information is critical for the identification and mitigation of any community risks.

METHODOLOGY

The following is an overview of the study process:

PHASE I: INITIATE PROJECT

Objectives: Initiation of Study

To initiate the study, the Charlotte County Administrator sent a letter, on behalf of the Charlotte County Board of Supervisors, to the Virginia Fire Services Board requesting a comprehensive review of the fire and EMS system in the county.

A Study Committee was convened and the team began by identifying the specific objectives for the review. The final study initiation step consisted of collecting and reviewing existing operational data and information on agreements along with relevant policies and procedures. Many of these review materials are included in the references and appendix of this study.

As part of Phase I, the Study Committee met with leadership from Charlotte County to establish working relationships, make logistical arrangements, and determine communication lines. During these meetings, the Study Committee discussed the objectives of the project and identified policy issues and concerns central to the study.

PHASE II: OBTAIN STAKEHOLDER INPUT

Objectives: Conduct Leadership Interviews & Capture Input from the Departments

The second phase of the study consisted of leadership interviews and department evaluations. The expectations were as follows:

- Identify expected service levels;
- Identify opinions of department officials concerning the operations and performance of the department;
- Identify issues and concerns of officials regarding fire and rescue services;
- Identify perceived gaps in existing service levels and new priorities in mission; and,
- Identify strengths and weaknesses as perceived by departmental personnel.

The Study Committee, in coordination with county leadership, developed a schedule of face-to-face interviews with the seven independent county fire departments and Charlotte County Rescue. All interviews were conducted during an allotted timeframe and a considerable amount of information was collected. A public hearing was advertised by the county and held on September 27, 2022 to give the public an opportunity to share feedback with the Study Committee regarding the Fire & EMS system.

During the interviews and public hearing, the Study Committee received information regarding staffing levels, service delivery, budget information, apparatus and other information about the operation of each volunteer department. The discussion also provided an opportunity for each department to share comments regarding service delivery of fire & EMS services in the county. It is important to note that the Study Committee visited all volunteer departments in Charlotte County to include Bacon District, Charlotte Court House, Cullen, Drakes Branch, Keysville, Red

House and Phenix. In addition, the committee also visited Charlotte County Rescue and a brief visit to see the facilities for 911 dispatch in the Sheriff's Office.

PHASE III: PREPARE ANALYSES AND DEVELOP CORE STRATEGIES

Objectives: Evaluate Current Trends and Prepare a Report

The third phase of the study work plan involved further investigation and understanding of the organizational structures, operations, limitations, achievements, and opportunities for improvement within the volunteer system. The activities that supported this process consisted of additional requests for information not already obtained in Phase I and II of the work plan. Data requests, made in this phase of the study, attempt to address any issues that emerged from the interviews, and further evaluate implications of the operational issues cited. Data obtained during the study process also assists the Study Committee in identifying issues influencing the current levels of service.

After receiving and critically evaluating information from the interviews and all supporting materials, the Study Committee began identifying the necessary critical action steps to achieve exceptional organizational functioning and uniform service levels throughout the County.

The deliverables achieved in Phase III involved drafting a report that evaluated current trends in services and recommended action steps for improvement.

PHASE IV: PREPARE FINAL REPORT

Objectives: Prepare and Present Final Report

The final phase of the study involved documenting the results of all previous tasks into a written report with critical components, such as an executive summary, methodology, background, and findings and recommendations. Once completed, a draft report was shared with the Charlotte County Administrator to ensure the technical content is accurate. Upon receiving corrections, the Study Committee revised the draft report, as needed, to assist in the preparation and issuance of the final report.

COUNTY INFORMATION

Charlotte County is located in south-central Virginia, approximately 80 miles southwest of Richmond. Five counties border Charlotte County: Appomattox County to the northwest; Prince Edward County to the north; Lunenburg and Mecklenburg counties to the east and southeast, respectively; and Campbell and Halifax counties to the west and southwest, respectively. The county has 475 square miles of land area and is considered the 28th largest county in Virginia. ²

In 2020, Charlotte County recorded a population of 11,529 people with a median age of 46.1 and a median household income of \$40,924. ³

According to the county's 2017 comprehensive plan:

Fire protection is provided by seven volunteer fire departments, located in Wylliesburg (Bacon District Volunteer Fire Department), Charlotte Court House, Cullen, Drakes Branch, Keysville, Phenix, and Red House (Figure 20). Both Charlotte Court House Volunteer Fire Department and Drakes Branch Volunteer Fire Department also operate First Responder units, providing basic life support and advanced life support services as needed. All seven fire departments rely solely upon volunteer firefighters, having no paid personnel. Finding an adequate number of volunteers, particularly during daytime hours, has become a challenge for many departments. Funding sources include donations and grants, as well as some direct funding from the county. 911 and dispatching services are provided by the county as well.

Emergency Medical Service is provided by the Charlotte County Rescue Squad. The Rescue Squad's main location is on Route 40 in Keysville; they also operate a satellite office in Wylliesburg which serves the southern part of the county and house an ambulance and staff at the Phenix Volunteer Fire Department to better serve the western portion of the county. The Rescue Squad relies on volunteer personnel as well as paid staff to meet current call demands. The growing need for paid personnel has had a significant impact on the Rescue Squad's funding needs. Funding sources include donations, grants, income from "soft billing" for transport services, as well as some direct funding from the county. 911 and dispatching services are provided by the county as well.

The Charlotte County Administration Office is responsible for carrying out the day-to-day operations of the county in accordance with the policies of the Charlotte County Board of Supervisors. The Board of Supervisors is the legislative policy making body for the County and appropriates funds.⁴

¹ Charlotte County Comprehensive Plan (Adopted 2017)

² United States Census Bureau, Charlotte County (2020)

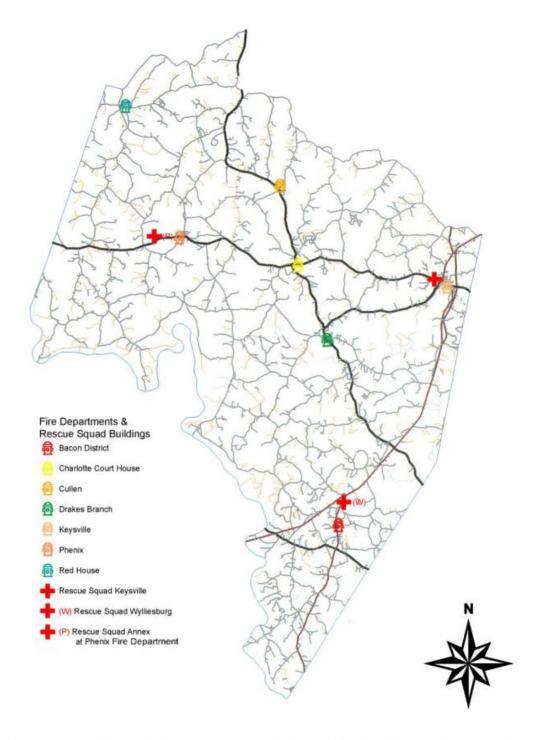
³ Ibid

⁴ Charlotte County Website (Administration and Board of Supervisors)

FIGURE 1: CHARLOTTE COUNTY EXISTING FIRE & RESCUE FACILITIES

A snapshot of Figure 20 from the Charlotte County Comprehensive Plan, approved in 2017, shows the location of each fire and EMS station in the county.

Charlotte County Existing Fire & Rescue Facilities



FINDINGS AND RECOMMENDATIONS

THEME 1: ORGANIZATION AND DELIVERY OF SERVICES

Charlotte County has seven independent volunteer fire departments plus the Charlotte County Rescue Squad that positions ambulances in three places from which they can respond to calls in the county.

After gathering information during the interviews and subsequent review of additional documentation, it is clear to the Study Committee that Charlotte County Fire and EMS is at a crossroads; it must make organizational changes to ensure both service delivery to the community and the needs of the fire and EMS stations are met.

Organizational change is a broad term that encompasses a company, organization or government evolving its strategies, policies, and procedures from what has always been done to a new, updated way of doing business.⁵

The Study Committee was informed of the county's intention to hire a Public Safety Director. This organizational change is applauded by the Study Committee and the county is encouraged to move through the hiring process to fill this position.

The recommendations below are provided to assist Charlotte County Administration with improving the organization and delivery of fire and EMS services.

Recommendations:

Centralized Authority

1. The current Fire and Rescue Association has been operating as a quasi-governmental organization. It is recommended that the association should be codified outlining specific responsibilities and expectations to improve organizational cohesiveness and efficiency. This recommendation is important because it directly ties to many recommendations in the next sub-section: Public Safety Director.

Public Safety Director

- 1. The Public Safety Director, once filled, should have operational authority for county Fire and EMS departments to both resolve issues and implement policies and procedures. This position should also initiate and maintain fiscal planning and procedures.
- 2. Working with the Fire and Rescue Association, the Public Safety Director should develop a tactical playbook of guidelines, such as Standard Operating Guidelines (SOGs). The county currently has seven published SOGs.
 - a. According to the National Fire Protection Association (NFPA), Standard Operating Guidelines (SOGs) are written guidelines that explain what is expected

⁵ Organizational Behavior – University of Minnesota Libraries Publishing, 2010

and required of fire service personnel in performing their jobs. SOGs are, in their simplest form, a "how-to" guideline to follow to achieve a desired goal. SOGs should not be viewed as rules and regulations, but rather as a roadmap to achieve specific goals and objectives. Standard Operating Procedures, however, are formal policies that specify a course of action, thereby ensuring efficiency, predictability, consistency, and safety.

- b. By implementing the countywide tactical playbook, it will help to improve coordination, safety and set an operational level of service for emergency response in Charlotte County.
- c. Ensure all stakeholders are included in the development of the countywide tactical playbook.
- 3. Working with county leadership and the Fire and Rescue Association, the Public Safety Director should implement a long-term, strategic plan regarding Fire and EMS services in the county to serve as a road map to sustaining and improving countywide fire and EMS services.
 - a. The long-term plan should identify immediate, intermediate, and long-term goals with specific deadlines. These measures will serve as the basis for the strategic plan and allow the Board of Supervisors to routinely evaluate service delivery.
 - b. As part of the plan, the Study Committee recommends that a unified vision statement be written for the fire and EMS system to aid in creating a direction for everyone to move towards.
 - c. Chapter 4 of *Principles of Management* ⁷ discusses developing mission, vision and values and is a good starting resource.
 - d. The county should consider using a neutral party to facilitate the development of the strategic plan.

Emergency Medical Services

Based on information received during the interviews and comments shared at the public hearing, the Study Committee is concerned that the Charlotte County Rescue Squad has lost the confidence of the residents of the county.

The Study Committee was made aware of an investigation regarding the Charlotte County Rescue Squad. Any findings of the investigation have no bearing on this report.

While it is clear efforts have been made to repair the squad's reputation, the Study Committee recommends the following regarding EMS service delivery:

- 1. Charlotte County and Charlotte County Rescue Squad should engage in an MOU-type agreement which coordinates the combination of assets such as personnel, stations and response equipment.
- 2. The Public Safety Director should oversee career EMS personnel.

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⁶ Ibid

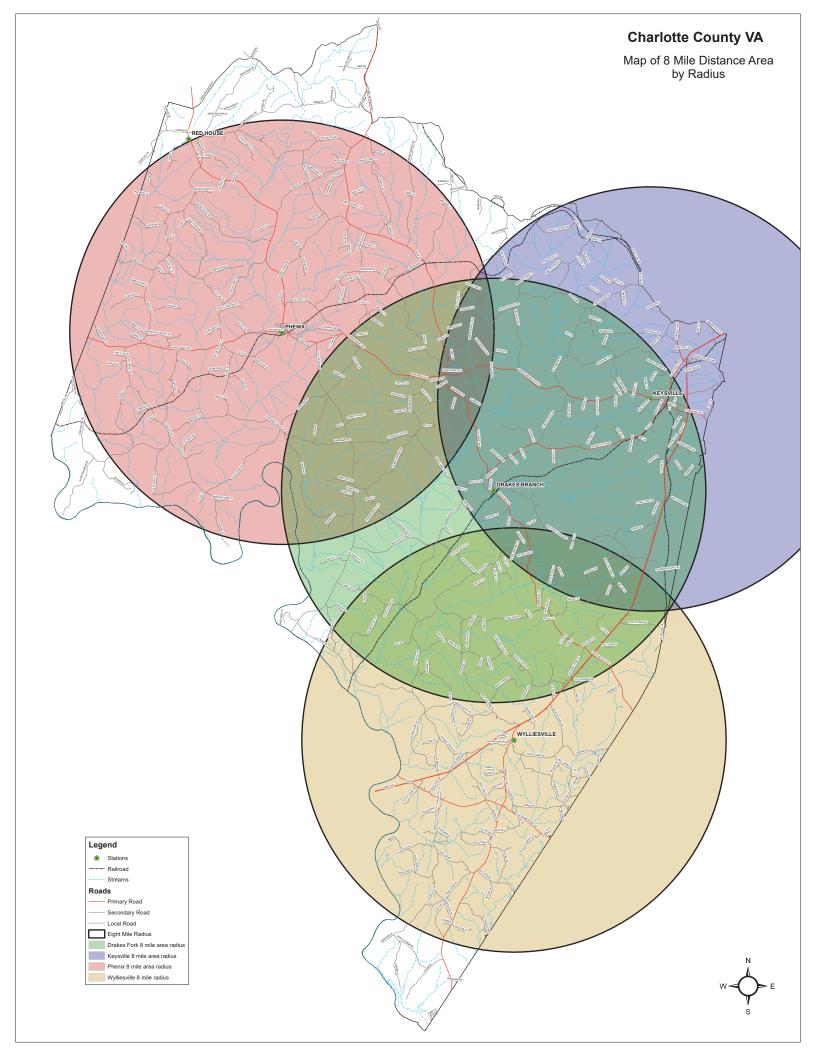
⁷ Principles of Management – University of Minnesota Libraries Publishing, 2010

- a. The countywide tactical playbook discussed above should include a section regarding EMS response including scheduling and radio communication protocols.
- b. The Public Safety Director should ensure that there is adequate staffing daily in Charlotte County prior to the rescue squad responding to routine EMS calls in surrounding counties.
 - i. The county should be sure Mutual Aid agreements with surrounding counties are either created or updated to include this information.
 - ii. The county geography requires multiple units be on duty at any time and available in Charlotte County (see #3 below). By keeping units in the county, this will improve overall service delivery.
 - iii. Further, more than one ambulance needs to be staffed on duty because while EMS patient transfer times at hospitals is not a new problem, staffing issues and bed capacity have presented new challenges for EMS agencies.⁸
 - iv. Ultimately, because of the geography and other factors, the county should work toward a plan of staffing at least three ambulances 24/7/365 with the goal of moving to staffing an additional fourth unit in the future.
- c. The Public Safety Director should review the staffing schedule and ensure Charlotte County Dispatch is aware of any changes.

3. Review Station Locations

- a. After reviewing the location of EMS stations and the shape of the county with 475 square miles of land area, the Study Committee proposes that the county (reference Figure 2 on the next page):
 - i. Re-assign 1 ambulance from Keysville to the Drakes Branch Fire Station for more central coverage of the county.
 - ii. Maintain 1 ambulance in the Phenix area Fire Station
 - iii. Maintain 1 ambulance in the Wylliesburg area. The living quarters at Rescue Squad Station 2 must be brought up to acceptable standards or the building addition added to the Bacon District Station for the purpose of enabling 24-hour EMS response.
 - iv. The county should consider contracting one advanced life support unit as a stop-gap measure while the county addresses staffing issues. The Public Safety Director and the Fire and Rescue Association should mutually agree upon where the unit will be stationed.
- b. In Figure 2 on the next page, an 8-mile hypothetical response radius was drawn around each station. Currently, there are units housed in the red, blue and yellow circles. The circle in the center, green, shows the relocated ambulance to Drakes Branch. By moving the ambulance to Drakes Branch, the response areas overlap, creating better service delivery to Charlotte County residents.

⁸ EMS Agencies Combat Patient Offload Delays Due to COVID-19, March 2021



- 4. There is still a place for EMS volunteer personnel
 - a. By moving to one EMS license (see 5.b below), there may be increased interest from fire departments to start First Responder status.
 - b. Additionally, none of the recommendations hurt the Charlotte County Rescue Squad's ability to focus on recruitment and retention of a strong volunteer base.
 - c. The tactical playbook should outline how the career, volunteer rescue squad members and first responders will be utilized in order to identify and respect the unique strengths and differences of these groups of responders.
 - d. Consider recruitment of Driver Only roles for volunteers and the ability to partner volunteers with career staff.

5. Other EMS Operational Improvements

- a. Consider allowing cross-trained EMS career personnel to respond to fire calls and the criteria under which that response can occur.
 - i. This recommendation is dependent on the financial status of the county, availability of applicants with dual certifications (Fire and EMS) and with agreement from the Fire and Rescue Association.
 - ii. While there are many system models in the United States, according to the International Association of Fire Chiefs, there are many advantages to this model including:
 - 1. Continuity of patient care between first responders and ambulance personnel who are part of the same organization
 - 2. Continuity of administration
 - 3. Continuity of the same medical training
 - 4. Continuity of the same medical equipment
 - 5. Continuity of Medical Direction
 - 6. Unity of Command
 - 7. Ability to deliver medical care while performing specialized rescue in such cases as auto extrication, marine rescue, high-angle rescue, collapse rescue environments and hazardous material events⁹
 - iii. Many of the volunteer fire departments do not have enough daytime personnel because county residents travel to other areas for work. Crosstrained career staff would help fill the void of available personnel during the day.
- b. The county should change the EMS model to where the County EMS agency is an "umbrella agency" in which all first responders and EMS members are also a member of the County's EMS Agency.
 - i. This would allow fire departments, if they chose, to more easily implement first responder status and assist the rescue squad with EMS calls.
 - The Virginia Department of Health's Office of Emergency Management Regulation and Compliance Division is the point of contact for this process.
- c. Achieve one Medical Director countywide

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⁹ IAFC: Fire-based Emergency Medical Services, May 2009

- i. The county should consider moving to one OMD so all providers are covered under the same expectations and quality assurance practices, etc.
- ii. If the county deems dual OMDs are beneficial due to varied transport locations, ensure the OMDs are working together on provider competencies, expectations, etc. to ensure streamlined service delivery.
- d. Utilize the Virginia OEMS Standards of Excellence Program
 - i. The purpose of the Virginia Standards of Excellence program is to identify and recognize EMS agencies that strive to operate above the standards and requirements of the Virginia EMS Regulations (12VAC5-31). The evaluation addresses several areas that collectively make up the operations of an EMS agency from several perspectives. ¹⁰
 - ii. A link to the site is provided here and in the references: https://www.vdh.virginia.gov/emergency-medical-services/virginia-standards-of-excellence-program/

Charlotte County Dispatch

The Public Safety Director, once hired, is encouraged to work with county leadership and the Charlotte County Sheriff's Office to ensure dispatch-jailers, a combined role, can continue to operate effectively despite increasing regulations for both disciplines.

The Study Committee raises this point to ensure that with call volume increasing, fire and EMS personnel continue to always have reliable and instantaneous communication to effectively coordinate response and recovery operations.

As emergency medical dispatch (EMD) evolves, the Office of Emergency Medical Services offers the following for consideration:

Recommendations:

- 1. Use the same OMD as the county EMS system
- 2. Pursue EMS Accreditation with the Office of EMS Emergency Operations Division 11

THEME 2: TRAINING

When the citizens in Charlotte County call for help, they expect and deserve the very best service. The importance of training in the fire and EMS service cannot be overstated.

Many of the fire departments in the county and Charlotte County Rescue Squad try to schedule some kind of relevant and quality training for their membership. To ensure the highest level of service to the community, the Study Committee recommends that departments consistently train to enhance the knowledge, skills and abilities of the members of the fire and EMS service.

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¹⁰ OEMS: Virginia Standards of Excellence Program

¹¹ OEMS: PSAP & 911 Center Accreditation Program

Recommendations:

- 1. Create Fire-EMS Training Captain/Volunteer Coordinator Position
 - a. The position will schedule county-sponsored training for the fire and EMS services. It is recommended that trainings be held in varied locations where multiple departments can attend to encourage members from each department to interact and work together as one team.
 - b. Working with the Public Safety Director and the Fire and Rescue Association, this position should work to establish acceptable training standards that can be incorporated into the county's tactical playbook.
 - c. This position should work with VDFP Division 3 staff to determine local training opportunities.
 - d. Additionally, this person should be responsible for coordinating continuing education (CE) classes for EMS personnel.
 - e. It is also recommended that this position serve as a fire and life safety educator not only for recruitment of new members by discussing training requirements with potential volunteers but also serving as the liaison between the fire and EMS services and community groups as well as the county school system to schedule demonstrations, Touch-A-Truck events and other fire and life safety education events.

2. Invest in Fire Service Training

- a. The county should consider constructing a live fire training structure or partner with surrounding counties to enhance training opportunities available in the county.
 - i. The Virginia Department of Fire Programs, on behalf of the Virginia Fire Services Board, manages the Live Fire Training Structure Grant. There are currently 50 burn buildings across the Commonwealth, seven of which are in VDFP's Division 3. For more information about the grant, visit: https://www.vafire.com/grants-and-local-aid/burn-building-grants/
- b. If the live fire training structure was built, the training captain/volunteer coordinator could oversee scheduling joint live fire as well as cold fire training exercises.
- 3. Utilize the Office of Emergency Medical Services' Resources
 - a. The Office of EMS with the State EMS Advisory Board Workforce Development Committee has created an EMS Officer Program that can be implemented in EMS agencies to help boost leadership and help develop and maintain quality leaders in the EMS Community. The program covers topics like human resource management, community and government relations, administration and more.
 - i. Additional EMS Leadership resources can be found here: https://www.vdh.virginia.gov/emergency-medicalservices/chatr/leadership-management/
 - b. The Office of EMS provides programs and services including technical assistance and other resources that EMS agencies, leaders and localities can use to support EMS in their communities. Learn more about recruitment and retention, EMS

system development, and leadership and management: https://www.vdh.virginia.gov/emergency-medical-services/agency-technicalassistance-resources/

c. EMS E.V.E.N.T. Reporting tool for EMS Near Miss Reporting: https://www.vdh.virginia.gov/emergency-medical-services/emergencyoperations-2/ems-event-notification-tool-e-v-e-nt/#:~:text=This%20reporting%20system%20is%20called%20the%20EMS%20Vo luntary, over% 20EMS% 20on% 20a% 20quarterly% 20and% 20annual% 20basis.

THEME 3: BUDGET AND APPARATUS

A recent study from the NVFC found that 86% of volunteer fire departments have been adversely impacted by inflation and high gas prices. 12 With expenses rising and with at least six pumpers and three tankers more than 20 years old and an EMS unit with more than 200,000 miles in the county, the Study Committee offers a few recommendations to help find cost savings countywide while maintaining a high level of service delivery.

Recommendations:

Budgeting

- 1. The first step to budgeting and planning is understanding the risks which generate the most calls for service and/or injuries. Charlotte County should complete an annual risk assessment to determine the impact on the delivery of fire and EMS services which will justify the base funding allocation to each department based on the results of the risk assessment and quantitative data.
 - a. Based on the interviews, at least six pumpers and three tankers are more than 20 years old. With aging apparatus, it is important for the county to understand the needs of the Fire and EMS agencies to be able to make prudent budgetary decisions.
- 2. As stated in the 2009 Fire and EMS Study, it is strongly recommended that the county in cooperation with the Fire and Rescue Association develop a Capital Improvement Plan (CIP) for upgrading its personal protective equipment, fire hose, EMS equipment, and all apparatus. The Study Committee recommends the plan include all motorized apparatus with the possibility of brush trucks and ATVs being excluded. Additionally, it is recommended that the county assume the costs of all annual insurance and fuel costs of the individual departments.
 - a. As part of the CIP, the county should consider offering to each department the possibility of assuming current debt on the motorized apparatus and including the cost in the CIP. This process would facilitate titling of all motorized apparatus in the CIP program as county assets.

¹² NVFC: NPPGOV Provides Cooperative Purchasing Options, October 2022

The foregoing is a recommendation authorized pursuant to Va. Code 9.1-203.A.4 and is not to be construed as legal advice or as a binding recommendation.

- b. During the interviews, individual company debt load is still present. The establishment of a CIP replacement program in conjunction with the consolidation of county funding should provide positive improvement with this concern.
- c. The benefit of a CIP plan is to reduce a large burden of the individual department's annual expenses. This should reduce the necessity of current "manpower extensive" fundraising which usually has a negative effect on membership retention.
 - i. More financial support such as insurance, fuel, utilities, medical supplies, etc. allows for more volunteer availability to respond and train vs fundraise to sustain each individual agency.
- d. According to the Office of Emergency Medical Services, ambulances are on a 36-month lead time currently for "box style" since the chassis are unavailable from the manufacturers. Van-style can be purchased/delivered quicker and cheaper at this time.
- 3. Charlotte County should consider using a grants writer to assist the organizations with the acquisition and management of grants. This individual should research and consider the availability of all federal, state and private grant programs, including:
 - a. Virginia Department of Forestry Grants
 - i. Volunteer Fire Assistance (VFA) Grant
 - ii. Firewise Virginia Community Hazard Mitigation Grant
 - iii. Dry Hydrant Grant
 - b. Federal Emergency Management Agency Grants
 - i. Assistance to Firefighters Grant (AFG)
 - ii. Fire Prevention & Safety (FP&S)
 - iii. Staffing for Adequate Emergency Response (SAFER)
 - c. Virginia Department of Health-Office of Emergency Medical Services' Squad Assistance Fund (RSAF) Grants
 - d. Virginia Fire Services Board Grants, administered by the Virginia Department of Fire Programs including the Live Fire Structure Training Grant discussed in the training section.
 - e. Various private grant programs:
 - i. https://www.grants.gov/
 - ii. https://www.emsgrantshelp.com/

Standardization Central Purchasing

There was some discussion with the Study Committee that a centralized purchasing system was in place in the county but was not widely used. With most fire departments and the rescue squad shopping, stocking, and servicing their equipment separately, this leads to increased costs. It is imperative that the county pursue centralized purchasing. Standardization and central purchasing is necessary for delivering cost-effective and efficient fire and rescue services. The use of standardization of future equipment and apparatus purchases can potentially lead to cost-savings countywide.

Recommendations:

- 1. The county should develop and implement a centralized purchasing option to leverage purchasing power and reduce operational expenses.
- 2. Consider one insurance policy for all Fire-EMS apparatus.
- 3. Countywide medical supply ordering.
 - a. Items can be bulk ordered, centrally stored and distributed, as needed
 - b. This reduces expenses and waste through supply sharing and bulk order discounts

THEME 4: COMMUNITY RISK REDUCTION

Community Risk Reduction (CRR) is not just the fire marshal's office and public education. Instead, it is a whole-organization approach to providing programs and services to best meet community needs. By embracing this broader view and applying the models of CRR, fire suppression, EMS, technical rescue, recruitment, incident command, functional fitness and other such elements all exhibit ties to improved community outcomes.

CRR efforts are a process to identify and prioritize local risks, followed by the integrated and strategic investment of resources to reduce their occurrence and impact. Risk is often influenced by economic and social data. Therefore, the CRR process must address socioeconomic issues as well as correcting unsafe actions and processes.

Recommendation:

- 1. Complete a Community Risk Assessment (CRA)
 - a. The entire CRA process is based on the collection and review of community profile information comprised of a loss /event history profile and the response environment. The response environment looks at the type of incidents to which public safety organizations in the community respond, and the capabilities of these organizations. The loss/event profile looks at past experiences and trends in response, losses and causes.
 - b. It is unclear if the county currently possesses a reliable means by which to collect such data. At such time that a means of data collection becomes available (ie. VFIRS reporting), the VDFP CRR Coordinator, upon request, can return to assist the county with this process.

Evaluate the need for a Community Para-medicine (CP) Program

A CP program is designed to alleviate the burden on existing medical, social services, and emergency services by misappropriated requests for resources. While all CP programs share this mandate, they differ in the execution of the services provided based on local need.

Disparities in access to healthcare exist across the system and involve many factors – location, race, gender and income. Due to the inability of some Americans to obtain effective healthcare,

patients will turn to one resource that is always available – EMS, supported by hospital-based emergency medicine. Inability to access appropriate care leads to activation of the EMS system as it is the only assistance some people can rely on.

An effective CP program must be data-driven. A common reason programs fail is that their creation and intent differ from the needs of the community. An effective CP program must be a root cause and data-driven process. Root causes may consist of geographic locations of frequent EMS calls, spikes in call volume at a particular location or for a person, and/or repeated requests for service for another individual. A common reason programs fail is that their creation and intent differ from the needs of the community.¹³

The worth of community para medicine is measured not only in reduction of financial burden to health systems, but more importantly, it may reduce the frequency of unnecessary non-emergent transports.

Recommendation:

1. Upon completion of the county's reorganization under a single Medical Director, the Public Safety Director should review the calls for service in conjunction with the Medical Director to determine a causative need and if a CP program would be beneficial. This program should be an inclusive partnership between the county and one or more of the hospitals which receive patients from the county.

Virginia Fire Incident Reporting System (VFIRS)

The basis of any CRR effort is the systematic collection and review of community profile information. A loss /event history profile describes the community's past and trends and how the community's experience compares to local, regional, and national trends.

Currently six of the seven fire departments in Charlotte County are not utilizing the VFIRS fire reporting system. When coupled with the fact that the current CAD record management system is not as functional as desired, there does not appear to be a quick and/or easy procedure to conduct a comprehensive loss/event history or a response environment profile. A review of the previous Fire Services Board Study conducted in 2009 indicated that only four (4) of county fire departments were reporting at that time.

Recommendation:

1. All non-reporting county fire departments are strongly encouraged to start or continue fire reporting via VFIRS. Not only does this process provide insight into the county's emergency responses and trends, it can provide a means of comparing the local trends to regional and national trends. As stated above, this information is critical for the identification and mitigation of any community risks.

Recruitment and Retention

The foregoing is a recommendation authorized pursuant to Va. Code 9.1-203.A.4 and is not to be construed as legal advice or as a binding recommendation.

¹³ Community Paramedicine: What, why and how?, 2022

Volunteerism has been a part of the community tradition of the United States since the beginning of colonization. At the origin of volunteer fire departments, volunteers were often the political leaders in a community. Today, the volunteer labor force consists of citizens who are more technologically savvy and driven by an entirely different set of criteria. It must be accepted that the "culture" of the fire service is acquired over time. A simplistic definition of culture is "the way we do things around here." The average age of a volunteer member in the fire service today is above 50 years old. This "culture" tends to subscribe to the belief that all members should "be able to do all things." This strategy may not be successful in today's culture. Today, a more productive belief is a fire department should be viewed as a football team with several different groups of individuals being responsible for specific functions. 14

Recommendations:

1. The county Fire and Rescue Association should encourage a modification of the "how we do things culture." Each department should do an assessment to determine what the main operational areas are for their organization. This would allow for the targeted recruitment of individual members to handle non-emergent functions such as fundraising, entering fire reports, marketing/social media initiatives, fire & life safety education and community programs, human resource management, station & apparatus maintenance, and in-house training.

By utilizing these specialized groups to achieve specific tasks, it works to free up the demands on those members that are actually interested in responding to emergencies and maintaining the necessary training. Thus, this type of "culture" addresses retention needs by ensuring all members attain a sense of achievement and being a part of the community.

2. The "culture" should become more inclusive. It appeared that white male members far outnumbered all other members. It is difficult to recruit members from citizens receiving services if they don't "see people like me." It should be a goal of the Fire and Rescue Association to have the membership which reflects the race and gender demographics of the county which are approximately¹⁵:

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White - 69% Black - 28% Other - 3%
Male – 49.3% Female 50.3%
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3. The Fire and Rescue Association should utilize the National Volunteer Fire Council's "Make Me A Firefighter" recruitment tool which features a department portal filled with resources and tools for implementing a local recruitment campaign as well as a public web site to allow potential volunteers to find local opportunities. There are step-by-step guides and resources on marketing and planning events to engage prospective recruits. It will allow a posting of volunteer opportunities by entering them into a database which is searchable to potential volunteers who can connect directly with the department through MakeMeAFirefighter.org. It is possible to customize outreach materials for each individual

¹⁴ Why firefighting is like football, 2015

¹⁵ Discovery Data Hub, 2021

department to use in the community. The MMAFF program can track recruits and send reminders of where they are in the recruitment process. ¹⁶

Incentive/Awards Program

It is recommended that Charlotte County establish an incentive / award program to show continued support, recognition, and appreciation of the county fire-rescue volunteer members. Examples of programs would be: personal property tax reduction, pay per call, local business discounts, years of service awards, annual picnic or banquet and the VOLSAP retirement program.

Recommendations:

- 1. Consider offering VOLSAP (Volunteer Service Award Program).
 - a. Virginia has a state VOLSAP retirement program administered by the Virginia Retirement System. This program is a service award program established to provide a financial incentive and monetary award to eligible volunteer firefighter and rescue squad workers. The program allows eligible volunteers, local departments, squads and localities to contribute money that is then invested alongside the VRS pension trust fund. Contributions must be quarterly and be either \$30, \$60, or \$90 per quarter in addition to any matching contributions by the department or locality. Members will continue earning service credit for each month of volunteer service until the member reaches the age of 60 at which point fund distribution begins.

Safety Practices: Cancer

As stated in the Lavender Ribbon Report,¹⁷ developed by the NVFC and IAFC, cancer is the leading health risk facing firefighters, largely due to the chemicals and carcinogens they are exposed to while engaged in response activities. Chemically-based plastics are in use in nearly every product in our homes, business and vehicles and when they burn they change their chemical composition.

Recommendations:

- 1. It is generally accepted that occupationally caused cancer is something that can be prevented by wearing protective gear properly, gross removal of fireground contamination while on scene, washing of turnout gear after returning from incident engagement, establishing a fire hood exchange program and showering as soon as possible, are just some of the basic best practices. These best practices should be incorporated into the county's updated tactical playbook discussed in Theme 1.
- 2. The Firefighter Cancer Registry Act of 2018 mandated the Centers for Disease Control and Prevention (CDC) to create a voluntary registry of firefighters to collect health and

¹⁶ NVFC: Make Me a Firefighter Program, 2021

¹⁷ NVFC: Lavender Ribbon Report

The foregoing is a recommendation authorized pursuant to Va. Code 9.1-203.A.4 and is not to be construed as legal advice or as a binding recommendation.

occupational information to determine cancer incidence in the U.S. fire service. In response to this mandate, CDC's National Institute of Occupational Safety and Health (NIOSH) established the National Firefighter Registry (NFR): https://www.cdc.gov/niosh/firefighters/registry.html

3. In addition to the Firefighter Cancer Registry Act, it is recommended that the Public Safety Director and Fire and Rescue Association work together to ensure each volunteer fire department maintains a roster and submits the list to the clerk of the circuit court as detailed in Code of Virginia § 27-42. ¹⁸

¹⁸ Code of Virginia – Chapter 4

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APPENDIX A

Charlotte County Comprehensive Analysis Study of Fire/EMS System Request



County of Charlotte Board of Supervisors

Phone 434-542-5117 Fax 434-542-5248 Post Office Box 608 250 LeGrande Avenue, Suite A Charlotte Court House, VA 23923-0608 Daniel N. Witt County Administrator www.charlottecountyva.gov

May 26, 2022

Policy Manager Virginia Department of Fire Programs 1005 Technology Park Drive Glen Allen, VA 23059

RE: Comprehensive Analysis Study of Fire/EMS System Request - Charlotte County

To Whom It May Concern:

This is to request the services of the Virginia Fire Services Board (VFSB) in conducting a complete and thorough review of the fire and EMS system in Charlotte County.

This study has the support of the Charlotte County Board of Supervisors and County Administration and was shown by the approval of a motion made to request the study at the May 9th Board of Supervisors meeting.

The requested areas of concentration of this study include:

Department of Fire Programs

- Organization
- Budget and Administration
- Training
- Delivery of Services
- Fleet Design and Management (Equipment/Apparatus)
- Emergency Medical Advisory Committee
- · Charlotte County Fire & Rescue Association

Administration

JUN - 1 2022

It is the Board's and County Administration's proposal to have a complete and through review of the aforementioned areas on concentration and a comprehensive list of recommendations to enhance the delivery of services to the citizens of Charlotte County.

Your consideration of this request at the next available opportunity would be greatly appreciated. I am available to respond to any questions you might have regarding this request. I can be reached by phone at 434-542-5117 or by email at dwitt@charlottecountyva.gov.

Daniel Witt

County Administrator

Gary D. Walker, - Chairman Gaeland H. Hamlett.

Hitzel Bowman - Smith

Robert L. Shook, Keysville (D) Tony Reeves
Cullen/Red House (

Walter T- Bailey

E) Aspen/Phyrix (F

y Will Garnett - Vice Cha

APPENDIX B

Scope of Fire and EMS Study Agreement between the County of Charlotte and the Virginia Fire Services Board



COMMONWEALTH of VIRGINIA

Keith H. Johnson VIRGINIA FIE SERVICE BOARD CHAR

Virginia Department of Fire Programs

Scope of Fire and EMS Study Agreement

Between the

County of Charlotte

And the

Virginia Fire Services Board

PURPOSE AND SCOPE

The purpose of this agreement is to establish mutually accepted duties, responsibilities, and expectations between the Virginia Fire Services Board, its designated Fire and EMS Study Committee and the locality which has requested the Fire and EMS Study/Technical Assistance from the Virginia Fire Service Board. The agreement is provided to help define activities and expectations between both parties.

AGREEMENT

- Study results/recommendations shall be comprehensive in nature and shall be consistent with and organized according to a final revised scope of work as negotiated between the Study Committee and the locality prior to the formal commencement of the Study. **Refer to Self-Assessment Questionnaire for Scope of Study.
- While questions of staffing ratios, response time, capital equipment purchases, etc. are relevant to the Study process, the locality should not expect detailed recommendations in these areas beyond system-wide recommendations.
- Study Results will be openly presented to the elected/appointed governing body, the requesting agency as well as any additional requesting organization(s);
- > The time frame noted for technical assistance will be accepted;
- All relevant organizational data will be made available to the study committee; and,

1005 Technology Park Drive, Glen Allen, VA 23059-4500 Phone: (804) 371-0220 or Fax: (804) 371-3444 www.vafire.com

- Locality will provide to the Virginia Department of Fire Programs a central point of contact. Please ensure the contact is available Monday – Friday from 9 am to 5 pm, and nighttime and weekends as needed.
- Within 6 to 9 months of the Study completion, the Department of Fire Programs will email the locality a feedback follow-up survey. It is requested that the locality complete the survey so the Agency and Board can gain valuable in-sight
- Into the success and areas of improvements for future studies. Your participation in the feedback survey is important to the Agency and Board.

REVIEW AND TERM

This agreement shall be in effect until the end of the Fire and EMS Study.

SIGNED

We do hereby acknowledge and agree to abide by the provisions of this Memorandum of Understanding.

Keith H. Johnson

Kart Sk

Chairman of Virginia Fire Services Board Virginia Department of Fire Programs

June 21, 2022

Date

Authorized Locality Representative

6-23-2022

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