



National Fire Protection Association

Technical Committee on Emergency Medical Services

National Stakeholders Meeting on Mobile Integrated
Healthcare and Community Paramedicine Report



National Fire Protection Association

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Report on the NFPA Technical Committee on Emergency Medical Services National Stakeholder Meeting on Mobile Integrated Healthcare and Community Paramedicine

April 2 & 3, 2014

MGM Grand Hotel

Las Vegas, NV

Background

The NFPA Technical Committee on Emergency Medical Services (EMS-AAA) convened a national emergency medical services (EMS) stakeholders meeting to discuss the subject of Mobile Integrated Healthcare/Community Paramedicine (MIH/CP). Previously, the EMS Technical Committee had reviewed a new project request for a MIH/CP document, though that request was later administratively withdrawn. The entire EMS Technical Committee worked to develop that new project request which was submitted individually by Dr. David Tan, representing the National Association of EMS Physicians (NAEMSP) in late 2011. Since submittal of the proposal by Dr. Tan there

have been many changes to the delivery of healthcare, including the delivery of EMS. These reforms compelled the EMS Technical Committee to organize a meeting for stakeholders to garner input from a broad group of healthcare professionals and to discuss the possibility for a new request on MIH/CP. The meeting afforded the opportunity to not only learn the opinions of prominent national EMS and healthcare professionals, but also to discuss how the NFPA could assist the community of actors involved in MIH/CP.

History

The concept of MIH/CP has existed for quite some time, but more prevalent in other countries around the world than in the U.S. The primary purpose of MIH/CP programs is to provide more healthcare services directly to patients on location and to minimize trips to the hospitals. Healthcare purveyors in Canada, Australia, and New Zealand have used the same model successfully for a number of years. U.S efforts initiated, due in large part to the Affordable Care Act, to launch MIH/CP programs, include programs in Colorado, Maine, Michigan, and Texas.

As the profile of MIH/CP programs rises among providers for the delivery of an evolving unique and specific type of healthcare, delivery of these services by those already engaged in pre-hospital medical care is an obvious progression. As MIH/CP programs proliferate and increase across the country, the lack of standardization, leaves interested parties without definitive guidance for implementing a successful program. This identified lack of standardization resulted in the EMS Technical Committee's development of the original project request submitted in 2011 (see

attachment 1) to initiate standards to address the potential needs and demands of those involved in the delivery of MIH/CP.

As required by the NFPA standards development process, all new project requests are published for public comment to determine whether there is support to develop a project. The public comments (see attachment 2) received on the MIH/CP request did not provide the EMS Technical Committee with a definitive direction of pursuit. Some encouraged the NFPA to develop a document on this subject, while others discouraged the NFPA. Based upon public comments received, the EMS Technical Committee decided to solicit additional public comment to support an informed, and balanced decision regarding standards development.

Receiving no further public comments and after discussions with the EMS Technical Committee and Staff, it was decided to administratively withdraw the request for possible resubmission at a later date. Simultaneously, the EMS Technical Committee recognized that with ongoing changes in the EMS and healthcare landscape, it would be advisable to revisit this topic at a later date.

During the same time, several organizations were taking active steps towards the development and implementation of a MIH/CP program-again without an established national standard. Local agencies identified needs or gaps that could be filled by existing resources to provide some level of care that resembled a MIH/CP. Typically these local agencies would seek to align existing resources to the types of services delivered by MIH/CP programs in other communities or to apparent gaps of available healthcare in their own communities. These assessments considered other communities' MIH/CP services, then modifications were integrated where necessary.

Local programs ranged from those as simple as blood pressure clinics, health and wellness checks, flu shot clinics, and blood glucose checks to more involved healthcare services.

Another aspect of MIH/CP programs being explored was an analysis of telecommunication services to ensure appropriate resource deployment, for example, assisting someone from the floor, re-connecting oxygen tubing, re-bandaging a wound, and treating a person in the home while arranging up a follow-up appointment with their doctor.

Supporters of a national MIH/CP standard recognize that there is a financial aspect with a MIH/CP program to be addressed. Historically most pre-hospital care providers do not receive reimbursement for services provided unless the patient is transported to the hospital. This is counter to the foundation of MIH/CP care, which strives to provide intervention in the pre hospital setting and reduce the need for transport to a hospital. Hospitals share this goal because new healthcare laws and regulations include financial penalties for the readmission of patients who were recently discharged. MIH/CP programs partnering with hospitals are poised to achieve this goal. In fact, many hospitals are developing agreements with EMS providers to include these services within local EMS delivery systems in order to provide reimbursement for treating these patients at home and avoiding unnecessary trips to the emergency rooms. The ideal result of these partnering programs allows the patient to stay at home, receive treatment for immediate medical need, while avoiding the emergency room treatment, and receiving a definitive follow-up care plan. The scope and breadth of the

care provided under a MIH/CP program is dependent upon approval by state and local protocol, in conjunction with the medical director.

Based on the continuing evolution of MIH/CP programs, the EMS Technical Committee convened a meeting that included national stakeholders and sought their comments and feedback. Invitees included representatives from nursing associations, EMS chiefs, fire service representatives, private EMS transport company representatives, EMS educators, and others whom are actively engaged in the implementation of a MIH/CP program (see attachment 3). The intent of the EMS Technical Committee and NFPA was to engage as many organizations in the discussion as possible. The meeting also allowed those organizations and agencies who are not as familiar with the NFPA process to gain insight into that process.

The EMS Technical Committee established a meeting goal to seek input and feedback that would then help determine an action regarding a new project request on the subject of MIH/CP.

Committee Actions

The meeting took place in Las Vegas, Nevada at the MGM Grand Hotel and Casino April 2nd and 3rd, 2014. The list of attendees, Technical Committee members and guests, is included with this report (see attachment 4), along with the meeting agenda (see attachment 5). To open the meeting, EMS Technical Committee Chairperson Kenneth Knipper welcomed everyone and called it a “historical meeting” noting that such a group of some well-known and well respected professionals in EMS were in the same room, at an NFPA meeting, and talking about the same issue:

Ensuring that the appropriate level of healthcare is delivered to those in need. Simply, the key concern of the NFPA EMS Technical Committee and stakeholders is to ensure that the needs of communities are being met efficiently.

During the first day of the meeting, the attendees discussed the role of NFPA in MIH/CP and EMS generally. At present, the NFPA has approximately 40 EMS related standards. This fact was not well known by many of the non-committee member attendees. Some attendees indicated they were not aware that NFPA had developed any EMS related standards and voiced reluctance to NFPA being the organization to develop a document focused on the “delivery of healthcare”. The attendees recognized NFPA’s great work and reputation in the field of standards development, yet stressed that any standards on MIH/CP should be borne of a collaboration of medically-centered organizations and NFPA. Technical Committee members emphasized NFPA’s well-established and respected process, noting that NFPA adds value and credibility to any standards development on MIH/CP.

Another meeting discussion examined the newness of the MIH/CP field and if attempts at standardization were premature. The models and concept of MIH/CP programs are rapidly changing, creating the possibility that a standard developed today could be outdated in 6 months. NFPA staff and EMS Technical Committee members recognized that a new standard takes longer to develop than a revision of existing standards, but NFPA has developed sound, consensus standards on a shortened timeframe where necessary. In response to concerns of the uncertain future of MIH/CP development, it was noted the NFPA process allows for future trends to be addressed

as all NFPA Standard must be revised every 3 to 5 years, providing the opportunity to incorporate new and evolving concepts.

By the conclusion of the meeting, the options placed before the entire EMS Technical Committee that was present included the following options:

- 1) Develop a new NFPA project request for a standard/guide on MIH/CP;
- 2) Develop new text that would be incorporated into the next edition of NFPA 450, *Guide for Emergency Medical Services and Systems*; and
- 3) To remain silent on the issue.

After careful and deliberate consideration, the EMS Technical Committee opted to develop and submit a request, in the form of a literature review, to the Fire Protection Research Foundation (see attachment 6). In choosing this option, an inventory of the concept of MIH/CP currently and how can the Technical Committee best address the needs of the end users and the EMS community will be determined.

Next Steps

While the EMS Technical Committee has decided to develop and submit a request to the Fire Protection Research Foundation, its members understand that anyone may submit a new project request on MIH/CP, or any other topic for the NFPA Standards Council to consider, in the interim. The EMS Technical Committee will advocate for the approval of the Research Foundation request, given the strongly

voiced interest from the International Association of Fire Fighters (IAFF) and the International Association of Fire Chiefs (IAFC). Should the project proceed, the NFPA Standards Council in conjunction with the EMS Technical Committee can use this Research to determine the need for a standard/guide on this topic. Regardless of the decision on the Research request, during the revision process of NFPA 450, the EMS Technical Committee has the opportunity to address MIH/CP as a committee or in response to requests, or through the public input process.

At the conclusion of the meeting, Chair Knipper thanked every attendee for participating in this “historic” meeting and committing their time and expertise to the NFPA process. The NFPA will be developing and maintaining the list of organizations that received information from this meeting, as well as other interested organizations (see attachment 7). This list will ensure communications with those individuals of the activities of the EMS Technical Committee and any other activities that might be of interest. The EMS Technical Committee participants expressed that both the NFPA and the EMS Technical Committee are committed to listening to input and feedback from the public and are open to active participation of the EMS community whenever, and wherever, possible.

ATTACHMENT

1

New Project Initiation Form

(To be completed by proponent of new project/document)

Additional pages may be attached if necessary.

a.	<p>Explain the Scope of the new project/document:</p> <p>A Guide for the Development of Community Paramedicine Programs. The scope of this document would be to assist EMS systems in integrating EMS into public health as called for in the EMS Agenda for the Future.</p>
b.	<p>Provide an explanation and any evidence of the need for the new project/document:</p> <p>The landmark publication <i>EMS Agenda for the Future</i> called for the integration of pre-hospital medical systems into the continuum of medical care to include the spectrum of public health. While many EMS systems have begun to consider methods of answering this call, few resources exist to guide administrators in this underdeveloped niche of pre-hospital medicine. Fueling the recent interest in community paramedicine initiatives is the latest pronouncement by CMS that hospitals will begin to receive penalties for patients who are re-admitted to a facility for the same diagnosis within 30 days of discharge. Hospital administrators are now looking to EMS as a possible bridge between inpatient discharge and outpatient follow-up appointments to identify those patients at highest risk for relapse. It is a natural fit for EMS in many ways. First, EMS systems are designed to expand and contract resources based on demand. The infrastructure exists having mobile resources placed around a service area that could easily perform a post-discharge wellness check on a patient. Second, the EMS providers themselves are highly accustomed to working under physician protocols and standing orders. These providers have the experience and training necessary to recognize the acutely ill or decompensated patient and to stabilize them if transport is necessary. Third, a number of highly skilled and experienced EMS providers leave the work force due to physical limitations that prevent them from tolerating the daily abuse and demands typical of a street medic. These providers are often relegated to desk duty where their skill and experience is no longer benefiting direct patient care. Community paramedicine programs allow these seasoned providers to continue using their valuable assessment skills and inherent patient advocacy position to directly benefit high-risk patients while fulfilling the vision for complete integration of EMS into the healthcare continuum. We believe that an NFPA document addressing community paramedicine development would become a highly sought after resource for EMS leaders across the country.</p>
c.	<p>Identify intended users of the new project/document: Any EMS system and hospitals, community health centers, public health advocates, and physicians.</p>
d.	<p>Identify individuals, groups and organizations that should review and provide input on the need for the proposed new project/document; and provide contact information for these groups: IAFF, IAFC, NAEMT, NAEMSP, Insurance industry, ACEP, NREMT, NVFC, NASEMSO, NAEMSE, Advocates for EMS, NEMSMA, Fire Based Advocates for EMS.</p>
e.	<p>Identify individuals, groups and organizations that will be or could be affected, either directly or indirectly, by the proposed new project/document, and what benefit they will receive by having this new document available: IAFF, IAFC, NAEMT, NAEMSP, Insurance industry, ACEP, NREMT, NVFC, NASEMSO, NAEMSE, Advocates for EMS, NEMSMA, Fire Based Advocates for EMS.</p>
f.	<p>Identify other related documents and projects on the subject both within NFPA and external to NFPA: None within the NFPA. Unknown of any that address this subject, however there is a large need or demand for a document to address this subject.</p>
g.	<p>Identify the technical expertise and interest necessary to develop the project/document, and if the committee membership currently contains this expertise and interest: The EMS-AAA TC has the sufficient technical expertise necessary to develop this document.</p>

h.	Provide an estimate on the amount of time needed to develop the new project/document: 2-3 years.
i.	Comment on the availability of data and other information that exists or would be needed to substantiate the technical requirements and other provisions of the proposed new project/ document: The data is sparse where no formal study has been done to evaluate this subject. This is the reason for the desire of the EMS-AAA TC to develop this document with the expertise on the TC with input from any and all interested parties.

Please send your request to:

NFPA

Codes and Standards Administration

1 Batterymarch Park

Quincy, MA 02169

Stds_admin@nfpa.org

Rev. 10/09

Signature: _____



Name: David K. Tan, M.D., FAAEM

(please print)

Affiliation: National Association of EMS Physicians

ATTACHMENT

2



National Association of State EMS Officials

201 Park Washington Court • Falls Church, VA 22046-4527 • www.nasemso.org
703-538-1799 • fax 703-241-5603 • info@nasemso.org

Comment No. 1

June 7, 2012

James T. Pauley, PE, Chair
NFPA Standards Council
1 Batterymarch Park
Quincy, Massachusetts 02169-7471

Dear Mr. Pauley,

The National Association of State Emergency Medical Services Officials (NASEMSO) is the national organization that represents the 56 state and territorial agencies with legislative mandates to regulate and guide the development of emergency medical services (EMS) systems in their respective states. We have recently reviewed the New Project Initiation Form related to creating “A Guide for the Development of Community Paramedicine Programs.”

We strongly discourage the initiation of this project, and recommend that the Standards Council reject the request. Our objections center on three issues:

- A lack of evidence related to Community Paramedicine
- Potential conflicts with state laws and regulations
- The need for a more appropriate forum to evaluate this topic

There is a paucity of data and research on the subject of community paramedicine. As such, NASEMSO’s stance is that insufficient science is available to inform the creation of such a guide at this time. Since many community paramedicine programs are pilot programs and in their infancy, there is little more than the history of practices selected to date, and processes and methods chosen at the local level and no comparative or objective review to determine appropriate methods for the development of community paramedicine programs.

EMS care is governed by state laws. These statutes and regulations vary, sometimes widely, by state. As a result, and until a contemporary policy analysis is performed on a nationwide basis resulting in model legislation specific to community paramedicine, a guide to the design or implementation of a community paramedicine program is likely to be in conflict with state laws.

Finally, our association asserts that community paramedicine, and the more complex issue of its integration with health care and public health, requires a more diverse and medically focused forum than can be achieved through the NFPA. While we recognize the need to address this rapidly emerging issue in EMS, developing effective guidelines to safely and effectively deliver such services requires a broad consensus between the medical and public health communities, fire and non-fire based EMS providers, EMS educators, and state EMS regulators.

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As the association representing state EMS regulators, we would welcome the opportunity to meet with the NFPA, along with other stakeholders, to identify an appropriate forum to discuss the future of paramedicine in the United States.

We urge the Standards Council to reject this request.

Sincerely,

A handwritten signature in black ink that reads "D. Randy Kuykendall". The signature is written in a cursive, flowing style.

D. Randy Kuykendall, MLS, NRP
President
National Association of State EMS Officials

Maynard, Mary

Subject: FW: Comments on Potential Guide for the Development of Community Paramedicine Programs
Attachments: WECAD Community Paramedic Handbook Version 1 4.pdf; CPDiscussionPaper.pdf; NAEMSP_PubHeEMS_FINAL_12 20 06.doc; 4th Roundtable MinutesDraft.doc; Bulletin# 1.Final.Version.doc; Final Version EMS & Public Health Summary Bulletin.Oct 02.doc; 3rd.bulletin.august.draft.doc

Importance: High

Comment No. 2

From: Wingrove, Gary L. [<mailto:Wingrove.Gary@mayo.edu>]

Sent: Friday, June 01, 2012 3:33 PM

To: Holland, Kendall

Cc: dia@nasemso.org; matt.womble@dhhs.nc.gov; alter@nasemso.org; DeTienne, James; Ronald Pirrallo; Ritu Sahni; Chris Montera; ar@caringanne.com; Swayze, Dan; skip.kirkwood@wakegov.com; Matt Zavadsky

Subject: Comments on Potential Guide for the Development of Community Paramedicine Programs

Importance: High

Ken, thank you for the opportunity to provide comments on whether NFPA should embark on a project to produce a guide for the development of community paramedicine programs. I also want to thank you for sharing phone time with me, Dia Gainor, Matt Womble, Rachel Alter and Jim DeTienne and allowing us the chance to tell you about the community paramedicine work of the North Central EMS Institute (NCEMSI), the International Roundtable on Community Paramedicine (IRCP) and the Joint Committee on Rural Emergency Care (JCREC – a joint project of the National Organization of State Offices of Rural Health and the National Association of State EMS Officials).

These comments are my own and should not be construed to be from any organization.

I believe it is premature for NFPA to conduct this work, perhaps by 5 years or more, and respectfully request the project not be funded or completed at this time.

You asked that I summarize the work that has been done over the last several years in my comments.

The IRCP was informally established in 2005. It's regular delegate participants are the countries of the US, Canada, Australia, New Zealand and the United Arab Emirates. The UK recently committed future participation and is seeking to host our 2013 meeting. IRCP conducts monthly conference calls, generally starting in January and running until the month its annual meeting is conducted. IRCP has functioned effectively as an unincorporated entity and remains unincorporated today. I have served as the chair of IRCP since shortly after it was established.

We discovered early in the development of IRCP that while the organization functioned well unorganized, there were needs of the EMS community that would need some structure to complete. In 2007 the NCEMSI formed an organization called the Community Healthcare and Emergency Collaborative (CHEC), which is comprised of a number of colleges, state offices of rural health and organizations based in the United States, Canada and Australia, for the purpose of creating a standardized curriculum. The third version of the curriculum was released in May, and is available free of charge to any accredited college or university. The pilot course using the first curriculum was conducted in Minnesota. The pilot course using the second version of the curriculum was conducted in Colorado. The Colorado program received a grant that allowed for a technical writer to watch their program development and implementation and publish the results. That report is attached, and it is available to the public free of charge at www.communityparamedic.org. Since its release in October 2011 it has been downloaded an average of 7 times per day, from people reporting their location in about 25 countries.

In the meantime, the JCREC has created a paper that raises some issues of policy that need to be resolved. Their report is attached. The NCEMSI (with the JCREC as a partner) has applied for conference funding from the Agency for Healthcare Research and Quality (AHRQ - a USHHS entity) to fund a national consensus meeting to address the issues raised in the report. While a grant award has not yet been made, we have had communication from AHRQ staff that the proposal scored well enough to qualify and we believe an award is pending. This grant will make it possible for us to bring expert panels together in late 2012 to start addressing the issues and to identify research needs.

There are lots of catalogued information available on these websites:

www.ircp.info

www.communityparamedic.org

<http://cpif.communityparamedic.org>

There has also been some considerable work already done by the National Highway Traffic Safety Administration (NHTSA), the Health Resources and Services Administration (HRSA), the American Public Health Association, the National Association of EMS Physicians (NAEMSP), and the National Association of County and City Health Officials (NACCHO). Some of the documents they produced are also attached to this message.

Lastly, there is a fair amount of published reports that relate directly to the subject matter, a bibliography is at the end of this message.

While community paramedicine has gained recognition recently, it is still in its infancy. There are only a handful of programs in the United States and there are mixed results from them, mainly in the area of sustainability. Peer reviewed research is sorely lacking. There are no two identical programs anywhere in the world that we can identify. In terms of completing the EMS to public health process, the Community Paramedic Program Manual available at www.communityparamedic.org describes the partnership process used by EMS and the local public health agency well, as does the earlier work of the AHPA-NAEMSP partnership and many of the articles listed below, and these are the current best practices. There are also a number of articles that have been published by the Journal of Emergency Medical Services, EMS World magazine, and Prehospital and Emergency Care.

Because there are no two identical programs yet, because there is substantial work already done describing EMS-public health partnerships, because there are only a handful of existing programs, because there are major unresolved issues identified in the JCREC paper, because of the handful of programs that have been established some have experienced failures, and because we don't yet understand the critical success factors, I believe it is too soon for this project to occur. It may be valuable at some future point. Also, while not in the project description for this paper, it is way too soon to consider developing standards for community paramedicine programs. We have to understand a lot more about outcomes so we know what works and doesn't, before that sort of project could be completed.

If NFPA decides to take on the project regardless of this recommendation, I would respectfully request that you consider assuring that one or more of the following people be assigned to the project team, as they are the most knowledgeable of the current state of community paramedicine and have actually created programs that are working (they are a cc to this message).

Chris Montera, Chief, Western Eagle County Health Services District
Anne Robinson, former public health nurse, Eagle County, Colorado
Dan Swayze, University of Pittsburgh, EMedHealth program
Skip Kirkwood, Chief, Wake County Emergency Services
Matt Zavadsky, MedStar EMS

Thank you again for allowing me to submit these comments.

Here is an incomplete bibliography on community paramedicine, EMS-public health partnerships, and program results.

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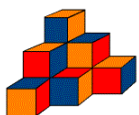
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Western Eagle County Health Services District



Fall 2011
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Community Paramedic™ Program Handbook

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BACKGROUND

Eagle County, Colorado is a rural resort community of approximately 54,000 residents located in the Rocky Mountains, over two hours west of Denver. Thirty percent of residents are uninsured, as are 54 percent of ambulance patients. Social supports are limited, especially for the elderly or those with mental health issues. And, the county is subject to extreme weather conditions, which can geographically isolate residents on any given day. These dynamics create service gaps, many of which are filled by a call to Dispatch to request an ambulance, which has become the service provider of last resort.

The Western Eagle County Health Services District (WECAD), similar to other rural EMS systems, experiences calls that aren't true emergencies, but rather of a social service or home health nature. The District also receives emergency calls of health issues gone awry because medication wasn't taken or an individual waited too long to seek medical attention. Some emergency calls are in response to patients just released from the hospital that were either prone to complications or didn't understand their discharge instructions. These patients are likely re-admitted.

WECAD's daily experiences with these types of cases prompted it to explore ways that paramedics could be more proactive in helping vulnerable residents maintain their health in order to prevent an ambulance transport. In 2009, WECAD joined with the Eagle County Public Health Agency, local physicians, and the International Roundtable on Community Paramedicine to plan and implement Colorado's first Community Paramedic (CP) program. This handbook is designed to help other organizations start such an endeavor.



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The WECAD Model

The goals of WECAD's Community Paramedic Program are twofold: to improve health outcomes among medically vulnerable populations; and to save healthcare dollars by preventing unnecessary ambulance transports, emergency department visits, and hospital readmissions. WECAD's Community Paramedic model has two components: 1) primary care services, ordered by a physician and conducted in a patient's home, and 2) community-based prevention services planned and provided in concert with the local public health department.

Primary Care Services

As a way to increase availability and continuity of health care for vulnerable populations, specially-trained paramedics provide specific primary care services in the patient's home, working through a physician's order. The services are within the paramedic's legal scope of practice, and the paramedics have been trained and evaluated on their ability to provide such care. This type of care is not of

In-home care that is delivered by a Community Paramedic is not of an ongoing nature, but rather each visit requires a discreet order from the patient's physician.

an ongoing nature, such as that of a home health agency, but rather each visit necessitates a discreet order with instructions for that one visit. If the provider believes the patient requires additional follow up by the Community Paramedic, they must issue another order.

While in the home, the Community Paramedic takes a patient history, assesses the chief complaint, and then confers with the treating provider on next steps. The paramedic may also conduct a home safety check and assess the need for referral to a social service agency or other community resource. A patient care report is developed and faxed to the ordering provider to be placed in the patient's chart. This in-home type of care is perfect for many vulnerable populations including:

- ✓ The chronically ill who have a hard time getting to their medical provider's office and frequently cancel appointments.
- ✓ Patients recently hospitalized that would benefit from a few in-home monitoring sessions to prevent complications.
- ✓ Patients in need of social supports who frequently call 9-1-1.

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Community-Based Prevention Services

Community Paramedics also assist the local public health department with community-based services such as immunizations, disease investigations, blood draws at health fairs, mass vaccination clinics, and fluoride varnish applications to children. This assistance helps to increase the capacity of the department. In this two-way partnership, public health personnel also play a role in linking uninsured patients to a primary care provider, thus assisting with the physician order process described above.

The Global View

Community paramedicine is a relatively new field with local programs emerging as a response to the health care crisis. The CP model increases access to basic health care services through the use of specially trained Emergency Medical Service (EMS) personnel in an expanded role. These so-called Community Paramedics provide care in a non-urgent setting, consistent with the Medical Home Model (defined as patient-centered medical care led by a physician coordinating all aspects of preventive, acute and chronic care, using the best available evidence and technology), and under the supervision of an ordering physician or advance practice provider.

Community Paramedics expand the reach of primary care services by using a paramedic to perform procedures already in their skill set, such as: assessment (vital signs, blood pressure, labs: glucose levels, medication compliance), treatment (wound care, medication reconciliation), prevention (immunizations, fall assessment), and referral (medical and social services). Specific roles and services are determined by each community's unique health needs, within the paramedic's legal scope of practice, and consistent with medical direction. International programs have had success in reducing emergency transports and hospital readmissions by using the paramedic in this expanded role.

History

The term "community paramedicine" was first described in the U.S. in 2001, as a means of improving rural EMS and community healthcare; however, it is not a new concept in practice.¹ Increasingly EMS personnel are caring for patients with non-emergent medical problems in their day-to-day role as emergency responder. For example, studies place the number of low-acuity transports (e.g., sprains or

¹ Joint Committee on Rural Emergency Care (JCREC): National Association of State Emergency Medical Services Officials & National Organization of State Offices of Rural Health, "State Perspectives Discussion Paper on Development of Community Paramedic Programs," (2010).

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flu-like systems) at 10–40%.² Thus, it is not surprising that the field is moving toward a more community-based approach. National organizations have written about this progression for years. In 1996, a National Highway Traffic Safety Administration report described an EMS of the future with the ability not only to provide acute care, but also identify health risks, provide follow-up care, treat chronic conditions and monitor community health (Delbridge).³

The 2004 article, “Rural and Frontier EMS Agenda of the Future,” provided a vision of EMS personnel providing not only a rapid response, but also filling roles in prevention, evaluation, triage, and referral (McGinnis, National Health Association Press).⁴ In 2010, the Joint Committee on Rural Emergency Care (JCREC), which is comprised of members from the National Association of State Emergency Medical Services Officials (NASEMSO) and the National Organization of State Offices of Rural Health (NOSORH), issued a discussion paper which called the community paramedicine model “One of the most progressive and historically-based evolutions available to community-based healthcare,” further praising its potential to decrease emergency department utilization, save healthcare dollars and improve patient outcomes.⁵

Value

According to the American Academy of Family Physicians (AAFP) a health system that focuses on primary care is more effective, more efficient, and more equitable among patient populations. These benefits are demonstrated by reduced mortality rates, less frequent use of ERs and hospitals, better preventive care, higher patient satisfaction, and a reduction in health disparities.⁶ In communities all across America, provider shortages are reducing access to this basic level of care (Figure 1). In fact, the AAFP reports that the number of medical school students entering primary care has dropped 51.8 percent since 1997. According to a 2010 University of Michigan Health System study, the country may not be ready to shift to a Medical Home model because there aren't enough primary-care doctors to handle the workload.⁷ Demand for primary care physicians is only going to increase with the 2010

² Krumpnerman, K. “History of Community Paramedicine,” *Journal of Emergency Medical Services*; June 22, 2010.

³ Joint Committee on Rural Emergency Care (JCREC): National Association of State Emergency Medical Services Officials, National Organization of State Offices of Rural Health State Perspectives, “Discussion Paper on Development of Community Paramedic Programs.” (2010)

⁴ Ibid.

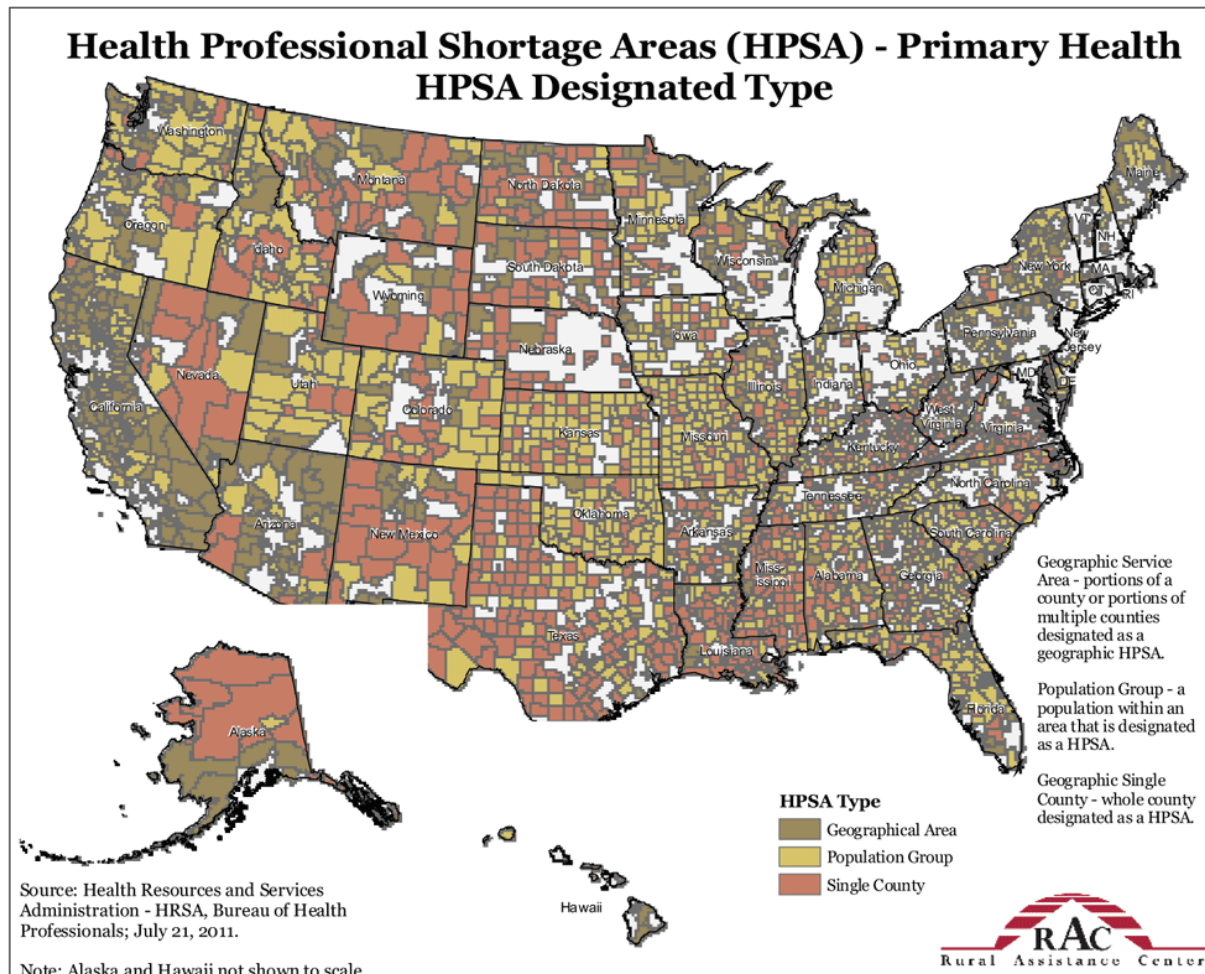
⁵ Ibid.

⁶ American Academy of Family Physicians, “Responses To Medical Students' Frequently Asked Questions About Family Medicine.” *American Family Physician*; July 1, 2007.

⁷ American Public Health Association, “Specialty Care and the Patient-Centered Medical Home,” *Medical Care: Official Journal of the Medical Section*; January 2011, Vol. 49, Issue 1.

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Figure 1. passage of health care reform that will vastly extend insurance coverage.



Additionally, one quarter of the U.S. population lives in rural and remote regions, and only 10 percent of the country's physicians practice in these areas. Compounding the problem are widespread hospital and clinic closures, an aging population, increasing cultural diversity, and the fact that rural residents are often economically disadvantaged and less healthy than their metropolitan counterparts. Many in the medical field are calling for the use of mid-level providers as a strategy to extend the reach of the physician. It makes sense to tap into EMS personnel that already live and work in these communities, in order to augment services and extend health care access.⁸

⁸ Wingrove, G., Laine, S. "Community Paramedic: A New Expanded EMS Model," Domain 3, National Association of EMS Educators, official publication. Fall 2008, 32-37.

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Programs

Today, various forms of community paramedicine programs are operating both nationally and internationally. According to the Joint Committee on Rural Emergency Care, the expanded role of EMS personnel has already occurred on a wide scale in countries such as England, Australia and Canada. In the United States, paramedics with community-based functions are being used locally in states like Colorado, Minnesota, Texas, Nebraska, California, Pennsylvania and North Carolina. However, program services and operations vary. Community Paramedic programs are born out of necessity and as such, are based on specific community needs. The Joint Committee aptly states, "If you have seen one community paramedic program, you've seen one community paramedic program."



For example, the state of Nebraska has used a "top-down" approach to develop a community paramedicine system. The effort was led by the state's EMS Office and Office of Rural Health, which jointly advocated for state legislation as a means to provide standards for the development of local programs. Minnesota used a "middle-out" approach by developing a training program thorough a collaboration of partners, which was then offered to any interested paramedic within the state. Colorado used a "bottom-up" approach that began at the grass-roots level through a partnership between a local ambulance service and public health department, and in cooperation with the state EMS Office. The intent was to pilot this local program with the goal of replication. These programs, along with additional background on the community paramedicine field, are described in the Joint Committee on Rural Emergency Care article, "State Perspectives: Discussion Paper on Development of Community Paramedic Programs" (2010), which is available online at:

<http://www.nasemso.org/Projects/RuralEMS/documents/CPDiscussionPaper.pdf>

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Work is being conducted on a national level too. The Community Health Care Emergency Cooperative, which is representative of local programs and national organizations, has developed a standard curriculum for college credit that includes a 12-week classroom and Internet course, hands on lab sessions, and clinical rotations with oversight by medical providers. The aim of curriculum is to be portable so local programs can use their own academic institutions and community medical providers. Information can be found online at: www.communityparamedic.org/Colleges.aspx. Another good resource is the International Roundtable on Community Paramedicine, which provides an up-to-date, informational website and holds annual conferences on advances in the field: www.ircp.org.

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Program Development

This handbook is based on the Colorado model, which is a grass-roots approach, led by an ambulance service, in partnership with the local public health department, and with guidance from the state EMS regulatory agency. The following is an overview of recommended steps for this “bottom-up” approach. Steps can be modified to fit local needs and aren’t necessarily linear in their time frame, in fact some may need to occur simultaneously.

🌀 Plan to Plan

The first step in developing a Community Paramedic program is to learn all you can about this up-and-coming field, the various programs in operation today, and the scope of training required for this new type of paramedic. Doing your homework upfront will allow you to begin formulating the vision and scope of your program, so that you may effectively propose the idea to stakeholders. This handbook will provide you with most of the background you will need to begin. Appendix A provides a list of resources for additional guidance during your information gathering process. Developing a Community Paramedic program requires the ongoing management of multiple logistics requiring significant legwork. To help plan and track all of the tasks, develop a work plan and fill it in to the best of your ability now, and update it as you go. A sample work plan has been attached as Appendix B.

🌀 Assess Program Feasibility and Engage Key Partners

You should determine early in the process whether such a program is even feasible in your area, given state EMS laws and the level of commitment needed internally, from local medical providers, and from a community college or university. The following section provides a list of initial contacts and commitments you will need.

Program Feasibility Checklist:

- ✓ Are there any state regulatory barriers that need to be dealt with first?
- ✓ Does internal buy-in exist among EMS Personnel, Medical Director and Board?
- ✓ Are local physician practices willing to participate? Train paramedics?
- ✓ Is a local college or university available to teach the Community Paramedic course?

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State Regulatory Agency

Once you have formed your initial program vision, begin by talking with your state EMS regulatory agency to see if there are any issues that either precludes a CP program from operating in your state or that need to be dealt with first, such as licensing. Because formal Community Paramedic programs are new, the agency may not be sure where the program fits regulations-wise. Your education and input may be needed to help resolve the issue.

Ambulance Service

Next, propose the idea internally. You will need commitments from everyone within the organization including the agency director, EMS personnel, board members and medical director. The paramedics will be required to participate in a fairly rigorous training program, both up front and in an ongoing manner. Make sure personnel are willing to take on this additional role. Obtain assurances from the board of directors that: 1) they will support the organization in focusing on program development, which could take 1-2 years to operationalize; and 2) they understand that internal resources, including funding, may need to be shifted toward program support. Finally, gain a commitment from the medical director that they will provide the medical oversight, including the development of quality assurance mechanisms, advising the clinical training process, and evaluating the competency of the Community Paramedic's skills.

Medical Providers

Next, approach medical providers to make sure there is enough physician buy-in to make the program worth developing. The participation of primary care physicians is key to the success of the grass roots model since they have a major role in training the Community Paramedics during clinical rotations, and providing the orders to use them. Physician commitment will be one of the greatest determinants of program feasibility. If your program wishes to also make clinical assistance available to the local public health department or assist them with prevention activities, they should also be engaged at this step. Note that not all public health departments offer client-level medical services, but they are a good partner nonetheless, and may be able to help you recruit physicians for the program. Eventually, you will want to formalize relationships with these entities through a legal agreement such as a memorandum of understanding (MOU). (See Appendix C for an example.)

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College or University

In order to utilize the Community Health Care Emergency Cooperative's Community Paramedic Curriculum, training must occur thorough a community college or university willing to teach the curriculum, coordinate the clinical rotations, and provide academic credit (*available in 2012*). You should gain commitment from an academic institution early in the process, to make sure that training is available for the program. The director of the EMS division at the institution will be the best contact and should also be the person to request the curriculum from the Cooperative.

The college or university will need to employ and pay for the faculty member that will be teaching the course. Ideally, the course instructor will have an understanding of the EMS system, the roles of the various levels of providers (EMT, paramedic, public health nurse, social worker, etc.) plus, experience working within the health care system, and familiarity with community resources. Because the course is set up to have online sessions, the institution should also have a system that can accommodate this, like an online "Blackboard." Note that a legal agreement (e.g., MOU) with the institution is critical to have in place before training begins.

Determine How to Provide Medical Direction

The program's Medical Director will have specific duties related to the Community Paramedic program. For example, they will evaluate the Community Paramedics after completion of training, annually, and as needed. A sample evaluation tool is provided within the Community Paramedic Curriculum. They will also perform chart reviews and provide feedback to the paramedics. This process should be rigorous at first, by potentially looking at all clients during the program's pilot phase (for example, the first 50 patients), and then determining the criteria for regular reviews after that. During chart reviews, the medical director can evaluate whether the CPs are assessing the patients appropriately, documenting appropriately, communicating adequately with the ordering physician, making referrals, following policies and procedures, and meeting general patient and provider needs. Client satisfaction surveys are one tool that can help the Medical Director assess patient care on many levels. A sample tool is provided as Appendix D. Patient case studies performed with the paramedics for a high-risk type of visit will help to build judgment and continue the learning process. The medical director may also be part of call down list if the ordering physician is not available when the home visit is conducted.

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In WECAD's program, a local primary care physician has agreed to share the medical oversight with the organization's medical director. Additionally, ordering physicians that are participating in the program are teaching and evaluate skill competencies during clinical rotations (All of these roles are clarified through a Memorandum of Understanding with each physician practice).

📍 Assess Community Health Needs

The Community Paramedic program will be better able to make the case for its existence, obtain resources, and have more of an impact on community health overall, if services are based on a needs assessment. A community needs assessment can determine:

- The leading causes of preventable morbidity and mortality
- Gaps in health care services
- Demographics of the populations most impacted by the gaps
- Characteristic of those who most frequently use the ambulance service
- Most frequent conditions requiring hospital readmission
- The greatest health care needs as seen by local medical providers

Your local public health agency has experience conducting health assessments and could be a good resource for this activity. The department regularly tracks community health outcomes such as death, injury, and disease rates, which could be used for program planning and evaluation. For example, areas with a high rate of senior falls may wish to add a safety check to Community Paramedic home visits. Patient databases at the hospital and ambulance services are two sources of queryable data. The ambulance service database can provide the medical description and demographics of patients that place frequent 9-1-1 calls. The hospital database may be able to provide a list of the conditions most frequently requiring hospital readmission that could be targeted for a CP visit. Finally, one-on-one medical provider interviews can provide qualitative information about how a CP program can best help them fill health care gaps and serve their most vulnerable patients

📍 Determine the Scope of the Program

During this phase, you will want to determine the types of services to be offered, personnel needs and program budget, based on the results of the community needs assessment, services provided in the Community Paramedic Curriculum, and the level of funding your agency either has or will be able to raise toward this program.

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Services

The first step is to determine whether your Community Paramedics will provide in-home patients visits and/or community-based services, as both require a different type of clinical training. Be sure that the services you are envisioning are within the legal scope of practice for your paramedics, based on state regulations. Eventually, the program's medical director will need to approve these. Common services include: assessment (vital signs, blood pressure, labs such as glucose levels, medication compliance), treatment (wound care, medication administration), prevention (immunizations, in-home fall prevention) and referral (medical and social services).

Personnel Needs

Each program will need to determine the number of Community Paramedics and their schedule, based on the needs assessment, frequency of ambulance calls, and population size. Community Paramedics can be scheduled based on a couple of different scenarios: 1) If the agency has enough EMS personnel, the Community Paramedic could be assigned discreet and prescheduled times to see clients when they are not designated as an emergency responder; 2) If the Community Paramedic has a dual role of emergency response, consider scheduling them on the second response team at pre-determined times to allow more prescheduled opportunities to see clients.



In terms of other types of personnel, the program will require programmatic and medical oversight, program coordination, scheduling, fundraising, and evaluating. Agency personnel or contractors may be used to fill these functions, and a single position may fill more than one function; for example, the program coordinator may also schedule patients. The following are examples of positions used within the WECAD program:

- Medical Director
- Program Director
- Community Paramedic

- Program Coordinator
- Scheduler
- Evaluator
- Grant Writer

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- Quality Assurance Coordinator

Budget and Fundraising Needs

Based on the services you plan to offer and the staffing patterns necessary to support them, develop a program budget and fundraising plan. Determining whether new personnel need to be hired will depend on the scope of the program and population of the service area. In some cases, it may be possible to shift in-house personnel. For intermittent functions like grant writing, a contractor may make the most sense dollar-wise. For the operational budget, the need for new items such as a daily means of transportation (non-ambulance vehicle) and primary care equipment will need to be determined. Tuition costs and training supplies will also need to be quantified for the Community Paramedic course provided by the local community college or university, if the agency will be the entity to pay for such training. Examples of potential line item budget expenses are provided as Figure 2.

After developing a budget, it may be necessary to create a fundraising plan with targets set by dollar amount and deadlines. A multi-year budget can inform fundraising targets for consecutive years. Sources of funding may include local, state and federal governments, foundation grants, and donations from community partners. In the future, it may be possible to bill Medicaid and Medicare.



CP Program Tip

In WECAD's experience, patients of the Community Paramedic program are uncomfortable with an ambulance pulling up to their house for a home visit, because it causes unnecessary concern to neighbors. WECAD obtained an SUV through a grant and then outfitted it with lighting, sirens, lettering and radio, for use by the CP Program.

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Figure 2: Sample Budget Items

■ PERSONNEL	■ Program Director
	■ Community Paramedic(s)
	■ Quality Assurance Coordinator
	■ Program Coordinator/Scheduler
■ CONSULTANT/CONTRACTUAL	■ Medical Oversight (<i>Licensed physician</i>)
	■ Evaluation
	■ Grant Writing
■ EQUIPMENT	■ Otoscope (<i>with camera to send to physician</i>)
	■ Stethoscope (<i>digital to send read-out to physician</i>)
	■ Temporal thermometer
	■ Pulse oximeter
	■ Digital camera (<i>to send pictures to physician, e.g. wounds, cellulitis, home safety risks</i>)
	■ Portable adult and baby scales
	■ EKG/defibrillators
■ LAB SUPPLIES	■ Dressing changes
	■ Blood draw
■ TRAVEL	■ Non-emergency vehicle (<i>lettering, lights, radio if new</i>)
	■ Motor vehicle insurance/gas
■ INSURANCE	■ Additional malpractice insurance (<i>Check with insurance company</i>)
■ UNIFORMS	■ Community Paramedic uniforms
■ TRAINING	■ Tuition, text books and supplies

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Engage the Community

A community engagement process is a good way to assess the level of community support, build advocates for the program, identify community resources, and determine potential barriers. Strategically anticipate how you will use different entities and who needs to know about the program early, in order to support it. Begin the process by developing key messages for specific audiences and determining how to target them.

CP Program Tip

Before approaching stakeholders, prepare the following materials:

- Local community health assessment
- Program vision
- Fact sheet (National Sample: Appendix E; WECAD Sample: Appendix F).

Prepare to make the argument that the Community Paramedic program is not meant to replace a primary care provider, public health nurse or home health agency, but rather is intended to be complimentary to the health care system in breaking down silos and filling gaps.

It is particularly important to build relationships with the public health department and social service agencies early in the process, as these types of organizations can assist with community needs assessment, client referrals, and are likely to become champions for the program. Whether your program provides community-based services or not, the local public health department can also play a supporting role by helping to conduct a community health assessment to determine the population's health status and gaps within the health care system. Since a Community Paramedic program can be a good strategy to fill gaps and promote public health values such as the Medical Home Model and reducing barriers to care, partnering can benefit both entities. The health department also probably has strong partnerships with key medical providers and help to get them on board. Additionally, the department likely has experts in the realm of program evaluation and can suggest different methodologies and assist with the CP Program's process.

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Social service agencies offer programs that may benefit the Community Paramedic client. Because the Community Paramedics get a first-hand look at the client's home environment, they are in the perfect position to assess the types of referrals that may benefit the client such as Medicaid enrollment, mental health treatment, case management, and assistance with food and home utilities. Social service agencies will be integral in educating Community Paramedics during the training phase, about the types of community resources available and how to make referrals.

Buy-in is also beneficial from other medical providers like home health agencies and physician practices that are not participating in the CP program, so that they understand the niche of a Community Paramedic and so-called turf issues can be avoided. Other types of organizations that should be engaged include local governments, foundations, civic groups, the state's Office of Rural Health and other organizations that may provide funding, advocacy or other types of support.

Another way to engage stakeholders is to develop a community advisory committee that meets regularly. This group can be the eyes and ears of the community, providing insight, feedback and direction. The committee may have representation from medical providers, health and human service agencies, gatekeepers to underserved communities, consumers, elected officials and other community leaders.

Develop Policies and Procedures

Because Community Paramedics are working in an expanded role and with new community partners, it will be important to develop policies and procedures that provide explicit boundaries around the program, clarifying what it is and what it is not. Community Paramedics should always follow the policies and procedures of their larger organization; however, P&Ps specific to the Community Paramedicine program will also need to be developed. In general, policies and procedures can:

- Outline the new role of the paramedic, stating that a paramedic is not to provide a service out of their scope of practice, and for which they have not been trained and evaluated.
- Define program services and operational policies such as response time.
- Outline the process for receiving requests to utilize Community Paramedics (Appendix G). (Providers should also be trained on the process.)

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- Require the use of a Release of Information Form to protect patient confidentiality before a Community Paramedic begins care (Appendix H).
- Define the conditions under which the Community Paramedic may practice (within a specific service area, serving only providers with an MOU agreement in place, and in which settings--home or public health clinic).
- Provide the steps for when physician contact is needed during a visit and the ordering physician is not available (Appendix I).
- Define service-specific procedures such as:
 - Home safety assessment (Appendix J)
 - Evaluation for social support (Appendix K)
 - Clinical services (wound care, medication compliance and reconciliation, etc.) (Appendix L)

The Community Paramedic Curriculum provides general guidelines to the paramedics about these types of policies during training. Individual organizations should develop their own policies, which can stand alone or be woven into procedures, job descriptions, legal agreements, etc.

Plan and Implement Training

There are three levels of training to prepare a paramedic to provide primary care through a physician's order: 1) a 12-week didactic college course, 2) hands-on lab sessions, and 3) clinical rotations. The curriculum used for the didactic course is available through the Community Health Care Emergency Cooperative (<http://communityparamedic.org/Colleges.aspx>) and must be taught through a college or university. The course consists of approximately six classroom presentations and 2-3 hours of weekly online sessions.

Training: Three Levels

College Course

Lab Sessions

Clinical Rotations

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In order to pass the course, the individual paramedic must perform 32 hours of lab sessions and 100-150 hours of clinical time, depending on the specialties chosen. The clinical time is organized into two levels of training: The first focuses on the general clinic setting; the second concentrates in specialty areas, depending on the community's needs and program's scope. The college or university will coordinate the matching of the students with clinical sites; however, the Community Paramedic program should have already done the legwork in identifying and engaging local providers, to assure the clinical rotations are successful. Whenever possible, it will help to make the program successful if medical practices that plan to use Community Paramedic services provide training during the clinical rotation phase, so a level of trust can be established between the paramedic and ordering physician.

Before the clinical rotations can be arranged, the scope of Community Paramedic services will need to be determined, including the skills and procedures to be taught by the providers. Services need to be within the legal scope of practice and should be approved by the ambulance service's medical director. Training and lab time should focus exclusively on the procedures that are going to be offered by the program. The Curriculum highlights primary care services already being performed by Community Paramedics. Local programs will need to make sure these fall within their state regulatory guidelines before including them in the scope of services.

Develop An Evaluation Plan

Developing an evaluation plan during the planning process will provide many benefits to the program. First, it will assure that client databases are in place and collecting the right data, beginning with the first patient. Also, program evaluation at its basic level, will be required in any grant application for future funding, and an evaluation plan will make grant writing easier.

The first part of the evaluation plan should include a method for tracking patients in a queryable manner. If the organization already has a client database, such as an electronic medical record, this could be used; otherwise a spreadsheet program such as Excel or Access would also work if client information were entered after each visit. The database should track variables such as client demographics (age, gender, ethnicity, language, insurance status), services requested on an order, patient diagnosis, referring physician, time and date of call, chief complaint, referrals to other services by a Community Paramedic, and outcomes (e.g., ambulance transport, physician follow-up, re-

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admission, no follow-up necessary). Collecting and analyzing this type of information will meet most types of grant requirements. This information can also inform programming in terms of staffing patterns, budget, training needs, gaps in service, and types of patients served. Descriptive statistics can then be used to illustrate the program such as:

- Percentage of uninsured, Medicaid and Medicare patients
- Percentage of Spanish-speaking patients
- Age range of patients
- Number of visits (total and average per patient)
- Leading types of chief complaints (tracked by number of events)
- Leading outcomes of visits (tracked by number of events)

Patient databases at the hospital or within the ambulance service can also illustrate program outcomes such as a change in the level of non-emergency transports and hospital readmission rates. The reduction in non-emergency transports can be targeted as a program goal by using the ambulance patient database to determine frequent callers to 9-1-1 for non-emergency transports, then coordinating with their physician to provide an intervention, which may include linking to social service agencies. Non-emergency transports can also be a baseline measure for the program, to determine CP program impact over time.

The hospital may have data that shows the most prevalent conditions likely to cause a readmission. The CP program, in cooperation with the discharging physician, can then target patients with these conditions. This can also be a baseline measure for the program to determine impact over time. If the program serves enough patients to impact county-level health outcomes, such as a reduction in injury or death rates, these indicators could be tracked and measured with the help of public health data sites.

Also, qualitative information can supplement the quantitative data by documenting case studies to illustrate outcomes and the value of the Community Paramedic program. In its most basic form, this is a narrative, which tells the story of particular CP cases. Case studies should meet certain criteria such as those where a negative outcome for the patient was either clearly or possibly avoided, due to the intervention of the Community Paramedic. Information can be elicited through an interview with the

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Community Paramedic and/or ordering physician, to document the case. Case studies can include patient demographics, presenting problem, the CP intervention and resulting outcomes. Names should not be used to protect patient confidentiality.

Begin Operations

Once legal agreements are in place with providers, and paramedics have been clinically trained and evaluated, the scheduler can begin accepting orders from the physician or requests from the public health department. An example of a Physician's Order Form is provided as Appendix M. Patients are served in one of two ways: 1) during a home visit through the medical provider's order; 2) in a community or clinic setting through a partnership with the local public health department.

Physician's Office

Physicians order home visits through the agency scheduler, who then arranges the appointment with the patient. The visit is set up as a medical provider consultation. The ordering provider will fax the scheduler a packet to include medication list, medical history, supporting documents, and other pertinent medical information. The Community Paramedic will respond to the order between 8:00 am and 5:00 pm within 24 – 48 hours of receipt, based on urgency. During the home visit, the Community Paramedic takes a patient history, assesses the chief complaint, and then confers with the treating provider on next steps. If the treating provider is unavailable for consultation, a call-down list triggered to assist the CP in getting the medical recommendations from either another physician within the practice or alternative physician according to policy (Appendix I.)

Once the visit has occurred, the Community Paramedic communicates to the physician through the patient care report, which then becomes a permanent part of the permanent medical record. Physicians may only order services, which are in within the program's scope of services (services within the paramedic's scope of practice, for which they have been trained and evaluated as able to perform satisfactorily). Visits are scheduled during regular business hours and initial visits are scheduled for one hour.

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Local Public Health Department

Community Paramedics may assist a local public health department with such services as immunizations, fluoride varnish application, blood draws for screenings, blood pressure checks and communicable disease investigations. The paramedic works with a registered nurse and the health department has oversight from the department's medical director, who should be a licensed physician. Community Paramedics may be of particular use for surge capacity during a disease outbreak when mass vaccination/prophylaxis and investigation is needed or when a clinic is short staffed. The Community Paramedic's agency and public health department should agree on a process for requesting the services of a Community Paramedic, to be coordinated through the scheduler.

Evaluate the Pilot Phase

The program should plan to have a 1-2 month pilot phase to test how all of the systems are working. At the end of the pilot phase, the systems should be evaluated and mid-course corrections made. An evaluation of the pilot period can assess the following:

- How the referral process is working for medical providers (interviews)
- Response time of the Community Paramedics (tracking forms or EMR)
- Client satisfaction (surveys or interviews) (Appendix D)
- Quality assurance (case/chart reviews)
- Program evaluation: Does patient database capture all the variables? (Database query)

Different aspects of this evaluation can be woven into an ongoing quality assurance plan and conducted on a regular basis.

APPENDICES

Appendix A

Community Paramedicine Resources

Additional information and connections to national organizations, literature and other resources are provided below.

- **International Roundtable on Community Paramedicine:** www.IRCP.org

- **Joint Committee on Rural Emergency Care:**
National Association of State EMS Officials & National Organization of State Offices of Rural Health
 - *Policy Brief on Integration of EMS into the Healthcare Delivery System*, November 2009: www.nosorh.org/policy/files/jcrec_policy_brief.pdf

 - *State Perspectives: Discussion Paper on Development of Community Paramedic Programs*, 2010:
www.nasemso.org/Projects/RuralEMS/documents/CPDiscussionPaper.pdf

- **Community Health Care Emergency Cooperative's Community Paramedic Curriculum:** www.communityparamedic.org/Colleges.aspx

- **WECAD Community Paramedic Program Development:**
 - Chris Montera, Chief, Western Eagle County Health Services District
E-mail: cmontera@wecadems.com,
Website: www.wecadems.com/cp.html

 - Caring Anne Consulting, Anne Robinson, RN, President
Public Health Nurse Consultant
E-mail: ar@caringanne.com
Website: www.caringanne.com

 - Silver Street Consulting, Jill Hunsaker Ryan, MPH, Principal
Public Health Consultant
E-mail: www.silverstreetconsulting.net
Website: silverstreetconsulting@gmail.com

Appendix B: Work Plan Template, Months 1-12																
			Activity Due Date: Place X by Month(s)													
Step	Activities	Person(s) Responsible	1	2	3	4	5	6	7	8	9	10	11	12	Done (X)	
Plan to Plan	Background materials															
	Work plan															
Determine Program Feasibility/Begin to Engage Key Partners	State EMS Office															
	Internal Leadership, Staff															
	Medical Community															
	College/University															
Determine Medical Direction/Quality Assurance	Develop a plan															
Assess Community Health Needs	Engage health department															
	Develop an assessment plan															
Determine Program Scope	Services															
	Personnel Needs															
	Budget															
	Need for Fundraising															
Engage Stakeholders	Identify															
	Engage															
	Form advisory committee															
Develop Policies/Procedures	Identify needed policies/procedures															
	Develop, incorporate into training															
Plan for Training	Commitments for clinical rotations from providers															
	Plan training with college/university															

Appendix B: Work Plan Template, Months 13-24															
			Activity Dates: Place X by Month(s)												Done (X)
Step	Activities	Person(s) Responsible	13	14	15	16	17	18	19	20	21	22	23	24	
Implement Training	Implement classroom training														
	Clinical rotations														
	Health Dept. trainings														
	Evaluate paramedics														
Develop an Evaluation Plan	Client database tracking														
	Outcomes and how to measure														
	Case study procedures														
Begin Operations	MOUs in place with providers														
	Scheduling procedures in place, providers trained														
	Begin accepting patients														
	Conduct chart reviews														
Evaluate the Pilot Phase	Referral process														
	Response time														
	Patient satisfaction														
	Quality assurance procedures														
	Patient database tracking														
	Make corrections to systems														

APPENDIX C: Sample Provider Agreement

**MEMORANDUM OF UNDERSTANDING
COMMUNITY PARAMEDIC PROGRAM**

This Community Paramedic Program Agreement ("Agreement") is entered this ____day of _____, 20__, between (COMMUNITY PARAMEDIC PROGRAM) and (MEDICAL PROVIDER), herein being referred to collectively as, the "Participants."

WHEREAS, the Participants share a mission to improve the health of residents in (NAME OF SERVICE AREA); and

WHEREAS, community paramedics are specially trained to conduct in-home patient assessments and provide specific primary health care and preventive services, by acting through a physician's order and within a defined scope of practice; and

WHEREAS, the community paramedic model helps physicians monitor the health of vulnerable patients, thereby producing better health outcomes and reducing the number of ambulance transports, visits to the emergency department, and hospital readmissions; and

WHEREAS, medical providers are key to the community paramedic program in terms of providing clinical training and issuing orders; and

WHEREAS, (MEDICAL PROVIDER) desires to participate in (PROGRAM'S) community paramedic program.

NOW, THEREFORE, in consideration of the terms and conditions of this MOU, the receipt and sufficiency of which is jointly acknowledged, the Participants agree as follows:

I. Scope of Work

- a. (MEDICAL PROVIDER) agrees to provide a clinical rotation for a mutually agreed upon number of community paramedics, in the areas of family practice and pediatrics, based on the attached clinical rotation guidelines (Attachment A). Activities will include training then evaluating the community paramedic's ability to correctly perform each procedure. (MEDICAL PROVIDER) may provide additional training hours if both parties agree that it would be mutually beneficial to the program.
- g. Participants agree to share patient records as is necessary to provide care, and will follow corresponding confidentiality policies. The patient record created by the community paramedic will be sent to the ordering physician at (MEDICAL PROVIDER).
- h. Participants agree to run data requests on certain measurable outcomes for use by both parties. Data will be presented in aggregate without patient identifiers. (CP PROGRAM) will share program evaluation results with (MEDICAL PROVIDER).
- i. (MEDICAL PROVIDER) providers shall formally request a home visit by the community paramedic through a physician order, based on services that are within the scope and expertise of the paramedic. A community paramedic will act on the order between 8:00 am and 5:00 pm within 24 – 48 hours of receipt, and based on urgency and availability, unless otherwise agreed upon by the issuing provider. (MEDICAL PROVIDER'S) physicians and medical providers shall provide medical oversight and have ultimate responsibility regarding their patients in the program.

Appendix C: Sample Provider Agreement, Continued

- f. (MEDICAL PROVIDER) shall provide a representative to the Community Paramedic Advisory Committee, which meets quarterly.
- g. (MEDICAL PROVIDER) shall participate in case reviews when appropriate, in order to improve the quality of the program and document specific outcomes for evaluation purposes.
- h. (CP PROGRAM) shall provide the medical oversight for the program through its Medical Directors, Colorado-licensed physicians.
- i. (MEDICAL PROVIDER'S) participating physicians shall sign Attachment B agreeing that they understand the program and the procedures available to be performed. Attachment B can be amended with additions or deletions of physician's signatures on an as needed basis without the need to change this agreement.
- j. (MEDICAL PROVIDER) shall provide proof of a certificate of liability insurance for Medical Malpractice listing all physicians participating in the program.

II. Insurance

Each party, shall, at no cost or expense to the other party, carry a policy or policies of professional liability insurance, comprehensive general insurance, and workers compensation insurance issued by an insurance carrier or self insurance mechanism authorized by the State of Colorado in such amounts as are reasonably acceptable to each other, provided that such amounts are not less than the liability limitations under the Colorado Governmental Immunity Act, Section 24-10-101, et seq., C.R.S. ("CGIA"). Said insurance policies shall cover officers, employees, agents and volunteers of the Participants. If the liability insurance required by this section is on a "claims made" basis and at any time prior to the expiration of any statute of limitation period which might apply to acts, errors or omissions of a party during the term of this Agreement, or a party shall cease to maintain liability insurance required by this section or should switch insurance carriers, that party shall purchase from an insurance carrier acceptable to the other, a "tail" policy covering acts, errors or omissions during the term of this Agreement as to which claims may then still be asserted. If a party fails to purchase such tail coverage within 30 days after the termination of this Agreement, the other party shall have the right to purchase such coverage and bill the other for the premium.

Upon request, each party shall provide the other with certificate(s) of such insurance coverage and statement(s) from the insurance carrier that the certificate holder will be notified at least 30 days prior to any cancellation, non-renewal or change in such coverage. Failure by either party to maintain proper insurance coverage shall, at the option of either party, be grounds to immediately terminate this Agreement.

III. Compensation

The Participants understand that no compensation will occur for community paramedic services or the training they receive, unless a modification is made to this contract.

IV. Term of Agreement

The term of this Agreement shall be through the end of the year in which it is entered, and this Agreement shall be automatically renewed for additional one (1) year terms in perpetuity.

V. Termination of Agreement

Either party may terminate this Agreement at any time and for any reason in writing with thirty (30) days notice.

VI. Amendment

This Agreement shall be binding on the Participants and represents the final and complete understanding of the Participants as regards the subject matter. This Agreement shall not be modified or amended unless in writing, executed by Participants.

VII. Waiver of Breach

No waiver by either party of any term, covenant, condition or agreement contained herein, shall be deemed as a waiver of any other term, covenant, condition or agreement, nor a waiver of breach thereof deemed to constitute a waiver of any subsequent breach, whether of the same or a different provision of this Agreement.

VIII. Counterparts

This Agreement may be executed in counterparts, each of which will be an original, but all of which together shall constitute one and the same instrument.

IX. Enforcement, Jurisdiction and Venue

This Agreement shall be governed and construed in accordance with the laws of the (STATE OF PROGRAM, and in addition to any other remedy, may be specifically enforced. Jurisdiction and venue for any suit, right or cause of action arising under, or in connection with this Agreement shall be exclusive in (LOCATION OF PROGRAM, STATE).

X. Responsibility for Acts of Employees and Promise to Indemnify

Each party will be solely responsible for its acts and omissions and the acts and omissions of its employees, agents, officers and volunteers in the performance of its obligations under this Agreement, and shall indemnify and hold the other party harmless from and against any and all demands, losses, liabilities, claims, or judgments, costs and expenses, including but not limited to reasonable attorney's fees, arising out of any act or omission of the party, its employees, agents, officers and volunteers in the performance of its obligations under this Agreement.

XI. Third Party Beneficiary

Nothing herein expressed or implied is intended or should be construed to confer or give to any person or entity other than (CP PROGRAM) or (MEDICAL PROVIDER) and their respective successors and assigns, any right, remedy or claim under or by reason hereof of by reason of any covenant or condition herein contained.

XII. Notices

Any formal notice, demand or request pursuant to this Agreement shall be in writing and shall be deemed properly served, given or made, if delivered in person or sent by certified mail postage prepaid to the Participants at the following addresses or as otherwise modified pursuant to this section:

If to (CP PROGRAM):
(ADDRESS)

with a copy to:
(LEGAL COUNSEL)

If to (MEDICAL PROVIDER):
(ADDRESS)

with a copy to:
(LEGAL COUNSEL)

XIII. Severability

In the event that any of the terms, covenants or conditions of this Agreement or their application shall be held invalid as to any person, entity or circumstance by any court having competent jurisdiction, the remainder of this Agreement and the application in effect of its terms, covenants or conditions to such persons, entities or circumstances shall not be effected thereby.

XIV. Section Headings

The section headings in this Agreement are inserted for convenience and are not intended to indicate completely or accurately the contents of the sections they introduce and shall have no bearing on the construction of the sections they introduce.

XV. Duly Authorized Signatories

By execution of this Agreement, the undersigned each individually represent that he or she is duly authorized to execute and deliver this Agreement and that the subject party shall be bound by the signatory's execution of this Agreement.

IN WITNESS WHEREOF the Participants have caused this Agreement to be executed as of the day and year written above.

(PROGRAM)

By: _____

Title: _____

ATTEST: _____

(MEDICAL PROVIDER)

By: _____

Title: _____

ATTEST: _____

Sample MOU: Attachment A Continued
Community Paramedic Clinical Procedures
Family Practice Clinical Rotation
40 Hours Clinical Time (L1)

PROCEDURES LEVEL 1	# Performed	Clinical Site
Blood Pressure checks	2	FP
Medical Equipment		FP
Otoscope	30	FP
Blue Tooth Stethoscope	5	FP
Home Medication		FP
Compliance	7	FP
Medication Reconciliation	7	FP
Pt Documentation		FP
SOAP Notes	5	FP
Chart Review	15	FP
History & Physical	20	FP
Assessment	20	FP
Results from Tests/Diagnostic tools	15	FP
Identifying Red Flags	5	FP
Identifying further testing needs	5	FP
Prenatal		FP
Doppler	5	FP
Measurements	5	FP
Urine for Protein	5	FP
Acute Illness Management		FP
0-1 years	5	FP
1-5 years	5	FP
6-13 years	5	FP
14-18 years	5	FP
18 + years	5	FP
65 + years	5	FP



WESTERN EAGLE COUNTY HEALTH SERVICES DISTRICT

785 Red Table Dr.
Gypsum, CO 81637

P: 970-524-1689

F: 970-524-1771

Client Satisfaction Survey

Western Eagle County Health Services District (WECAD) is committed to providing you with excellent service and care. We are a community organization that is tax supported by our residents and home owners. It is our goal to maintain the highest level of customer service, training, skills, and compassion to all of our patients and families. Please take a few moments and complete this short survey. Your responses will be assured confidentiality.

Reason for Service: **911 Call** ☐ **Community Paramedic Visit** ☐ **Transferred from Clinic to Hospital** ☐

Please rate the following areas on a scale of 1 – 5 (1 Strongly Dissatisfied to 5 Very Satisfied)
Circle only one answer per line.

	Strongly Dissatisfied	Dissatisfied	Neutral	Satisfied	Very Satisfied	
Courtesy of the 911 call operator	1	2	3	4	5	N/A
Usefulness of instruction provided by the 911 call operator prior to the arrival of Paramedics	1	2	3	4	5	N/A
Professionalism / appearance of Paramedics	1	2	3	4	5	N/A
Quality of care provided by Paramedics	1	2	3	4	5	N/A
Cleanliness of ambulance and equipment	1	2	3	4	5	N/A
Overall satisfaction with WECAD	1	2	3	4	5	N/A
Satisfaction with care you received at Emergency Room after we ended our care	1	2	3	4	5	N/A

If you do have a concern about our services provided, please contact our office and speak with Chief Christopher Montera or Deputy Chief Christopher Dick or we will call you back at the number you provide.

Name: _____ Phone: _____
Please provide name and phone number. (Optional and Confidential)

Additional Comments:

Thank you for your time and comments about our service.

Version 09/2011

Office Use Only:

DOS: _____

ID: _____

☐Ref ☐Trans

☐In ☐Out

☐VVMC ☐VWH

Community Focused Emergency Medical Services
www.wecadems.com



Opportunity Statement

- **Severe Primary Care Shortage** currently exists and is on the rise
- **Vulnerable populations with new health insurance plans will not have access to a provider** because of the increase in demand
- **Cost of healthcare continues to rise** with Emergency Rooms being the most available alternative
- **Access to care problems are exacerbated in rural areas** due to higher healthcare provider shortages, a larger elderly population than urban, and transportation barriers

Community Paramedic Solution

The Community Paramedic model is an innovative, proven solution to provide high quality primary care and preventative services by employing a currently available and often underutilized healthcare resource.

How Does it Work?

A primary care partner refers a patient to Emergency Medical Services (EMS) personnel to provide services in the home that are within their current scope of practice including: hospital discharge follow-up, fall prevention in the home, blood draws, medication reconciliation or wound care. The Community Paramedic provides care and communicates health records back to the referring physician to ensure quality of care and appropriate oversight. In addition works with Public Health to provide preventative services throughout the community.

Advantages

- Decreases workload and increases quality and efficiency of managing patients in a primary care and public health settings by utilizing EMS Personnel through non-traditional methods
- EMS personnel are integrated throughout the healthcare system, improving access and decreasing healthcare cost
- Community Paramedic certification provides a job opportunity where EMS volunteer work is often the only sustainable model in rural areas
- EMS personnel currently have the training, expertise and scope of practice to provide essential primary care services
- The program has a proven track record locally and internationally

Frequently Asked Questions

Q: Does a Community Paramedic replace current healthcare systems like home health care or primary care physicians?

A: No. Community Paramedic is an extension of the primary care provider to provide care to patients without access, and does not replace the specialized services available in a home health care model or physician office.

Q: Does a Community Paramedic have the right training to provide primary care?

A: Additional training is provided to Community Paramedics specific to providing preventive care in the home within their current scope. However, services provided do not fall out of the currently defined scope of practice for EMS personnel.

Q: Is the quality of care compromised by using a Community Paramedic vs. a primary care provider?

A: No. A Community Paramedic provides care under the supervision of a physician, so the quality of care is consistent with care provided in a clinic setting.



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Community Paramedic Fact Sheet

Problem Statement:

- Access to healthcare and particularly primary care services is a growing concern. Primary care providers are in short supply, and the uninsured population is on the rise.
- Uninsured patients are less likely to seek out preventive care services, and are more likely to go to the emergency room for non-urgent care, increasing the cost of healthcare.
- In rural areas, the problem is exacerbated because of a higher rate of uninsured, compared to urban settings, and shortage of healthcare providers.

Opportunity:

- To address the decrease in access to primary care services, it is necessary to evaluate current resources within communities and explore innovative solutions. The Community Paramedic model is a proven solution that provides essential primary care services for vulnerable populations.
- Paramedics have the training, expertise and scope of practice to provide primary care services such as assessments, blood draws, wound care, diagnostic cardiac monitoring, fall prevention, medication reconciliation, and post-operative follow up. They also have the experience of taking health care into the home.
- Internationally, Community Paramedic programs have demonstrated increased health outcomes and cost savings. Many countries are providing Emergency Medical Service (EMS) personnel with additional training to expand into community-based services.
- EMS personnel are already integrated throughout the healthcare system, allowing them to easily provide primary care services within their scope of practice.

What the Community Paramedic model offers:

- Enhanced utilization of a healthcare resource under the current scope of practice.
- Increased efficiency in terms of managing patients in a primary care setting.
- Coordinated and integrated care with physician's offices, hospitals, home health agencies, long term care facilities, and public health departments.

The Community Paramedic model will NOT:

- Replace current healthcare systems or positions.
- Change the current defined scope of practice of the EMS Personnel.
- Remove patient populations from healthcare providers.
- Decrease the level of care provided.

-Over-

WECAD Community Paramedic Fact Sheet Continued

Health Care Statistics

Primary care shortage

- In July 2011, 52 of Colorado's 64 counties (81%) were either fully or partially designated as a Health Professional Shortage Area.¹

Uninsured/Underinsured rates

- In 2010, 14.7% (342,122) of Colorado residents reportedly did not see a doctor in the previous 12 months, due to costs.²
- During 2009/2010, 22% of Eagle County residents were reportedly uninsured, compared to Colorado at 15.4%.³
- In 2005, 68% of Eagle County's Latino households were reportedly uninsured.⁴

Access to care statistics

- Colorado's overall population is projected to grow by 20% between 2010 and 2020, while the population ages 65+ is projected to grow at nearly twice that rate (37%) during the same time period.⁵
- In 2005, 38% of Eagle County households reportedly had trouble accessing health care.⁴
- In 2005, 43% of Eagle County residents reportedly were unable to access dental care.⁴

Readmission rates

- 50.2% of patients who were readmitted to the hospital had no follow-up care with primary care physician from time of discharge to time of readmission.⁶
- In 2009, the cost to Medicare of unplanned re-hospitalizations was \$22.9 billion nationally.⁷

Cost of healthcare in ER

- ER costs per-visit are generally 3 times higher than comparable care in an outpatient clinic.⁶
- According to Johns Hopkins University, between 1997 and 2007, 13 percent of trauma patients returned to the emergency room within a month of discharge for routine follow-up care such as dressing changes.⁸
- In Colorado in 2008, 80% of ER visits were not true emergencies.⁶

Preventive services

- In 2005, 56% of Eagle County households were reportedly affected by chronic health issues.⁴
- In 2009/2010 32% of Eagle County residents were reportedly overweight & 10.5% were obese.³
- According to the Centers for Disease Control, vaccination is the number one method of preventing disease, disability, and premature death.

1. Colorado Department of Public Health and Environment, Primary Care Health Professional Shortage Area Map. Website: www.cdphe.state.co.us/pp/primarycare/shortage/pchpsa.pdf

2. Henry J. Kaiser Family Foundation: www.statehealthfacts.org/profileind.jsp?ind=747&cat=8&rgn=7

3. Colorado Health Information Dataset (CoHID), Behavioral Risk Factor Surveillance System, Colorado Department of Public Health and Environment. Website: <http://www.cdphe.state.co.us/cohid/brfss.html>

4. Healthy Eagle County 2010, A Blue Print for Improving our Community's Health (2005). Website: http://www.eaglecounty.us/HHS/Reports_and_Resources/

5. Colorado Department of Local Affairs, 2010 Census Data for Colorado by Age. Website: <http://dola.colorado.gov/dla/demog/2010censusdata.html>; U.S Census Bureau, Population Projections (by age through 2020). Website: www.census.gov/population/www/projections/projectionsagesex.htm

6. Cari Fouts, Program Director, Colorado Rural Health Center, Presentation at the Western Eagle County Ambulance District Community Paramedic Town Hall Meeting, July 29, 2009.

7. Jake Swanton, Office of Senator Mark Udall, Presentation at the International Roundtable of Community Paramedics Conference, Vail, CO, August 9, 2010.



WESTERN EAGLE COUNTY HEALTH SERVICES DISTRICT

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Community Paramedic Patient Referral Guide

1. Provider talks with patient about follow-up with a community paramedic from WECAD.
2. Provider requests patient sign the **consent/authorization to release health information form**.
3. Provider completes the **community paramedic patient referral form** and **lab form** if indicated.
(Use existing laboratory request form, as this is the form the lab will receive with the specimen.)
4. Provider faxes the following to the CP Patient Scheduler: Release of information form, current history and physical, medication history, hospital discharge orders, immunization records or any other medical record applicable to the community paramedic visit. *(Please include the patient's medical record number.)*
5. Scheduler will verify with physician that all information has been received.
6. The community paramedics will make every effort to see the referred patient **within 48 hours of the referral unless the patient is in urgent need of medical follow-up**.
7. Scheduler will call the patient to arrange appointment time/date.
8. Scheduler will coordinate with the community paramedics to arrange patient visit.
9. Scheduler will call or fax the appointment dates to the provider offices once a week.
10. Community Paramedic will complete patient visit at appointment time arranged.
11. Community Paramedic will complete patient care report.
12. Scheduler will fax patient care report back to provider office within 24 hours of visit.



WESTERN EAGLE COUNTY

HEALTH SERVICES DISTRICT

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F: 970-524-1771

Release of Information Form

PATIENT INFORMATION		PLEASE RETURN BY FAX TO 970-524-1771	
Patient's Last Name	First	Middle	DOB
INFORMATION			
<input type="checkbox"/> Consult	<input type="checkbox"/> Labs	<input type="checkbox"/> Immunization Record	
<input type="checkbox"/> Discharge Summary	<input type="checkbox"/> Physician Progress Notes	<input type="checkbox"/> Other as specified below:	
<input type="checkbox"/> Emergency Department Report	<input type="checkbox"/> MRI Report	_____	
<input type="checkbox"/> EKG Tracings	<input type="checkbox"/> Operative Report	_____	
<input type="checkbox"/> Graphic Record	<input type="checkbox"/> X-Ray Report	_____	
<input type="checkbox"/> History and Physical	<input type="checkbox"/> X-Ray MRI	_____	
Date of Order:	Purpose of Release:		
This consent/authorization is to release health information from and to:			
Name		Phone Number	
Address		City	State Zip Code
This consent/authorization will remain in effect			
<input type="checkbox"/> From the date it is signed out until: _____			
<input type="checkbox"/> Until the following event occurs: _____			
Note: IF neither of the above options is selected, this consent/authorization will remain in effect for 180 days from the date this it is signed.			
I authorize my health information described above to be released to Western Eagle County Community Paramedic Program to send all copies of my health record back to the above named entity for the purpose of continuity of care and understand that:			
1. Information disclosed pursuant to this Consent/Authorization may include information relating to sexually transmitted disease, AIDS/HIV, and physiological or psychiatric conditions, unless restricted as follows:			
2. Once information is disclosed pursuant to this signed Consent/Authorization, I understand that the federal privacy law (45 C.F.R parts 160 and 164) protecting health information may not apply to the recipient of the information and, therefore, may not prohibit the recipient from disclosing it.			
3. I may revoke this Consent/Authorization at any time, except to the extent that action has been taken in reliance on it. To revoke it, I must provide the Privacy Officer-at the address listed at the top left of this form-with a written revocation which will not be effective until received and approved by the Privacy Officer.			
4. I may refuse to sign this Consent/Authorization and this refusal will not affect the Treatment Western Eagle County Community Paramedic Program provides to the patient, unless the patient is seeking health care services solely for the purpose of creating health information for disclosure to a third party.			
Signature of Patient/Parent of Legal Representative		Date	
If signed by Legal Representative, Legal Representative's authority to act on behalf of patient:			
Relationship to patient:			
For Office Use ONLY			
<u>DATE INFORMATION RELEASED</u>		<u>MEDICAL RECORD NUMBER</u>	



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Physician Contact While at Visit

Last Revised: (Date)

Purpose: This policy is in place in the event a Community Paramedic is at a visit with a patient and a physician needs to be contacted immediately, but the ordering physician is not available.

Procedure: Always begin by calling the ordering physician first. If they are unavailable, proceed through the call down list in the order provided below.

1. Call the ordering physician's on-call service
2. Call the ambulance service's medical control at the hospital
3. Call the ambulance service's medical director on their mobile phone



WESTERN EAGLE COUNTY HEALTH SERVICES DISTRICT

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Home Safety Assessment

Last Revised: (Date)

Purpose: The home safety assessment is designed to provide a detailed walkthrough of the client's home, identify safety hazards and make recommendations when needed.

Procedure: The paramedic will look at many factors that have been shown to cause injuries to members of the home, especially the very young and elderly. With a specially designed checklist, (Attachment A) the assessment begins at the driveway or walkway and ends at the back yard. Note, this assessment is not a mechanical inspection of the home and is not designed to look at the safety of electrical wiring, hot water heaters, plumbing or any other mechanical features of the house. Rather, it is designed to focus on things such as trip hazards, kitchen safety, adequate lighting in the home and in walk areas, grab bars and lift handles if applicable, and other notable safety features.

A Community Paramedic does not perform the role of a physical therapist and will therefore not be analyzing the persons gait or movement, nor advising about exercises or physical therapy. If a Community Paramedic notices the client is having difficulty moving around, they should make the necessary referrals to organizations that can provide walkers, canes and other mobility devices, and also link them with their primary care physician, so that they can be referred to a physical therapist. If hazards are found, the paramedic will recommend changes that need to be made and, if needed, refer the client to the appropriate community resources that can then provide further assistance.

Western Eagle County Health Services District

Home Safety Assessment Checklist

Date of visit: _____

Occupant name: _____ Paramedic Name: _____

OUTSIDE OF HOUSE

1. Sidewalk and/or pathway to house is level and free from any hazards. Yes ___ No ___ N/A ___
2. Driveway is free from debris/snow/ice. Yes ___ No ___ N/A ___
3. Outside stairs are stable and have sturdy handrail. Yes ___ No ___ N/A ___
4. Porch lights are working and provide adequate lighting. Yes ___ No ___ N/A ___

LIVING ROOM

1. Furniture is of adequate height and offers arm rests that assist in getting up and down. Yes ___ No ___ N/A ___
2. Floor is free from any clutter that would create tripping hazards. Yes ___ No ___ N/A ___
3. All cords are either behind furniture or secured in a manner that does not cause trip hazards. Yes ___ No ___ N/A ___
4. All rugs are secured to floor with double-sided tape. Yes ___ No ___ N/A ___
5. Lighting is adequate to light room. Yes ___ No ___ N/A ___
6. All lighting has an easily accessible on/off switch. Yes ___ No ___ N/A ___
7. Phone is readily accessible near favorite seating areas. Yes ___ No ___ N/A ___
8. Emergency numbers are printed near all phones in house. Yes ___ No ___ N/A ___

KITCHEN

1. Items used most often are within easy reach on low shelves. Yes ___ No ___ N/A ___
2. Step stool is present, is sturdy and has handrail. Yes ___ No ___ N/A ___
3. Floor mats are non-slip tread and secured to floor. Yes ___ No ___ N/A ___
4. Oven controls are within easy reach. Yes ___ No ___ N/A ___
5. Kitchen lighting is adequate and easy to reach switches. Yes ___ No ___ N/A ___
6. ABC fire extinguisher is located in kitchen. Yes ___ No ___ N/A ___

WECAD Home Safety Checklist, cont.

STAIRS

1. Carpet is properly secured to stairs and/or all wood is properly secured. Yes ___ No ___ N/A ___
2. Handrail is present and sturdy. Yes ___ No ___ N/A ___
3. Stairs are free from any clutter. Yes ___ No ___ N/A ___
4. Stairway is adequately lit. Yes ___ No ___ N/A ___

BATHROOM

1. Tub and shower have a non-slip surface. Yes ___ No ___ N/A ___
2. Tub and/or shower have a grab bar for stability. Yes ___ No ___ N/A ___
3. Toilet has a raised seat. Yes ___ No ___ N/A ___
4. Grab bar is attached near toilet for assistance. Yes ___ No ___ N/A ___
5. Pathway from bedroom to bathroom is free from clutter and well lit for ease of movement in the middle of the night. Yes ___ No ___ N/A ___

BEDROOM

1. Floor is free from clutter. Yes ___ No ___ N/A ___
2. Light is near bed and is easy to turn on. Yes ___ No ___ N/A ___
3. Phone is next to bed and within easy reach. Yes ___ No ___ N/A ___
4. Flashlight is near bed in case of emergency. Yes ___ No ___ N/A ___

GENERAL

1. Smoke detectors in all areas of the house (each floor) and tested. Yes ___ No ___ N/A ___
2. CO detectors on each floor of house and tested. Yes ___ No ___ N/A ___
3. Flashlights are handy throughout the home. Yes ___ No ___ N/A ___
4. Resident has all medical information readily available and in an area emergency providers will easily find. Yes ___ No ___ N/A ___
5. All heaters are away from any type of flammable material. Yes ___ No ___ N/A ___

OVERALL TIPS

1. Homeowner has good non-skid shoes to move around house. Yes ___ No ___ N/A ___
2. All assisted walking devices are readily accessible and in good condition. Yes ___ No ___ N/A ___
3. There is a phone near the floor for ease of reach in case of a fall. Yes ___ No ___ N/A ___
4. All O2 tubing is less than 50 ft. and is not a trip hazard. Yes ___ No ___ N/A ___
5. Resident has had an annual hearing and vision check by a physician. Yes ___ No ___ N/A ___
6. Resident has the proper hearing and visual aides prescribed and are in good working order. Yes ___ No ___ N/A ___
7. All medications are properly stored and labeled to avoid confusion on dosage, time to take, and avoidance of missed doses. Yes ___ No ___ N/A ___

FOR ALL SECTIONS MARKED 'NO' THE FOLLOWING RECOMMENDATIONS ARE NOTED BELOW

After evaluation I recommend the resident be considered for the following referrals.

Signature of resident: _____

Signature of Community Paramedic: _____

References: Centers for Disease Control and Prevention / <http://www.cdc.gov>

A. 'Check for Safety' A Home Fall Prevention Checklist for Older Adults

B. U.S. Fall Prevention Programs for Seniors – Selected Programs Using Home Assessment and Modification.

*Compiled and created by Kevin Creek NREMT-P / Community Paramedic
Western Eagle County Health Services District, 360 Eby Creek Road, P.O. Box 1809, Eagle CO 81631
May 2011*



Appendix K

***WESTERN EAGLE COUNTY
HEALTH SERVICES DISTRICT***785 Red Table Dr.
Gypsum, CO 81637

P: 970-524-1689

F: 970-524-1771

SocialSupport EvaluationLast Revised: (Date)

Purpose: The social evaluation procedure is designed for use during the home visit for the Community Paramedic to determine whether the client has the social supports necessary to help maintain their health.

Procedure: The Community Paramedic will use history taking and other interview techniques to assess the client's general well being in the home, and make sure that this is a person who has all of their basic needs met. The Community Paramedic will assess such necessities as adequate food, cleanliness, clothing, shelter, companionship, supportive social network, ability to obtain prescription medications (financially and physically in terms of being able to retrieve/open them), and other important day-to-day needs. Referrals will be made to the appropriate agencies when appropriate, and a detailed report will be given to the physician after the Community Paramedic visit.



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Wound Check/Dressing Change

Last Revised: (Date)

Purpose: To perform an evaluation of a wound and to assist the patient and family caregivers in the changing of basic dressings in the home setting.

Procedure: In caring for a patient who has a wound that needs to be evaluated and have a dressing changed, the Community Paramedic will perform a history, physical, and basic evaluation of the wound to make sure that there is no infection or other obvious signs of immediate need for physician evaluation. Basic dressing changes will be performed, however, there will be no advanced care of the wound such as draining or debriding. If during the visit it appears that the wound needs any type of advanced care, the Community Paramedic will contact the physician's office and recommend that the patient be seen as soon as possible.

Medication Compliance and Reconciliation

Last Revision: (Date)

Purpose: The purpose of this service is to evaluate the patient's medications to determine whether they are taking and storing them correctly. Elderly patients in particular may be on multiple medications, which can create confusion. The CP will evaluate whether the patient is taking each one of their prescribed medications, at the appropriate time and correct dosage, and whether they are safely and properly storing them. The goal for the Community Paramedic is to help the client organize and correctly understand how and when to take their medications.

Procedure: Before visiting with the patient, the physician's office will fax a copy of the most current medication list, history and orders to the Community Paramedic office so that the visiting paramedic knows exactly what plan the patient is supposed to be on. Through inspection of the medications, organizational containers and interview techniques, the paramedic will determine if the patient is following their prescribed medications and routine. If, during the visit, the paramedic finds that there is a discrepancy in how the patient is handling their medications, the physician will be contacted and discussions will be made on how to correct the problem. The paramedic will NOT change any medications, dose, or advise the patient on how to resume a normal schedule once the patient has gone off their prescribed meds or routine. The physician will make any and all decisions regarding the patient's medications, and the paramedic is in an assistance role only.

**WESTERN EAGLE COUNTY**
HEALTH SERVICES DISTRICT

P: 970-524-1689

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Community Paramedic Patient Order Form

PATIENT INFORMATION (May submit patient face sheet for demographics)		PLEASE RETURN BY FAX TO 970-524-1771	
Date of Order:	Requested Date of Service:	Primary Language:	
Client Name: Last	First	Middle	DOB: Gender: <input type="checkbox"/> M <input type="checkbox"/> F
Physical Street Address		City/Town	State Zip Code
Mailing Address (if different)		City/Town	State Zip Code
Insurance (For research purposes only): <input type="checkbox"/> No <input type="checkbox"/> Yes If yes, company: _____			
DIAGNOSIS		PREVENTION ASSESSMENTS	
Diagnosis : _____		<input type="checkbox"/> Nutrition Assessment	
Reason for Visit: _____		<input type="checkbox"/> Social Evaluation / Social Support	
		<input type="checkbox"/> Home Safety Inspection	
LABORATORY SPECIMEN COLLECTION		PLEASE INCLUDE AGENCY CLINICAL LAB TESTING ORDER SHEET	
<input type="checkbox"/> Blood Draw		<input type="checkbox"/> iStat Test (Coming Soon!)	
Requested Labs/Blood Tubes: _____		<input type="checkbox"/> Stool Collection <input type="checkbox"/> Urine Collection	
CLINICAL CARE			
<u>Cardiovascular</u>		<u>Respiratory</u>	
<input type="checkbox"/> Blood Pressure Check		<input type="checkbox"/> Asthma Meds/Education/Compliance	
<input type="checkbox"/> EKG 12 Lead		<input type="checkbox"/> CPAP	
<input type="checkbox"/> Peripheral Intravenous Lines		<input type="checkbox"/> MDI Use	
<u>Follow-up/Post Discharge</u>		<input type="checkbox"/> Nebulizer Usage/Compliance	
<input type="checkbox"/> Diabetic Follow-up/Education		<input type="checkbox"/> Peak Flow Meter Education/Usage	
<input type="checkbox"/> Neurological Assessment		<input type="checkbox"/> Oxygen Saturation Check	
<input type="checkbox"/> Dressing Change/Wound Check/Type: _____		<u>General</u>	
<input type="checkbox"/> Discharge Follow-up/Diagnosis: _____		<input type="checkbox"/> Assessment / H&P	
		<input type="checkbox"/> Ear exams	
		<input type="checkbox"/> Medication Evaluation or Medication Compliance	
		<input type="checkbox"/> Post Injury/Illness Evaluation	
		<input type="checkbox"/> Post Stroke Assessment/Follow-up	
		<input type="checkbox"/> Weight Check	
Other Orders/Information: _____			
PUBLIC HEALTH/SOCIAL SERVICES			
<input type="checkbox"/> Bright Beginnings		<input type="checkbox"/> EHS Post Partum Visit	
<input type="checkbox"/> Disease Investigation		<input type="checkbox"/> IZ Clinic Coverage	
		<input type="checkbox"/> Fluoride Varnish Clinic	
		<input type="checkbox"/> TB Meds DOT	
		<input type="checkbox"/> Welfare Check	
ORDERING PHYSICIAN SIGNATURE (MUST BE SIGNED)		Disclaimer: All visits will be accomplished as soon as possible but generally within 24 – 72. All services provided must be within the scope of practice of a paramedic as described in 6 CCR 1015-3 Chapter 2, EMS Practice and Medical Director Oversight Rules. Paramedics will verify that orders fall within this scope of practice and will contact you if orders need clarification or further instruction.	
Contact Number: _____			
Referring Physician: _____ (Please Print)			
Signature _____ Date _____			
<input type="checkbox"/> Fax report back to referring physician			
<input type="checkbox"/> Fax report to: _____			



**Joint Committee on Rural Emergency Care (JCREC)
National Association of State Emergency Medical Services Officials
National Organization of State Offices of Rural Health
State Perspectives Discussion Paper on Development of Community Paramedic Programs**

State Emergency Medical Services (EMS) Offices and State Offices of Rural Health are both committed to the principle that rural EMS systems should be able to respond in a timely, appropriate manner whenever serious injury or illness strikes someone in need. In 2009 the National Association of State EMS Officials (NASEMSO) and National Organization of State Offices of Rural Health (NOSORH) created a Joint Committee on Rural Emergency Care (JCREC). This Committee is dedicated to advancing policy and practice to ensure access to timely, affordable, and high quality emergency care services in rural America. In 2010, the JCREC developed "Improving Access to EMS and Health Care in Rural Communities: A Strategic Plan"¹ which was approved by both Associations. This discussion paper is intended to further the community paramedicine elements of that Strategic Plan.

Statement of Purpose:

The concept of community paramedicine represents one of the most progressive and historically-based evolutions available to community-based healthcare and to the Emergency Medical Services arena. By utilizing Emergency Medical Service providers in an expanded role, community paramedicine increases patient access to primary and preventative care, provides wellness interventions within the medical home model, decreases emergency department utilization, saves healthcare dollars and improves patient outcomes. As the Community Paramedicine model continues to be adopted across the country, states and local communities need assistance in identifying common opportunities and overcoming challenges. This discussion paper offers insight into the historical perspective and future considerations for Community Paramedicine programs. As well, it advocates for the development of an implementation guide for states.

Community Paramedicine in Action

At 2:35 am on a cold November morning the Emergency Medical Dispatcher in the 9-1-1 center received a call from a man, frantic with concern about his wife. "Please send help! My wife is having a hard time breathing and I don't know what to do!" After surmising that the patient was conscious with labored breathing, the dispatcher alerted the appropriate response units to assist before walking the caller through further assessment questions and ways he can help his wife be more comfortable.

Kennedy was just finishing a patient care report to give to the emergency department when a call came over the radio, "Medic 1, Alleghany EMS, Hillsborough Fire; Respiratory Difficulty. 38-year-old female, 3415 Washo Drive. Patient conscious and alert. Code 3 ALS response, all others Code 2." Snapping the clipboard shut and grabbing the radio, Kennedy bundled up against the cold and hopped in Medic 1, her paramedic response car. While Kennedy navigated the long, dark country roads to get from the Critical Access Hospital in town out to Washo drive, she thought about the scenarios that could be unfolding. Knowing that even though the fire department and ambulance were not using lights and sirens, they would most likely get there before she did. They will have applied oxygen and gotten the patient comfortable and may be able to give a quick update on the radio if they had time.

The husband, Carl, watched nervously as the first responders worked with his wife. Several years ago, his wife had suffered from an infection of the lining of her heart that resulted in potential lifelong dependence on medications to keep her lungs from filling with fluid as a result of her weakened heart. Just yesterday they had decided with her primary care provider to reduce her "fluid pill" medication in an effort to try and wean her off slowly. It looked now that it hadn't worked. A knock at the door spun

him around and as he pushed the door open he saw the warm, comforting smile and an outstretched hand, "I'm Kennedy, a community paramedic, let's go check on your wife."

The brief update from the first responders confirmed Jen, the patient, was having difficulty breathing with just room air. On a mask that delivered a high concentration of oxygen, Jen still had labored breathing but was oxygenating well. Breath sounds confirmed fluid in the lungs and after the basic assessment, Jen was given nitroglycerin, put on a 12-lead ECG and an IV was established. Because the likely culprit of the current emergency was the reduction in the congestive heart failure medication, Kennedy determined that 80 mg of Lasix IV was the best next step. While she was waiting for the medication to take effect, an ECG and quick phone call to the medical control physician in the ED was made so they could consult on next steps.

Carl was just short of amazed. Within 20 minutes after the community paramedic had arrived, Jen was comfortable, off oxygen, breathing normally and saying she didn't want to go to the hospital. What a relief! She was OK, back to normal and instead of facing an hour ride to an emergency department and what has been a guaranteed two days in the hospital, this was now a minor blip in their day and a follow-up visit with their primary care doc tomorrow.

Before leaving the home, Kennedy assured and confirmed that if Jen started to have any problems to call 9-1-1 and they would be right back. Jen and Carl were so grateful to get the help and to avoid the hassle and overwhelming bills of the ED. It was hard to explain what Kennedy felt other than to say she was content feeling that she had made a meaningful difference. She knew that her intervention had met Jen's needs, exceeded the Carl's expectations and provided for the highest quality, most cost-effective intervention that could be provided. Kennedy was actually looking forward to future interactions with Jen, her primary care doc and her partners in community health that all work together to ensure that folks like Jen received coordinated, wellness-focused care.

Executive Summary

While "community paramedicine (CP)" is a relatively new term, first described in this country in 2001² as a means of improving rural EMS and community healthcare, it is not a new concept in practice, either here or in other parts of the world.

Note: In much of the world, paramedic is a general term used to identify all levels of Emergency Medical Technician (EMT). For the purposes of this discussion paper, 'community paramedicine' or 'CP' will be used to describe generically programs that specifically utilize any level of EMT (basics to paramedics) to provide community paramedicine and community health services.

The *EMS Agenda for the Future*³, released in 1996, presented the vision that EMS will be community-based and fully integrated with the overall health care system. The agenda additionally described that EMS of the future would have the ability to not only provide acute illness and injury care, but also identify health risks and provide follow-up care, treatment of chronic conditions and community health monitoring. The *Rural and Frontier EMS Agenda of the Future*⁴, released in 2004, further reinforced a community health role for EMS with a vision that recognized EMS providing not only a rapid response, but also filling roles as a community resource for prevention, evaluation, triage, referral and advice⁵. Both documents make numerous references to community health roles where EMS is integrated with other elements of the health care delivery system. As such, the concept of community paramedicine embraces EMS providers who are utilized in an expanded role as part of a community-based team of health services and providers.

This discussion paper summarizes the current status of community health and community paramedicine programs and present a synopsis of some of the opportunities and challenges state EMS offices will face as these programs are contemplated in local communities. This Discussion Paper advocates for the development of a guide for states to refer to as community paramedicine and

community health programs emerge, either locally or statewide. Much information about community paramedicine can be found at <http://communityparamedic.org>. However, the “information tab for policy makers” is virtually blank and this Discussion Paper is meant to provide context for discussions in this area and assist states with implementation of community paramedicine programs.

Background:

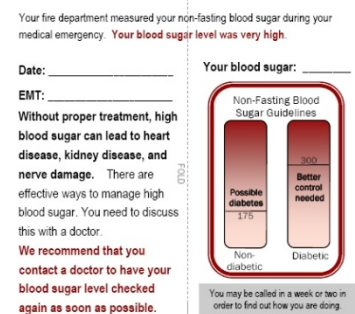
The original intent of EMS systems was to provide patient care for acute or emergency events. However, studies show that 10-40% (or more) of ambulance service responses are for non-emergent events. Many times, patients who lack access to primary care utilize EMS to access emergency departments for routine health care services. While these patients could be more appropriately cared for in primary care offices or alternate locations, the current healthcare and reimbursement infrastructure systems do not support other appropriate, cost-effective EMS transport alternatives.

After some 30 years of development of the current model of providing prehospital care, the future of EMS may be much different. The erosion of the volunteer model in many rural areas, generational changes in the overall workforce, continued budget challenges and national changes in healthcare are challenging rural EMS infrastructure--- and demanding innovational strategies.

Emergency medical services of the future, whether it includes community paramedicine or not, will not likely involve an initial patient contact with two EMT responders in a \$150,000 ambulance and an automatic ride to the emergency room for many calls. Future calls may begin with a priority dispatch system which can triage and send a variety of resources, including community paramedics, who then provide a more comprehensive triage followed by treat and release to primary care or other appropriate treatment options.

Historically, there are numerous examples of programs in which EMS and community health providers have been utilized to provide emergency care as well as assure access to primary care. While the Red River project in New Mexico is often noted as one of the most well known demonstration of this concept, other models include the following:

- **Seattle/King County SPHERE (Supporting Public Health with Emergency Responders)** – In this King County program, EMS is utilized to help prevent future 9-1-1 calls by identifying potentially life-threatening conditions whenever a patient is seen by responders. Instead of a quick assessment and release of a patient who called 9-1-1 for a transient event, a blood pressure, blood sugar or other assessment is conducted. Patients are provided a card with the results of the assessment and they are encouraged to follow up with their primary care physician. The patient receives a follow-up call a month later to help assure that the physician contact was initiated.
- **Winnipeg, Canada** – Instead of an automatic trip to the ED, paramedics respond to thousands of non-life threatening 9-1-1 calls to triage and evaluate the patient’s medical needs. Based upon the assessment, patients are provided appropriate treatment on scene and protocols are then implemented to transport patients to not only ERs, but also to urgent care clinics, primary care physicians and other alternate sites when appropriate. The paramedic can make decisions to arrange transport by ambulance, in the paramedic response vehicle and even by taxi or stretcher vehicle. The paramedic union president is quoted as saying "The idea is to have medics out in the community engaging people with problems and find the best place in health care for them instead of a system of 'you call, we haul'."



- Alaska Community Health Aide Program – Staffed by selected Alaska natives in remote communities, not necessarily paramedics, this program was begun as a strategy to use village workers to distribute antibiotics to combat a tuberculosis epidemic back in the 1950's. It became a federally funded program in 1968 and today over 550 Community Health Aides/Community Health Practitioners are employed by 27 tribal health organizations in 178 rural/frontier communities. CHA/Ps are the patients' first contact within the network of health professionals in the Alaska Tribal Health System.
- Nova Scotia, CN – The Islands of Long and Brier are only accessible by ferries. Transport to the closest hospital is a 50-minute trip with the regional hospital another hour away. The island residents recognized the need for primary and emergency care and launched a multi-phase initiative. The first phase provided 24/7 emergency paramedic coverage based from an abandoned physician's clinic. Next, the paramedic role was expanded to provide flu shots, blood pressure and diabetic clinics and other primary care. Lastly, the paramedics were integrated with a nurse practitioner to provide more comprehensive and complex care. The traditional paramedic role was expanded to include home visits for injury and fall prevention as well as primary care patient assessments and evaluation.
- MedStar, TX Alternative Destination/Alternative Transport Program – A collaborative effort of MedStar, the emergency physicians board and public health, the overall goal of this program is to help assure the right patient, receives the right care, at the right time and the right setting. Patients in this program receive better healthcare at reduced cost to the patient and the community. Patients with chronic or non-acute conditions are treated by Advanced Practice Paramedics who bring preventative services to patients most at risk for medical emergencies. The program reduces health care expenditures by reducing the probability of providing acute emergency medical care for at risk and medical underserved patients.
- Wake County EMS, Raleigh, NC – In addition to providing increased community resources for acute care, paramedics in this program also provide preventative care to some high-risk patient populations, and seek further care for those patients who may be better served at locations other than local hospital emergency departments. These paramedics are part of a health care team that improves emergency response, mitigates the need for some responses and provides care to some patients that have limited access to any other care.
- Minnesota Community Paramedic Program – The pilot of this program was funded by the Minnesota Department of Public Health and Office of Rural Health. The first course consisted of hand-picked, experienced paramedics interested in providing an expanded role in their communities. As part of their education, each community paramedic conducted a community analysis to determine gaps in health care. These paramedics then molded their practice to needs ranging from provision of mobile clinics for Native American populations, free clinics for communities, 'chase car' enhancement of local EMS response, critical access hospital staffing and regional/national disaster response.
- Western Eagle County Ambulance District, Eagle, CO –Championed by the local EMS service manager and the local public health department, the goal of this program is to take the current EMS resource and link it with existing health care services to provide EMS and public health services. In addition to physician-directed treatment delivered directly to patients in their homes, paramedics utilize expanded training in assessments, blood draws, wound care, diagnostic monitoring and other procedures. Assessment and treatment findings are linked with other appropriate health services in order to increase health care at a savings.



In their varied states and provinces, these are examples of community paramedicine programs in which EMS providers are used to not only provide emergency care but also expand their roll to address primary care needs and direct patients to the most appropriate level of definitive care. There are many more examples of community paramedicine being conducted in the U.S. and communities will continue to look at CP to help bridge the gap between the health care needs and the resources available to meet those needs. Currently, most U.S. programs are pilots or local programs born out of necessity. It is important for states to assess the opportunities and challenges to development of these programs and this paper is a brief discussion of several areas to be considered and developed into a *state community paramedicine guide*.

Funding and Reimbursement

There are increasing concerns about shrinking healthcare reimbursements and budget shortfalls. The primary goal of community paramedic programs is to save healthcare dollars by reducing illness and injury and prevent unnecessary ambulance transports, emergency department visits and readmissions through more efficient use of existing resources.

Opportunities:

Community paramedicine is not without data showing cost savings. After five years, the Nova Scotia program demonstrated a 40% reduction in emergency room visits and a 28% reduction in clinic visits. A U.S. program that focused on preventing readmissions of frequent flyers quotes a 64% reduction in 9-1-1 visits and \$1 million savings in health care costs. These examples need to be validated and collected into a comprehensive package that can be presented to policy makers and tax payers.

Challenges:

The case for this has not yet been made such that insurance providers universally are implementing reimbursement for CP services.

Hospitals and physicians are not necessarily proponents for community paramedicine as they depend upon patient contacts and volume to fund their operations. However, the proposed changes to a reimbursement scheme which limits reimbursement for a patient's disease through Accountable Care Organizations, Value Based Purchasing and Bundled Payment mechanisms may represent an opportunity for a role such as community paramedics to be extremely valuable.

Regulation of Community Paramedicine Programs & Community Paramedics

Are states prepared to sufficiently provide for or allow the regulatory oversight and support necessary for the expanded role that community paramedicine may practice?

Opportunities:

EMS provides a triad of health care, public safety and public health services. As noted in the above examples, community paramedicine does not necessarily change the scope of EMS practice. Community health services are already provided by EMTs in the current scope of practice. While CP seems to emphasize the role of EMS providing primary care in the patient's home, it is already an environment and role in which EMTs already practice. Much of the infrastructure and regulation is likely already in place in states to allow community paramedicine.

Challenges:

Currently, state regulations may only allow CP providers to practice in a prehospital environment with a skill set designed for acute responses to medical diseases or traumatic injuries. In most deliberations about community paramedicine, participants are careful to characterize that CP providers provide an expanded role, not an expanded scope. This expanded role is often depicted as the ability for CP providers to perform an expanded assessment and medical history and to develop care plans; use of non-traditional medications such as vaccines; and expanded treatments for chronic diseases such as diabetes.

Additionally, community paramedicine services are related more to primary care and public health roles than the traditional 9-1-1 response. For example, a CP provider may perform home visits to follow up on the health of patient with diabetes, mental health challenges and other issues. The CP role may also include injury prevention activities such as conducting home safety assessments for falls and other hazards.

All of these regulatory issues need to be considered by states early-on if a community paramedic program is to be successfully implemented.

Expanded Role of Community Paramedics

Every day, EMTs encounter patients who require assistance with non-emergent conditions. As well, many patients have chronic and secondary conditions that have precipitated the emergency call such as loneliness, mental health, lack of home care and other special needs.

Opportunities:

The community paramedic is generally described as an expanded role and, with few exceptions, does not incorporate new skills or an expanded scope of practice (suturing being one exception in a model CP curriculum). The idea of expanded role or non-traditional settings is not a new concept. EMS has long been active in emergency rooms and clinics, as wildland fire medics, in industrial sites and with other roles with specialized practices.

Community paramedicine is not a new practice, but rather a specialty much like emergency medicine is a specialty. As other health care professionals choose a specialty for a variety of reasons, EMTs may choose CP. For example, an 'aging' paramedic may choose to extend their EMS career by choosing a community paramedicine practice may be less physically demanding on their health and family life.

Challenges:

Several pilot CP programs are preemptively responding to patients with these conditions in order to prevent more serious illness and to negate emergent calls requiring advanced care and transport. The CP provider may gather a more detailed medical history and perform expanded examinations as needed. A CP may utilize current skills to administer vaccines. In a CP program, the paramedic may provide prenatal, preventative and chronic care, x-rays, wound dressing with local anesthetics and mental health assessments.

An emergency nurse is not necessarily a public health nurse and an emergency physician is not necessarily a primary care physician. A 9-1-1 paramedic may not necessarily want to be a community paramedic and it would be problematic for states, EMS services and communities to not consider this. Current pilot programs are hand-picking EMTs who have an interest in this area. Some programs are rotating EMTs between roles; for example working one month on 9-1-1 and one month in a CP role. Others are integrating CP duties into typical shift downtimes. The challenges of these models will need to be considered in a statewide rollout of community paramedicine.

Lastly, if you've seen one community paramedic program, you've seen one community paramedic program. By design, CP programs are encouraged to first conduct a community assessment gaps in health care needs and then to build local programs that fill those gaps. As such, states will be challenged with the regulation and oversight of local programs that may provide very diverse services.

Community Paramedic Education

A community paramedic's education should prepare EMTs to meet identified community health needs and should address gaps revealed by a community assessment. As such, CP education should be standardized, but capable of being tailored for each community.

Opportunities:

Several partners, including Creighton University in Nebraska, Dalhousie University in Nova Scotia, Mayo Clinic in Minnesota, the North Central EMS Institute and state offices of rural health in Minnesota and Nebraska, came together and studied community health education programs such as from Alaska and Australia. This consortium created a curriculum for community health in the States.

This Community Healthcare and Emergency Cooperative group provides the curriculum to accredited colleges and universities. These institutions can then customize this standardized curriculum for individualized certification programs. This curriculum provides direction on educating about primary care, expanded emergency care, public health, disease management, prevention and wellness and mental health.

This curriculum is conducted in two phases:

- Phase 1 – Approximately 100 hours of foundational skills in advocacy, community outreach and community health assessments, public health and development of prevention and primary care strategies.
- Phase 2 – Clinical skills (ranging from 15 hours to 146 hours depending on the students previous knowledge and background) that is supervised training by the program medical director and other health care providers.

Challenges:

The community paramedicine model has been in existence around the world for some time, this US version of the curriculum is still new. It will need to be evaluated and updated as necessary to accommodate expanded roles identified as more CP programs are implemented. Otherwise, the 'standardized but customizable' format of CP could propagate a wide variety of education programs across states and even among institutions within states. The educational program described may need to be further credentialed in order to be accepted into any college or university curriculum offering.

Community paramedicine is designed to meet the particular needs of communities and it can meet an important role particularly in rural communities where primary care access is a critical issue. This is seen in the Alaska Community Health Aid program that targets community members to meet those needs. Emphasis on educating EMTs in rural areas through a college curriculum presents an 'educational paradox' where the people who most need the education may not be able to access necessary resources.

Medical Direction and Control of Community Paramedic Programs

As with traditional delivery of prehospital care, community paramedic programs must also be physician-driven.

Opportunities:

In well developed, mature CP programs, the community paramedic can be the eyes and ears of primary and emergency care physicians and an extension to their practices. Community paramedicine presents opportunities to decrease unnecessary ER visits and decrease the acuity of patients needing emergency or primary care. EMS is a delegated practice and nothing in a community paramedic's expanded role is designed to change that.

Challenges:

Expanding medical oversight of paramedics to public and community health roles may present challenges. In more urban systems, offline medical direction has traditionally been provided by physicians with an emergency background. Online medical direction has been provided by emergency room physicians. Community health is designed to link the patient with their primary care physician. Therefore, a community paramedic may evaluate a patient and decide that the patient's care may be best met by transport to an urgent care clinic or to their primary care physician's office (maybe even by taxi or some other means). Given this expanded role, will traditional online medical control be comfortable directing patients to alternate sites without ever seeing the patient themselves?

Community paramedicine is intended to fill gaps in rural communities where medical control and primary care may be provided by the same physician and the above scenario less likely. However, there may be a 'medical direction paradigm' in rural areas where CP is needed most but also where physicians are neither educated nor have the support to provide oversight for these expanded services.

To ensure community paramedics are effective, they must be an integral part of the medical home concept where patients are cared for by a physician who leads the medical team and all aspects of preventive, acute and chronic needs of patients. EMS has proven it can be an effective member of this medical team. Everything in the continuum of care from how the CP provider participates in the development and implementation of a patient's care plan, where to get the orders and, how to provide documentation in the patient medical record, will present new challenges for community paramedics and medical directors.

Challenge – Support from Nursing and other Health Professions

Key recommendations of agenda documents and Institute of Medicine reports is that EMS needs to be more integrated with the other elements of the health care system. Community paramedicine represents an opportunity to effect such integration.

Opportunities:

Approached correctly, the introduction of community paramedicine should be viewed as an opportunity not a challenge or a threat to other providers. Particularly in rural communities where health resources are limited, extending the role of the paramedic into different settings and partnering with public health should be viewed as a benefit to the patient. As long as communities continue to understand that community paramedics have a unique education and background and that nursing also has a unique education and background – and that each can compliment rather than compete with each other – potential conflicts should be negligible.

Currently, CP programs have found ways to foster such partnerships and have not created disagreements and conflict. For example, the Colorado pilot program is a partnership under the leadership of the EMS manager and the public health nurse designed to meet both EMS and public health goals.

Challenges:

Implementation of community paramedicine may meet resistance or face opposition from nursing, public health and other health professionals in engaged in providing community or public health. The role of community paramedics lies within much of what EMS is already doing in an environment they are already functioning within. By design, a CP program should begin with an assessment of a community's health needs and implementation of CP should be to fill gaps in a community's needs. As such, potential conflicts over concerns that the CP role overlaps or infiltrates into other areas of practice can instead result in constructive partnerships like the one in Eagle Colorado.

States may need to begin open early discussions, provide education, and develop partnerships with professional groups and advocates to best ensure a community paramedicine program.

Data, Performance Improvement and Outcomes Evaluation

States will need to enhance current information systems to not only plan for the development of community paramedicine programs but also to justify the continued implementation and viability of such programs.

Opportunities:

CP should not continue without a vision about what data is needed to evaluate programs and any benefits and outcomes associated with them. The National EMS Information System (NEMSIS) has been accepted as the standard electronic medical record (EMR) data set for EMS by all 50 states. Adoption of community paramedic programs may necessitate new or modified NEMSIS fields and other documentation. The Health Resources and Services Administration (HRSA) Office of Rural Health Policy contract in late 2010 for development of an evaluation framework and tool for community paramedic programs represents an excellent strategy towards this end.

Challenges:

How and what services a CP program provides is dependent upon an assessment of a community's health care needs and gaps. There currently is no state model for such an assessment. Development of a community assessment tool will help states and the communities develop the need for CP programs and help more consistent implementation of programs. Over time, refinement of an evaluation tool can also maintain a focused development of CP programs nationally and around the world to prevent any potential creep in scope of practice. If there is not a need in a community that cannot be met by utilizing EMS providers in the expanded role of CP, then other solutions must be sought.

Currently, CP programs in the US are typically funded through grants and CP as pilot or demonstrations projects and services are not reimbursed by insurance providers. If CP is to become financially viable, CP programs will need to institutionalize documentation of services provided and their effectiveness – whether the result is better patient outcomes, decreased costs to healthcare or other measures.

Linking the patient information community paramedics collect at the home to the patients' permanent health record at their primary care physician's office or medical home will be a new challenge. The

typical patient care record used now to document the care provided to a patient in a response for emergency help will not likely be appropriate to documenting community health services. Community paramedicine providers will need to be part of the development and delivery of a patient's care plan and services provided will need to be integrated into a patient's entire health record. Linking CP providers to electronic health records and the use of technologies such as telemedicine will be key strategies to be considered.

Summary:

As it has done since its formal inception in the U.S. in 1973⁶, Emergency Medical Services will continue to evolve and develop to meet the needs of our society. All healthcare will continue to be challenged by health care reform, workforce issues, cost containment and reimbursement models, rapidly expanding technology, educating the next generation of providers and many other issues. Because EMS is the healthcare link between public safety and public health, it remains the safety net for patients and will face these challenges at an accelerated rate due to its proximity and value to community-based efforts.

Community paramedicine is a dynamic part of the future of EMS and this Discussion Paper lays out the numerous opportunities and challenges that states will grapple with as community paramedicine programs are contemplated by their communities. The development of a State Guide for Community Paramedicine to more comprehensively address issues, challenges and potential solutions will be an effective resource. The JCREC's mission is to educate and lead on issues such as community paramedicine. As such, the JCREC will continue to engage our organizations and partners to develop the guide and examine strategies that can help the states that choose to initiate community paramedicine.

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Public Health and Emergency Medical Services:

Intersections, Overlaps and Opportunities



National Association of EMS Physicians™



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EMS of the future will be community-based health management that is fully integrated with the overall health care system. It will have the ability to identify and modify illness and injury risks, provide acute illness and injury care and follow-up, and contribute to treatment of chronic conditions and community health monitoring. Patients are assured that their care is considered part of a complete health care program, connected to sources for continuous and/or follow-up care, and linked to potentially beneficial health resources. EMS maintains liaisons, including systems for communication with other community resources, such as other public safety agencies, departments of public health... EMS is a community resource, able to initiate important follow-up care for patients, whether or not they are transported to a health care facility.¹

INTRODUCTION:

The nation's Public Health and emergency medical services (EMS) systems face similar challenges on a daily basis. Both systems are expected to respond in an efficient and effective manner to catastrophes (large and small) that threaten the health, welfare and survival of the populations they serve.

There are many intersections between Emergency Medical Services (EMS) and Public Health. This guide demonstrates these intersections and linkages between the two professions and identifies ways in which public health and EMS can work more closely to identify health risks and improve community well being. While the roles of each may be different they are linked through service to at risk populations who may be in need of public health services (immunizations) or the emergency medical services system (heart attack).

PURPOSE:

This guide is intended to serve as a brief orientation for both public health and EMS professionals alike. This brief overview can assist both EMS and public health professionals in developing and sustaining open and ongoing dialogue regarding the health of the community and in this way more quickly identify persons at risk for disease or injury while implementing steps to promote and improve health.

The Public Health /EMS wheel below represents the continuum of services, programs and processes where EMS and Public Health are connected. The wheel follows the three core functions and ten essential services of Public Health and adds an EMS component that demonstrates how the two professions are linked. Figure 1: Illustrates the core functions of public health and overlapping EMS activities.³

Emergency care providers could benefit from the resources and experiences of public health agencies and experts in establishing injury prevention activities.²

Figure 1: From HRSA's Model Trauma System Planning and Evaluation, 2006



The tables on the following pages are designed to stimulate thinking and help identify opportunities for collaboration between EMS and public health. They reflect overall operations of both EMS and public health in a way that allows the reader to apply the statements to their own setting. We encourage those who read this overview to increase collaboration between these professional disciplines.

The National Association of County and City Health Officials (NACCHO) and the National Emergency Medical Service Physicians (NAEMSP) are committed to the ongoing support and development of key relationships between EMS and Public Health at national, state and local levels.

<i>Case Study for Integrating EMS and Public Health</i>	
<p>In 2004, a small New England community experienced a potential mass Hepatitis A exposure from a vendor serving smoothies at a well attended health fair. Potentially, 2500 persons were exposed, needing screening and prophylaxis in a community with a small local health department. As detailed in the local Public Health plan the local Health Department sought assistance from the State Health Department to secure additional resources from around the state should additional human resources be needed. The local Health Department sought assistance from surrounding communities to assist with emergency mass inoculations. The local Health Department worked through the local EMS units to provide logistical support for the massive undertaking. This included coordinating sites, local set up communications and coverage for medical emergencies at each site. In four days, 2500 people were treated with immunoglobulin by local public health nurses, nurses from surrounding communities and the local Paramedics.</p> <p>Fortunately because of the close working relationship between the local Public Health Department, surrounding public health agencies and the local EMS agencies there was no need for additional state resources. If this outbreak would have impacted more than one community the state was ready to provide the necessary resources. Because of prior planning, updated EMS regulations allowing prehospital personnel to assist in mass vaccination and inoculation programs, and up-to-date prehospital protocols the local EMS agency's more than 50 paramedics were able to assist with injections at each of the local sites along with the public health nurses.</p> <p>A prior experience in this community had moved the local Health Department to engage the surrounding communities in assessing health needs, and the formation of a joint response team to cover infectious disease outbreaks throughout the region. Further as the community assessed its ability to respond to infectious disease outbreaks they recognized the need to involve the local EMS system whose medics were trained to provide intramuscular injections and could be used as an additional resource in responding to infectious emergencies from either terrorism or naturally occurring threats. The active surveillance and assessment process engaged in by the community allowed them to meet the needs of their constituents during this Hepatitis A outbreak.</p>	ASSESSMENT
<p>As a result of prior experiences, the State's Department of Health and state EMS agency partnered on the development of the EMS Vaccine program. The EMS agency changed the administrative code to include vaccinations within the scope of practice for paramedics. The program was designed to use influenza and pneumococcal vaccinations as opportunities for paramedics to develop practice and expertise in immunization. Paramedics were given a 2 hour training based upon the CDC immunization recommendations in Epidemiology and Prevention of Vaccine-Preventable Diseases.</p> <p>Further, because of the uniqueness of some of the rural areas the local Health Departments were encouraged and supported in their efforts to consolidate plans and services, form broader regional response systems, and develop joint community planning areas for threats and emergencies that may arise in their respective areas. These pre-planning efforts made the response to this Hepatitis outbreak much more manageable with no untoward outcomes among the 2500 people receiving an immunoglobulin injection.</p>	POLICY DEVELOPMENT

<p>Clinical opportunities for EMT's to practice immunization skills were supported through the provision of free vaccines to local EMS agencies which were then distributed to the community. A follow-up evaluation noted no adverse outcomes.</p> <p>The program combined EMS and Public Health assets and expertise to expand the capability to respond to local as well as statewide threats. These new capabilities can help reach new populations and utilize influenza clinics as opportunities to practice for mass vaccinations.</p>	ASSURANCE
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STRATEGIC COMPARISONS:

<i>Public Health and EMS Intersections and linkages</i>	
Public Health – What is it?	EMS – What is it?
<ul style="list-style-type: none"> Public Health focuses on promoting and protecting the health of the community. Public Health deals with population based health and addresses the prevention of disease, illness and injury among the overall population while working at both a community and individual patient level. While the Public Health system is broadly encompassing of the collective efforts of all sectors, the “backbone” of this broad system is the governmental local health department at the community level. This overview will concentrate on the governmental public health role rather than the broader whole system perspective. Public Health works in both long-term and immediate or short-term time frames often concurrently. Long term preventive efforts to promote specific population wide health status improvement may take many years for the benefits to be realized. While emergent response, especially to threats to the population’s health must be acted on immediately. Understanding the community’s health including the ongoing monitoring of health status and conditions underpins all Public Health work.⁴ 	<ul style="list-style-type: none"> EMS is individual health, physical health, and urgent/emergent treatment for illness or injury. EMS deals with individuals during times where their health care needs are outside their ability to manage. EMS is provided by both public and private providers serving the out-of-hospital needs of communities through first responders and ambulance services and in-hospital emergency medical needs of communities through licensed acute care hospitals with emergency departments staffed with trained emergency medicine physicians. EMS responses are immediate and usually of short duration (disasters being the exception). EMS responses are critical to time and place.¹

Emergency responders can recognize the diagnostic clues that may indicate an unusual infectious disease outbreak so that the public health authorities can respond quickly. However, a partnership that allows for improved communication of information between emergency providers and public health officials must first be in place.²

<i>Public Health and EMS intersections and linkages</i>	
Public Health	EMS
<ul style="list-style-type: none"> • Mission of Public Health: Fulfilling society's interest in assuring conditions in which people can be healthy.⁵ • Vision: Prevent disease and promote health. • Core functions: Assessment, regular, systematic collection and analysis of data/information on the health of the community; policy development, development of comprehensive public health policies and strategic planning; assurance, through regulation and assuring services to achieve agreed upon goals promoting personal and communitywide health services.⁵ • Public Health has ten essential services that guide the practice of public health. These ten essential services include: <ul style="list-style-type: none"> ○ Monitor health status to identify community health problems. ○ Diagnose and investigate health problems and health hazards in the community. ○ Inform and educate and empower people about health issues. ○ Mobilize community health partners to identify and solve ○ Develop policies and plans that support individual and community health efforts. ○ Enforce laws and regulations that protect health and ensure safety. ○ Link people to needed personal health services and assure the provision of health care when otherwise available. ○ Assure a competent public health and personal health care workforce. ○ Evaluate effectiveness, accessibility and quality of personal and population – based health services. ○ Research for new insights and innovative solutions to health problems.⁶ 	<ul style="list-style-type: none"> • Mission of Emergency Medical Services: To provide out-of-facility care to those with perceived urgent needs, treating all injuries, illnesses as they present themselves.¹ • Vision: To provide acute illness and injury care and follow up, contribute to the treatment of chronic conditions and community health monitoring.¹ • Core Functions: Triage, making sure the right patient is taken to the right facility that is equipped and staffed to meet the patient's needs; Treatment, providing out-of-facility care and treatment to stabilize, and monitor the patient through transport to a receiving facility; and, Transport of the ill or injured to an appropriate facility to provide further definitive care. • EMS, within the context of a broad system, is guided by key components in delivering services including: <ul style="list-style-type: none"> ○ Integration of Health Services ○ EMS Research ○ Legislation and Regulation ○ System Finance ○ Human Resources ○ Medical Direction ○ Education Systems ○ Public Education ○ Prevention ○ Public Access ○ Communication Systems ○ Clinical Care ○ Information Systems ○ Evaluation.¹

Public Health Essential Service: Monitor health status and understand health issues facing the community.

EMS Component: Information systems, Evaluation

Public Health	EMS
<ul style="list-style-type: none"> • Obtain and maintain data that provide information on the community's health (e.g., provider immunization rates; hospital discharge data; environmental health hazard, risk, and exposure data; community-specific data; number of uninsured; and indicators of health disparities such as high levels of poverty, lack of affordable housing, limited or no access to transportation, etc.). • Develop relationships with local providers and others in the community who have information on reportable diseases and other conditions of public health interest and facilitate information exchange. • Conduct or contribute expertise to periodic community health assessments. • Integrate data with health assessment and data collection efforts conducted by others in the public health system. • Analyze data to identify trends, health problems, environmental health hazards, and social and economic conditions that adversely affect the public's health.⁷ 	<ul style="list-style-type: none"> • Uses prehospital data in conjunction with Public Health to design illness and injury prevention strategies. Working relationship with Public Health vital records, and epidemiology as well as community based injury prevention organizations has been established. • Create linkages between Public Health and EMS including programs with an emphasis on population-based public health surveillance, and evaluation for acute injury/illness prevention • Participates in a system data collection and information data sharing network, collects pertinent out-of-hospital EMSS data from field providers on each episode of care, and uses data for EMS and Public Health assessments and system improvements. • Analyze data for routine EMSS and public health surveillance. Ensure data can be accessed by individual users as well as management for system oversight and community health assessments. Contribute standard data sets to the National EMS Information System repository at state and national levels. • Uses the linked information system to assess system and provider performance, measure compliance with applicable standards/rules and to identify trends, environmental health hazards and other conditions that may impact the public's health.⁸

Effective EMS research necessitates creating working relationships between EMS researchers and social scientists, economists, health services researchers, epidemiologists, operations experts, clinical scientists, basic scientists, and researchers from other disciplines. Building these relationships requires a dedicated and committed core research group with access to reliable funding sources.⁹

Public Health Essential Service: Protect people from health problems and health hazards.	
EMS Component: Integration of Health Services, Public Information, Legislation & Regulation, Communication Systems	
Public Health	EMS
<ul style="list-style-type: none"> Investigate health problems and environmental health hazards. Prevent, minimize, and contain adverse health events and conditions resulting from communicable diseases; food-, water-, and vector-borne outbreaks; chronic diseases; environmental hazards; injuries; and health disparities. Coordinate with other governmental agencies that investigate and respond to health problems, health disparities, or environmental health hazards. Lead public health emergency planning, exercises, and response activities in the community in accordance with the National Incident Management System, and coordinate with other local, state, and federal agencies. Fully participate in planning, exercises, and response activities for other emergencies in the community that have public health implications, within the context of state and regional plans and in a manner consistent with the community's best public health interest. Maintain access to laboratory and bio-statistical expertise and capacity to help monitor community health status and diagnose and investigate public health problems and hazards. Maintain policies and technology required for urgent communications and electronic data exchange.⁷ 	<ul style="list-style-type: none"> Investigate, as part of a community based public health team, and report on health hazards or observed adverse health effects. Maintain, a multidisciplinary, multi-agency committee (including Public Health), multi-jurisdiction committee to provide oversight to all-hazard response planning, including a communications plan that provides for intra-agency, inter-agency, regional and state communications of voice and electronic data regarding changes in health status or other emergent events. Evaluates and tests the communication system to ensure its reliability, robustness, redundancy and interoperability during routine applications and all-hazards events involving multiple patients and multiple agency responses. Establish operational plans including an ongoing cooperative working relationship with other public safety and public health agencies to assure Emergency Medical Services System (EMSS) system readiness to "all-hazard" multiple patient events. Maintain preplanned formal mechanisms to activate an optimal response to all-hazard events in accordance with Emergency Medical Services System (EMSS) and disaster response plans and consistent with system resources and capabilities.⁸

All – Hazards Response – Example	
Public Health	EMS
<ul style="list-style-type: none"> Participate in all-hazards planning and exercises 	<ul style="list-style-type: none"> Participate in all-hazards planning and exercises
<ul style="list-style-type: none"> Ongoing monitoring of health surveillance information and systems 	<ul style="list-style-type: none"> Provide data to surveillance system
<ul style="list-style-type: none"> Participate in incident command structure in the face of an event 	<ul style="list-style-type: none"> Participate in incident command structure in the face of an event
<ul style="list-style-type: none"> Monitor and health care assets 	<ul style="list-style-type: none"> Expand system status management systems for all-hazards event
<ul style="list-style-type: none"> Assign health care assets 	<ul style="list-style-type: none"> Deploy health care assets
<ul style="list-style-type: none"> Monitor health impact 	<ul style="list-style-type: none"> Provide outcome data

<i>Public Health Essential Service: Give people information they need to make healthy choices.</i>	
<i>EMS Component: Public Education</i>	
Public Health	EMS
<ul style="list-style-type: none"> • Develop relationships with the media to convey information of public health significance, correct misinformation about public health issues, and serve as an essential resource. • Exchange information and data with individuals, community groups, other agencies, and the general public about physical, behavioral, environmental, social, economic, and other issues affecting the public's health. • Provide targeted, culturally appropriate information to help individuals understand what decisions they can make to be healthy. • Provide health promotion programs to address identified health problems.⁷ 	<ul style="list-style-type: none"> • Provide a public information and education program that heightens public awareness of the need for an Emergency Medical Services System (EMSS) and the preventability of injury and/or illness. • Inform the public about issues related to EMS and Public Health. • Provide data to injury/illness prevention programs to assist in the development of intervention strategies that are culturally appropriate and targeted to person's at risk.⁸

<i>Elderly Fall Prevention - Example</i>	
Public Health	EMS
<ul style="list-style-type: none"> • Identify increasing trend of elderly falls 	<ul style="list-style-type: none"> • Provide data on falls from same height transported to hospital
<ul style="list-style-type: none"> • Link EMS and other records (vital records, trauma registry) to further describe the problem and identify population vulnerability 	<ul style="list-style-type: none"> • Gathering data on falls not transported to hospital
<ul style="list-style-type: none"> • Identify/develop and facilitate or implement fall prevention interventions 	<ul style="list-style-type: none"> • Identify at risk seniors for fall-prevention education/intervention
<ul style="list-style-type: none"> • Evaluate policy, program or other intervention 	<ul style="list-style-type: none"> • Assist in implementation as appropriate
<ul style="list-style-type: none"> • Monitor incidence/prevalence of elderly falls 	<ul style="list-style-type: none"> • Continue to gather real-time data on transported and non-transported falls and report to PH

The lack of public health departments may require rural/frontier EMS personnel to take on leadership roles in more traditional public health department tasks...¹⁰

<i>Public Health Essential Service: Engage the community to identify and solve health problems.</i>	
<i>EMS Component: Integration of Health Services, Public Education</i>	
Public Health	EMS
<ul style="list-style-type: none"> • Engage the local public health system in an ongoing, strategic, community-driven, comprehensive planning process to identify, prioritize, and solve public health problems; establish public health goals; and evaluate success in meeting the goals. • Promote the community's understanding of, and advocacy for, policies and activities that will improve the public's health. • Support, implement, and evaluate strategies that address public health goals in partnership with public and private organizations. • Develop partnerships to generate interest in and support for improved community health status, including new and emerging public health issues. • Inform the community, governing bodies, and elected officials about governmental public health services that are being provided, improvements being made in those services, and priority health issues not yet being adequately addressed.⁷ 	<ul style="list-style-type: none"> • Actively participate in a multidisciplinary planning process that describes the role of the agency within the health care and public safety systems serving the community and the region. • Base operational decisions on the EMS system plan and provide for ongoing engagement with multidisciplinary stakeholders and partners to ensure integration of the Emergency Medical Services System (EMSS) within the community and the region. • Measure the Emergency Medical Services System's (EMSS) progress in meeting goals and objectives in the system plan. • Inform the community and its partner agencies regarding system performance and system improvements.⁸

State EMS leaders should meet with their public health counterparts to consider local EMS roles public health functions such as administering immunizations, conducting screenings, and offering public health education.¹¹

Develop partnerships that include community members to determine the public's educational needs regarding its role in prevention and as EMS system clients, bystanders at emergency scenes, and EMS consumers.¹²

<i>Public Health Essential Service: Develop public health policies and plans.</i>	
<i>EMS Component: Legislation & Regulation, System Finance</i>	
Public Health	EMS
<ul style="list-style-type: none"> • Serve as a primary resource to governing bodies and policymakers to establish and maintain public health policies, practices, and capacity based on current science and best practices. • Advocate for policies that lessen health disparities and improve physical, behavioral, environmental, social, and economic conditions in the community that affect the public's health. • Engage in local health department (LHD) strategic planning to develop a vision, mission, and guiding principles that reflect the community's public health needs, and to prioritize services and programs.⁷ 	<ul style="list-style-type: none"> • Link with Public Health and Public Safety serve as the resource and information conduit about emergency medical services policies, procedures, protocols and best practices. • Inform its partners when access to care is compromised or when health policies conflict with EMS policies for triage and treatment of the ill and injured. • Advocate on behalf of potential emergency patients. • Engage in local health department (LHD) strategic planning to develop a vision, mission, and guiding principles that reflect the community's public health needs, and to prioritize services and programs.⁸

<i>Public Policy - Example</i>	
Public Health	EMS
<ul style="list-style-type: none"> • Identifies need for a public policy change impacting newly arriving immigrants ability to access medical care and how to use the EMS system 	<ul style="list-style-type: none"> • Identifies an increase use of EMS by newly arriving refugees who are unfamiliar with how to access medical care or use the EMS system
<ul style="list-style-type: none"> • Gather data from a variety of sources concerning at-risk populations especially EMS for newly arriving immigrants and refugee populations 	<ul style="list-style-type: none"> • Assist in the data collection efforts to identify newly arriving immigrants using the EMS system
<ul style="list-style-type: none"> • Notify community leaders regarding newly arriving refugee populations and use of the medical care system 	<ul style="list-style-type: none"> • Continue to monitor response and provide data to public health
<ul style="list-style-type: none"> • Convene stakeholders to develop a new policy on providing guidance to newly arriving immigrants on how to access medical care including EMS 	<ul style="list-style-type: none"> • Assist in developing a policy and training program for newly arriving immigrants on how to access medical care including emergency medical services in their new community
<ul style="list-style-type: none"> • Develop and implement a training program for refugee assistance center staff on how immigrants can access medical care 	<ul style="list-style-type: none"> • Continue to provide data to Public Health on refugee populations using EMS to determine if the training program is effective in reducing inappropriate use of the system

<i>Public Health Essential Service: Enforce public health laws and regulations.</i>	
<i>EMS Component: Legislation and Regulation, Education Systems, Medical Direction</i>	
Public Health	EMS
<ul style="list-style-type: none"> • Review existing laws and regulations and work with governing bodies and policymakers to update them as needed. • Understand existing laws, ordinances, and regulations that protect the public's health. • Educate individuals and organizations on the meaning, purpose, and benefit of public health laws, regulations, and ordinances and how to comply. • Monitor, and analyze over time, the compliance of regulated organizations, entities, and individuals. • Conduct enforcement activities. • Coordinate notification of violations among other governmental agencies that enforce laws and regulations that protect the public's health.⁷ 	<ul style="list-style-type: none"> • Inform policy makers and others regarding the need for updated laws and regulations. • Ensure that Public Health is knowledgeable about EMS practices and rules governing EMS operations. • Train EMS personnel on Public Health laws, regulations and ensure compliance and participation in Public Health issues. • Monitor its performance and participation in Public Health and report on issues impacting its service.⁸

<i>Childhood Head Injury - Example</i>	
Public Health	EMS
<ul style="list-style-type: none"> • Routine surveillance indicates an increase in morbidity and mortality related to bicycle vs. motor vehicle crashes 	<ul style="list-style-type: none"> • Trauma registry notes increase in childhood head injury incidence and mortality
<ul style="list-style-type: none"> • Form a community coalition that includes EMS and trauma care providers to further assess the problem and need for intervention 	<ul style="list-style-type: none"> • Root cause analysis indicates most frequently associated with bicycle vs. motor vehicle collisions
<ul style="list-style-type: none"> • Research existing prevention/intervention programs related to bicycle injuries in children 	<ul style="list-style-type: none"> • Participate in community coalition
<ul style="list-style-type: none"> • Based on community preference and proven effectiveness, advocate for, and ensure passage of, ordinance requiring helmet use in children 	<ul style="list-style-type: none"> • Provide expert testimony to legislative bodies concerning need for ordinance
<ul style="list-style-type: none"> • Develop or acquire program materials targeting childhood bicycle safety 	<ul style="list-style-type: none"> • Issue "citations" to children who are wearing helmets that can be redeemed for "treats", e.g. ice cream cone
<ul style="list-style-type: none"> • Evaluate program effectiveness 	<ul style="list-style-type: none"> • Continue to provide data on transported and non-transported bicycle vs. motor vehicle crashes including notations on helmet use

<i>Public Health Essential Service: Help people receive health services.</i>	
<i>EMS Component: Clinical Care, Public Access</i>	
Public Health	EMS
<ul style="list-style-type: none"> Engage the community to identify gaps in culturally competent, appropriate, and equitable personal health services, including preventive and health promotion services, and develop strategies to close the gaps. Support and implement strategies to increase access to care and establish systems of personal health services, including preventive and health promotion services, in partnership with the community. Link individuals to available, accessible personal healthcare providers (i.e., a medical home).⁷ 	<ul style="list-style-type: none"> Assess the needs of the general public and their ability to access the system and the results integrated into the EMS system plan. Ensure unique populations (e.g., language, socially disadvantaged, migrant/transient, remote, rural, and others) are able to access the Emergency Medical Services System (EMSS) agency system. Provide access to a universal number (9-1-1) for citizens to access the system, with dispatch of appropriate medical resources in accordance with a written plan. Provide 211 (or similar number) for non-emergency health resource information.⁸

<i>Clinical Care - Example</i>	
Public Health	EMS
<ul style="list-style-type: none"> Notes an outbreak of non-influenza “cold” like symptoms 	<ul style="list-style-type: none"> Identifies an increase in non-urgent transports to the emergency department for “cold” like symptoms
<ul style="list-style-type: none"> Assists in the development of a “available status” call in number for persons requesting medical attention for “cold” like symptoms 	<ul style="list-style-type: none"> EMS medical director drafts a non-transport, assess and refer protocol to connect “cold” patients with health clinics, urgent care centers, and primary care providers
<ul style="list-style-type: none"> Implements and staffs “available status” call in line 	<ul style="list-style-type: none"> Monitors sensitivity and specificity of “cold” referral protocol using the available status call-in number
<ul style="list-style-type: none"> Provides public education 	<ul style="list-style-type: none"> Monitors non-urgent transports to the emergency department
<ul style="list-style-type: none"> Determines end point of “cold” like symptom outbreak and discontinues hotline staffing 	<ul style="list-style-type: none"> Reverts back to a “transport all” protocol
<ul style="list-style-type: none"> Evaluates effectiveness of hotline referral program 	<ul style="list-style-type: none"> Participates in QI activities to determine effectiveness of referral protocol noting over or under-triage
<ul style="list-style-type: none"> Plans for subsequent refinement and identification of trigger points for reinstatement of referral hotline 	<ul style="list-style-type: none"> Refines protocol for subsequent implementation and use

<i>Public Health Essential Service: Maintain a competent public health workforce.</i>	
<i>EMS Component: Human Resources, Education Systems, Evaluation, Clinical Care</i>	
Public Health	EMS
<ul style="list-style-type: none"> • Recruit, train, develop, and retain a diverse staff. • Evaluate local health department (LHD) staff members' public health competencies, and address deficiencies through continuing education, training, and leadership development activities. • Provide practice and competency based educational experiences for the future public health workforce, and provide expertise in developing and teaching public health curricula, through partnerships with academia. • Promote the use of effective public health practices among other practitioners and agencies engaged in public health interventions. • Provide the public health workforce with adequate resources to do their jobs.⁷ 	<ul style="list-style-type: none"> • Recruit, train, develop, and retain a diverse staff. • Maintain adequate numbers of trained and licensed personnel (paid and/or volunteer) to meet performance standards for level of care and response times. • Provide access to required and advanced training, leadership opportunities, and have access to stress management services as needed. • Ensure written educational requirements are consistent with state and nationally recognized levels of training and that a structure is in place to provide education and maintenance of clinical skills. • Provide initial and continuing education programs including periodic testing, consistent with state and nationally recognized levels of care.⁸

<i>Public Health Essential Service: Evaluate and improve programs and interventions.</i>	
<i>EMS Component: Evaluation, EMS Research, Medical Direction</i>	
Public Health	EMS
<ul style="list-style-type: none"> • Develop evaluation efforts to assess health outcomes to the extent possible. • Apply evidence-based criteria to evaluation activities where possible. • Evaluate the effectiveness and quality of all local health department (LHD) programs and activities and use the information to improve local health department (LHD) performance and community health outcomes. • Review the effectiveness of public health interventions provided by other practitioners and agencies for prevention, containment, and/or remediation of problems affecting the public's health, and provide expertise to those interventions that need improvement.⁷ 	<ul style="list-style-type: none"> • Adopt computer technology and analytical tools for monitoring system performance. • Engage the medical community and Public Health in assessing and evaluating Emergency Medical Services System. • Translate findings from research or other quality improvement into improved service. • Document clinical care in a manner that enables agency and system wide information to be used for performance improvement, patient outcomes and quality of care. • Provide for periodic external review by objective, third-party experts, reviewers, or regulators.⁸

<i>Emergent and Routine Real Time and Ongoing Surveillance - Example</i>	
Public Health	EMS
<ul style="list-style-type: none"> • Establish and/or communicate required reporting elements and the mechanisms for reporting (ranging from routine reportable disease to real time and extraordinary episodic information needs) 	<ul style="list-style-type: none"> • Contribute "real-time" data on incident types and locations
<ul style="list-style-type: none"> • Monitor all data, including EMS data, to identify disease clusters, outbreaks and other health conditions outside the norm 	<ul style="list-style-type: none"> • Report any workforce exposures or effects
<ul style="list-style-type: none"> • Communicate routine and extraordinary surveillance information (along with advice and/or direction as needed) with the community's health care system, including EMS 	<ul style="list-style-type: none"> • Communicate/coordinate with PH regarding treatment approaches and guidelines, especially as relates to extraordinary issues and events

<i>Public Health Essential Service: Contribute to and apply the evidence base of public health.</i>	
<i>EMS Component: EMS Research, Evaluation, Information Systems, Medical Direction and Public Health Essential Service Contribute to and apply the evidence of public health</i>	
Public Health	EMS
<ul style="list-style-type: none"> • When researchers approach the local health department (LHD) to engage in research activities that benefit the health of the community, <ul style="list-style-type: none"> ○ Identify appropriate populations, geographic areas, and partners; ○ Work with them to actively involve the community in all phases of research; ○ Provide data and expertise to support research; and, ○ Facilitate their efforts to share research findings with the community, governing bodies, and policymakers. • Share results of research, program evaluations, and best practices with other public health practitioners and academics. • Apply evidence-based programs and best practices where possible.⁷ 	<ul style="list-style-type: none"> • Establish sufficient policies to conduct and participate in system research efforts. • Collaborate with social scientists, economists, health services researchers, epidemiologists, operations researchers, and other clinical scientists. • Integrate with external stakeholders to apply and publish system design, patient care and specific intervention research.⁸

In this new system, dispatchers, EMS personnel, medical providers, public safety officers, and public health officials will be fully interconnected and united in an effort to ensure that each patient receives the most appropriate care, at the optimal location, with the minimum delay.²

Effective EMS research necessitates creating working relationships between EMS researchers and social scientists, economists, health services researchers, epidemiologists, operations experts, clinical scientists, basic scientists, and researchers from other disciplines. Building these relationships requires a dedicated and committed core research group with access to reliable funding sources.⁹

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Rural communities should focus greater attention on improving population health in addition to meeting personal healthcare needs...health care workers should share with other groups the responsibility to work together to achieve population health outcomes.... A core set of health care services (primary care, dental care, basic mental health care, and emergency medical services) should be available within the communities.¹³

Finally, the lack of capacity of rural public health department and a limited rural public safety infrastructure creates a greater reliance on rural EMS personnel to participate in rural disaster preparedness at a broader level than their urban counterparts.¹⁴

EMS and Public Health Bulletin

A Strategy for Enhancing Community Health Care

Throughout 2000 and 2001, a group of nationally recognized health care professionals gathered to consider innovative strategies for improving community health care. Four roundtable discussions were convened, bringing together experts from the public health and emergency medicine professions to identify opportunities for improving the delivery of community health services through collaboration between local EMS and public health professionals.

With leadership from the National Association of EMS Physicians (NAEMSP) and the American Public Health Association (APHA), and support from the National Highway Traffic Safety Administration and the Health Resources and Services Administration, the group articulated the potential value of collaboration between the professions, defining a range of benefits to the general community as well as to the local EMS and public health agencies. The group committed to pursue these benefits, using their combined experience to recommend strategies for local collaboration and their leadership to encourage participation by public health and EMS professionals nationwide.

EMS and Public Health Traditions: Complementary Approaches to the Same Goal

Discussions between the EMS and public health professionals began with a comparison of the basic mission and function of two disciplines. This exchange confirmed their mutual commitment to protecting community health, and pointed out several fundamental differences in their approaches.

Perhaps the key difference between the methods of EMS and public health is the basic approach to health care taken by the two disciplines. EMS is traditionally a reactionary service, optimized to respond quickly and effectively to acute episodes of illness or injury, and relying on a sophisticated public access communication system to detect incidents and target the response. In contrast, public health is primarily proactive, utilizing the epidemiologic method to systematically identify threats to community health, and intervening mainly through manipulation of environmental factors, such as air and water quality, or through strengthening the community immunity to disease.

EMS and public health also differ with respect to the direction of intervention. EMS provides individual patient-based, while public health is a community or population-based service. This difference is evident in the tools used by either group, public health utilizing policy and regulation to guard the community well-being and EMS using a fleet of mobile emergency care providers to deliver a focused response, render quick on-scene care, and transport patients to definitive care facilities.

As the EMS and public health representatives described their missions, it became clear to both groups that the two disciplines are complementary, and not mutually exclusive. For example,

EMS professionals could see obvious benefit in adopting some public health conventions, such as the use of population-based data to identify problems and allocate resources. The public health representatives realized that the traditional EMS assets of mobility and outreach could greatly facilitate the delivery of public health services.

The Ideal Collaboration: Local Focus, Flexible Approach

With enhanced understanding of the nature of one another=s professions, roundtable participants devoted time to considering the ideal objectives for collaboration between EMS and public health services at the local level. Discussion centered on two criteria, the importance of focusing the collaboration on identified community health problems, and the need for local flexibility in defining roles and responsibilities for each discipline to meet these needs.

From both the EMS and public health points of view, the need for community health care to focus on local problems is uppermost. Roundtable participants felt that the specific objectives of collaboration should be determined by a local needs assessment. The community=s comprehensive health care needs should be considered by both EMS and public health administrators, and appropriate areas for joint activities identified.

Roundtable participants agreed that the assignment of specific roles between EMS and public health personnel should be determined locally by agreement between leaders of the two disciplines. The optimal distribution of responsibilities will depend on local factors such as access to target populations, system resources, and health care policies and authority.

Growing Support for Change

Over the past several years, EMS and public health professionals have increasingly turned to non-traditional means for overcoming the challenges facing their health care delivery systems. Increasing health care demands and decreasing resources have motivated far-sighted professionals from both disciplines to consider new strategies for extending the value of existing resources. From the EMS perspective, these ideas were articulated and promoted in the vision document, the *EMS Agenda for the Future*. Public health professionals followed a similar strategic planning process with the Medicine and Public Health Initiative and Healthy People 2010.

The EMS Agenda for the Future

In 1996, the EMS community laid out a vision for the future of emergency medical services, the *EMS Agenda for the Future*. The vision is the result of extensive deliberation and consensus building within the profession and defines an expanded role for EMS in the community. A key element in this projection focuses on the integration of EMS services with other community health care systems, especially public health. The EMS Agenda proposes that this collaboration will extend the effectiveness of both services, multiplying the influence of EMS through the adoption of population-based

intervention strategies, and empowering public health with new community outreach potential.

The Medicine and Public Health Initiative

Recognizing the potential benefits of collaboration between medicine and public health, in 1994 the APHA and the American Medical Association (AMA) established a working alliance to develop innovative solutions to deal with critical health needs. The Medicine and Public Health Initiative has since promoted joint strategic planning and stimulated collaborative efforts at the national, state and local levels.

The Initiative focuses on engaging leading medicine and public health organizations and individuals in efforts to reshape health education, research and practice. The seven primary goals of the initiative are as follows:

Engaging the Community in an effort to change existing thinking within academic health centers, health oriented community organizations, health care delivery systems and providers, and among health care purchasers to focus them on improving the health of the community.

Changing the Education Process by expanding public health's understanding of medicine and medicine's understanding of public health.

Creating Joint Research Efforts by educating clinical and public health researchers, focusing on significant health issues, and promoting public and private funding of research to support conceptual and institutional linkages between public health and medicine.

Devising a Shared View of Health and Illness that provides a conceptual framework for collaboration between the professions.

Working Together in Health Care Provision by developing a framework, including standards and strategies, for integrating health promotion and prevention services and activities into both clinical and community settings.

Jointly Developing Health Care Assessment Measures to improve the quality, effectiveness, and outcomes of health care.

Creating Networks to Translate Ideas into Actions by outlining processes for translating and implementing proposals from the Medicine/Public Health Initiative.

Healthy People 2010

Like the *EMS Agenda for the Future*, Healthy People 2010 is a national plan intended to

focus health care attention and resources on a number of critical objectives. These objectives focus primarily on public health measures, emphasizing two broad population-based goals: increasing the quality and years of healthy life, and eliminating health disparities among segments of the population. With support from the U.S. Department of Health and Human Services, Healthy People 2010 was developed by a consortium of several hundred health agencies and organizations and is now widely endorsed by the public health community. A number of the specific objectives in Healthy People 2010 pertain to emergency health care, including issues such as the accessibility of rapidly responding emergency services, availability of organized systems of trauma care, and the provision of online medical direction for the care of children.

The Benefits of Collaboration

Discussion of the specific benefits of EMS and public health collaboration began with the EMS representatives offering their perspective, which led to a reciprocal viewpoint from the public health professionals, and finally to a joint statement concerning the value to the community.

To the EMS Mission...

Increased Professionalism - a partnership with public health will enhance the professionalism of EMS, expanding the knowledge base of EMS providers and facilitating linkages with academic institutions.

More Analytic Approach - EMS will benefit from experience with the data-driven problem identification and evaluation methods utilized by public health professionals, using data to identify and manage EMS patient safety issues.

Use of Public Health Data for EMS Purposes - public health data will enable EMS to target resources and evaluate interventions more effectively.

New Funding Opportunities - EMS can expand funding possibilities by contributing to public health priorities.

More Satisfaction From Issue Resolution - by adopting the public health approach, EMS providers will have opportunities to become more proactive in community injury and illness prevention programs.

Strong Partnership - public health can be a strong ally, collaborating and coordinating with EMS and other agencies involved in community health issues and helping to increase the recognition of EMS as a community health resource.

Broader Community Perspective - linkage with public health will broaden the outlook and approach of EMS systems from an individual focus to a community perspective.

Expertise - affiliation with public health will offer EMS access to specific technical expertise

such as epidemiology and disease management.

Access to Career Ladder - linkage with public health opens a range of career possibilities for EMS providers who otherwise have limited career-growth opportunities.

Greater Coverage - localized problems and high-risk populations identified through public health data can help EMS target services and expand community coverage.

To the Public Health Mission...

Prevention - EMS providers offer a uniquely credible voice and a ready, mobile workforce for delivering injury or illness prevention messages.

Visibility - public health agencies will benefit from the high level of recognition and exposure that EMS enjoys in the community.

Response Capability - EMS offers a well-developed access and response system that could be used to extend the outreach of public health services.

Rapid Communication - the emergency communications system utilized by EMS could be of great value to public health, particularly during critical community health emergencies.

Data Collection - EMS patient information or medical records can provide nearly instantaneous aggregate data sources for public health surveillance purposes such as assessing the spread of illness symptoms.

Referrals - EMS providers could refer appropriate patients to public health facilities for care or follow-up.

Cost Effectiveness - integrating services and sharing resources will offer opportunities for both public health and EMS to reduce costs and improve the effectiveness of services.

Access to Populations - through the EMS system, public health can take advantage of routine access to a variety of high-risk community populations.

To Community Well-Being...

Reduced Health Care Costs - collaboration between EMS and public health will provide each service with a greater range of resources and options for delivery of services, offering improvements in efficiency and reduced costs.

Greater Accountability - combining responsibilities will reduce uncertainty about roles and improve accountability for community health.

Education - with a simplified delivery system and improved community outreach, consumers will have a better understanding of methods of access to and proper use of the health care

system.

Coverage - combining the unique surveillance and access resources of EMS and public health will allow each service to extend its reach in the community, improving reach into underserved areas and populations.

Security and Stability - by combining resources and responsibilities, EMS and public health can assess the relative value of health services and allocate health care funding to provide the greatest value to the community, ensuring the continued availability of a balanced community health care system.

Access - utilizing public health information to extend the reach of EMS and the mobility of EMS to enhance the delivery of public health services will improve overall community health care access.

Adaptability - with improved surveillance and delivery, a combined EMS and public health system will be capable of quickly detecting and responding to community health needs.

Improved Health - with improved responsiveness, greater efficiency, and enhanced effectiveness, the bottom line is that a collaboration of EMS and public health will lead to improved overall health in the community.

Where It's Working

Roundtable participants pointed out that while EMS and public health collaboration is not yet widespread, the concept has been proven in a number of locations. The group identified a number of specific examples and noted that the alignment of these case studies with specific Healthy People 2010 objectives underlines their relevance to both EMS and public health missions.

Emergency Access and Elderly Care in Metro Dade County

(Aligns with Healthy People 2010 Objective 1-10: Reduce the proportion of persons who delay or have difficulty getting emergency medical care.)

Metro-Dade County, Florida EMS crews have implemented a program to improve emergency response for the community as well as care for the elderly. The elderly are vulnerable to abuse, neglect, and exploitation, and frequently use 9-1-1 out of desperation, trying to reach help for non-medical needs. Through the ELDER-LINKS program, Metro-Dade Fire Rescue crews are trained to evaluate 9-1-1 calls from elderly residents and determine whether their needs could be better met with community-based social services, such as those available from the Area Agency on Aging.

EMS providers are trained to identify signs of abuse, neglect or exploitation and equipped with field assessment tools and referral forms. When EMS providers respond to a 9-1-1 call and

discover a non-emergency need, they look for risk factors indicating underlying problems and refer the case to the ELDER-LINKS program. The elderly caller is then contacted by the Area Agency on Aging and offered services that might include personal care, homemaking care, legal assistance, mental health counseling, transportation, or meals at senior centers.

Over the past several years, Metro-Dade Fire Rescue has referred thousands of elderly residents to the ELDER-LINKS program, improving the quality of life of these community members, and reducing the number of non-emergency 9-1-1 calls. This results in more EMS units available for emergency calls and, consequently, improved response times.

Public Access Automatic External Defibrillator Program in Maine

(Aligns with Healthy People 2010 Objective 1-11: Increase the proportion of persons who have access to rapidly responding prehospital emergency medical services.)

In early 1995, while looking at performance improvement data for cardiac care, Capital Ambulance, serving communities in Penobscot County Maine recognized that a number of system improvements were needed to assure rapid access to early assessment, reduced time to thrombolytic therapy, and earlier defibrillation for patients in cardiac arrest. Penobscot County is primarily rural with a number of small municipalities served by volunteer EMS services.

Working with the two local hospitals, community physicians, fire departments, and municipal first responders, a program was instituted to provide automatic defibrillators for all the local EMS agencies, 12 lead EKG units on primary paramedic units, and receiving stations in base hospitals. Further analysis revealed that often the “first” first responders to medical emergencies in rural communities were County Sheriff units, the only public safety personnel staffed on a 24-hour basis.

With the goal of improving care in the first 5-10 minutes of emergencies, automatic defibrillators and trauma first response kits were pilot tested in four sheriff units. This required a change in Maine EMS Rules to allow response by otherwise unlicensed EMS personnel. After several interventions and a successful resuscitation of a 16 year old, an agreement was reached with a local non-profit organization to equip every sheriff cruiser in the County with a defibrillator and trauma response kit.

EMS and Public Health Collaboration in New Hampshire

(Aligns with Healthy People 2010 Objective Area 7-10: Increase the proportion of tribal and local health service areas or jurisdictions that have established a community health promotion program that addresses multiple Healthy People 2010 focus areas.)

The New Hampshire EMS, Public Health, and Safety Initiative is an outgrowth of the national roundtables sponsored by the National Highway Traffic Safety Administration, the Health Resources and Services Administration, the American Public Health Association, and the National Association of EMS Physicians. Among the first to replicate the national example, New Hampshire began their collaboration in November of 2001.

Leaders of EMS and Public Health from all levels in New Hampshire have since convened with the common mission: "To promote a collaborative community approach to enhance the health and safety of the public."

Advocates for this effort relied on New Hampshire's heritage of collaboration to promote health improvement initiatives utilizing existing models and resources.

Tasks undertaken to date include:

- Collection and organization of case stories of successful collaboration and share them with Roundtable constituencies.
- Organization of resources and contacts to assist community collaboration.
- Development of marketing opportunities to reach those that can benefit from identified programs and resources.
- Promotion of existing resources such as the NH State Library and NH Helpline.

Collaborative efforts have been developed through volunteers and in-kind support. Dedicated funding sources are being pursued to expand activities.

The initial focus for the EMS and public health collaboration is on injury prevention. Injury makes up more than 40 percent of EMS activity in New Hampshire, is a key public health concern, and affects New Hampshire residents of all ages. Leaders of the NH collaboration expect that success in this area will lead to other opportunities for the State's five thousand EMS providers, and the Public Safety and the Public Health community at large. The effort is also expected to improve community health care as well as providing career opportunities for New Hampshire health care professionals.

Crash Injury Research and Engineering Network (CIREN)

(Aligns with Healthy People 2010 Objective Area 15: Reduction in deaths caused by motor vehicle crashes.)

CIREN is a multi-center research program involving collaboration between EMS and trauma care clinicians and engineers in academia, industry, and government. Together, these professionals are pursuing in-depth studies of crashes, injuries, and treatments to improve processes and outcomes. CIREN's mission is fundamentally a public health initiative, to improve the prevention, treatment, and rehabilitation of motor vehicle crash injuries.

CIREN utilizes a computer network to link ten Level 1 Trauma Centers, allowing researchers to review data and share expertise relating vehicle design aspects to injury causation. Results of these analyses are used in the design of safer vehicles. Since its creation in 1996, CIREN studies have contributed to a range of public health benefits, including the development of improved diagnostic tools to recognize occult, or hidden, internal injuries, more accurate recognition of

automatic seat belt-induced liver and spleen injuries for triage & treatment, development of URGENCY software for faster and smarter emergency medical care for crash victims, and improvements in communications and the organization of trauma systems for better care of crash victims.

Elderly Fall Prevention Program in Vermont

(Aligns with Healthy People 2010 Objective Area 15: Reduce hospital emergency department visits caused by injuries.)

Concerned about the frequency of falls among the elderly in their homes, Upper Valley Ambulance, Inc. of Fairlee, Vermont created the program, "Home Sweet Home...Home Safe Home." This is a free program to both identify risks and prevent injuries within the homes of elderly residents.

Through this program, Upper Valley Ambulance educates their crews about the effects of aging, the progressive deterioration of the senses and physiologic reserves, and how to spot potential fall hazards in and around a residence.

Referrals for this service are received from caregivers, family members, social workers, etc. EMS crews perform a routine health exam, and risk assessment of the person's home. They are able to perform these assessments while on duty thus minimizing the cost of providing this service while assuring emergency coverage.

Along with identifying any fall hazards, EMS crews increase the safety awareness of elderly residents by educating them in fall-proofing their homes, making safety recommendations and correcting any obvious or easy to fix problems. EMS crews are also able to gather useful information such as precise directions to the residence, location of a key and access and egress issues. A completed copy of each assessment is kept in the ambulance and in the residence, making the information readily available should it be needed on a call.

San Diego County Serial Inebriate Program

(Aligns with Healthy People 2010 Objective 26-5, (Developmental) Reduce alcohol-related hospital emergency department visits.)

San Diego County EMS providers recently joined other sectors of the health care community in initiating an innovative program that promises to provide better care for chronic inebriates as well as reducing the tremendous burden that this problem was placing on county healthcare resources. Stemming from the efforts of two San Diego County police officers, the Serial Inebriate program began in 2000 with a survey of county businesses and healthcare facilities to estimate the extent and cost of the chronic inebriation problem.

With new awareness of the scale of the problem, county officials assembled a coalition of healthcare, social service, law enforcement, and judicial agencies to design a comprehensive intervention to reduce recidivism, improve treatment, and cut economic costs. The Serial

Inebriate Program engages both law enforcement and EMS in the response to cases of inebriation and, in chronic cases, maintains the involvement of both the legal and healthcare communities through each of a well-defined sequence of care and adjudication steps.

This coordinated approach to the chronic inebriation problem benefits the inebriate, the healthcare system, and the community. The program ensures that chronic inebriates are not turned back to the community before they have received appropriate treatment, drastically reducing the recurring cycles of arrest, emergency department visit, and release that were failing to help the inebriate and draining healthcare resources.

The success of the Serial Inebriation Program can be seen in the sharp increase in the number of chronic cases now entering the county recovery program and in reports of relief and satisfaction from patients, healthcare providers, and law enforcement personnel that had been engaged in these destructive cycles. The key to this success is coordination, engaging EMS with community public health, social services, law enforcement, and adjudication to address common problems with innovative solutions.

Emergency Medical Dispatch as Public Health Access in Atlanta – Fulton County, Georgia
(Aligns with Healthy People 2010 Objective 1-10: Reduce the proportion of persons who delay or have difficulty getting emergency medical care.)

Developments in telecommunications technology have created the potential for on-line public health education and referral services that complement the highly evolved 9-1-1 emergency access system. Since adopting the Medical Priority Dispatch System emergency medical dispatch program, the Fulton County Emergency Communications Center (FCECC) has developed alliances with several community organizations to improve access to community health services. By establishing a direct telecommunication link with these organizations, the 9-1-1 system is now able to match callers' healthcare needs with targeted community services, offer instant and direct referral, and provide an EMS response that is most appropriate for callers' needs. The FCECC has established formal relationships with the following organizations:

- Cardiac arrest calls that meet "Obvious Death" criteria are linked to the Fulton County Medical Examiner's Office.
- "Psychiatric/Abnormal Behavior/Suicide Attempt" calls are linked to the Fulton County Emergency Mental Health Service.
- "Overdose/Poisoning" calls are linked to the Georgia Poison Center.
- Plans are currently underway to transfer a specific subset of the lowest level priority "Sick Person" calls, to the Grady Memorial Hospital Nurse Advice Call Center for further triaging, health education, and disposition.

Where Do We Go From Here?

While convinced of the far-ranging benefits of collaboration, roundtable participants

acknowledged the challenges to achieving widespread unity between EMS and public health. Overcoming the inertia of tradition and the myriad of obstacles to change will require a combination of guidance, motivation, tools, and resources. The group recommends a strategy for initiating this change that includes a well-publicized demonstration program to model and evaluate local implementation strategies, a dual credentialing program to encourage provider participation, and a number of specific tools, resources, and actions to enable local agencies to implement collaborative efforts.

Demonstration Program

Roundtable participants discussed the need for a demonstration program, highlighting potential strategies for collaboration between EMS and public health and providing laboratories for assessing the benefits. The group agreed that a series of such demonstrations should be pursued, focusing on innovative methods for addressing priority public health issues. The approach recommended is a national grant program funded by a private/public partnership. Solicitations could be made among EMS and public health agencies nationwide, with awards made to a comprehensive array of examples.

Dual Credentialing Program

APHA Executive Director, Dr. Mohammad Akhter, revealed plans to establish a new public health credentialing system that will include a specific credential for EMS professionals who achieve public health competencies. The new credentialing program will be built around web-based curricula, and will be available to EMS personnel across the country. This new program promises to facilitate EMS and public health collaboration and expand the career development potential for EMS professionals. The APHA plans to initiate the new program by 2003.

Addressing the Challenges

Roundtable participants described a number of anticipated barriers, and for each identified three types of action that could be taken at either the national, state, or local levels, efforts that would hasten progress through *enhanced knowledge*, *changed attitudes*, or *revised practices*.

Barrier:

Potential for new roles - a greater collaboration between EMS and public health may significantly change existing health care roles and responsibilities and could result in resistance from those who perceive a threat to their job security.

Recommended Actions:

Knowledge: Evidence needs to be generated at the national level to substantiate the need for and effectiveness of EMS and public health integration.

Attitudes: When considering change, professionals from both EMS and public health backgrounds need to remain focused on the benefit to the public rather than the short-

term effect on their individual profession.

Practice: When EMS personnel are practicing public health interventions, public health officials should be involved in EMS oversight activities.

Barrier:

Traditional roles & cultures - overcoming traditions and long-held perceptions may be difficult, especially considering the vast differences in professional environments between EMS and public health providers.

Recommended Actions:

Knowledge: The horizons of both EMS and public health professionals need to be expanded by exposure to the other=s work environment and operations. At the national level, knowledge of one another=s mission and function should be included in the core professional education of each group. At the local level, visitations and ride-alongs should be encouraged to increase mutual understanding and appreciation.

Attitudes: In the longer term, the professional expectations of EMS personnel need to be shifted to include prevention in addition to response. Recruitment methods need to be adjusted to attract professionals who can derive job satisfaction from population-based care activities as well as emergency interventions.

Practice: At the national level, leadership is needed to create career path options for EMS personnel, including a means to acquire knowledge and experience in public health concepts. Incentives need to be institutionalized for encouraging the adoption of public health practices by EMS personnel. In the near term, local systems can encourage motivated EMS personnel to acquire public health knowledge as part of their regular continuing education.

Barrier:

Traditional performance measures - combining professions may mean combining very different performance measures and benchmarks, currently population-based for public health and response-based for EMS.

Recommended Actions:

Knowledge: Curricula and materials are needed to educate both EMS and public health professionals about theories and methods of performance measurement of the other discipline. EMS personnel need to be aware of their role in contributing to the Healthy People 2010 objectives, especially those addressing Access to Quality Health Services and Injury and Violence Prevention. Instructional materials are also needed for educating EMS professionals about public health methods, such as the use of population-based data. Public health personnel need additional training regarding the capabilities and resources of the EMS system, and regarding the potential for EMS activities to

contribute to public health goals.

Attitudes:

Public safety officials need to be receptive of public health leadership with regard to the selection of performance criterion for EMS, resulting in more use of population-based assessments such as injury incidence, and less use of specific operational measures such as response times.

Practice:

Public health leaders should encourage the profession to extend its concern to include injury problems, especially motor vehicle crashes. Both EMS and public health systems should develop means for feeding back performance information to the providers, to stimulate improvement and reinforce the importance of measurement. Public health and EMS professionals should collaborate on the identification of measures, which cross professional lines, such as using emergency department waiting times as a measure of health care access.

Barrier:

Limited funds - scarce resources for traditional core services for both EMS and public health may limit interest or ability to adopt roles, which are viewed as expanded scope.

Recommended Actions:

Knowledge: Compelling evidence needs to be generated to persuade potential funders to invest in joint EMS and public health activities. Funders could include state and local EMS and public health agencies, Federal agencies, and private foundations. Research and evaluation is needed to document economic benefits of collaboration.

Attitudes: Funding limitations should be seen as a reason to move forward rather than as justification for reluctance. With reduced funds available, we need to re-examine core services and search more methods to extend service efficiency. EMS and public health collaboration may reduce demand for core services and reduce health care costs.

Practice: Examples of low-cost best practices should be identified and documented. Research should be conducted to assess the effect of EMS and public health collaboration on overall community health care costs. Compelling presentations of the benefits of collaboration should be made to payers such as Medicaid, Medicare, and insurance groups.

Barrier:

Lack of Cross Training – The education of EMS and public health personnel has not traditionally addressed the theories and practice of one another's profession.

Recommended Actions:

Knowledge: The core curricula of each profession need to be updated to include

information on the other. Public health professionals need to be aware of the methods and operation of EMS, as well as the benefits of collaboration. Likewise, EMS professionals need to be instructed concerning the population-based approach of public health and how these methods can enhance the effectiveness of EMS services.

Attitudes: Both EMS and public health professionals need to appreciate the complementary nature of the two fields and overcome biases toward one or the other approach. Professionals from both fields need to understand and be tolerant of the perspectives of the other field.

Practice: Promote dual credentialing of EMS and public health professionals. Advance web-based programs from schools of public health to make training more accessible for EMS providers. Evaluate the effectiveness of on-line courses and refine web-based learning methods.

Barrier:

Legislative Support - state or local statutes and regulations may prevent effective collaboration between EMS and public health, such as those that prevent EMS personnel from administering vaccinations or limit EMS reimbursement to patient transport.

Recommended Actions:

Knowledge: Federal, State and local policymakers should be educated about the efficiencies of these methods, and made aware of rules, regulations, and legislation that directly or indirectly prevent collaboration.

Attitudes: Policymakers need to look beyond individual health care functions to recognize the implications of cross-functional collaboration on overall community health and safety. Both EMS and public health professionals need to become aggressive about championing the cause.

Practice: EMS and public health professionals need to work with organizations such as the National Council of State Legislatures to identify opportunities for increasing policymaker awareness.

Barrier:

Communication - EMS and public health have few established mechanisms to share information or ideas, such as common forums and organizations, data systems, or operational protocols that bring the two groups together.

Recommended Actions:

Knowledge: Increased awareness is needed among both EMS and public health professions regarding the need for communication and the importance of opportunities for sharing information.

Attitudes: In order to overcome traditional barriers to information flow between public health and EMS agencies, professionals from both fields need to recognize the benefits of information sharing and consider including the other in routine briefings, reports, and data dissemination.

Practice: EMS and public health officials should extend invitations and encourage participation of the other field in appropriate national, state and local EMS and public health meetings, conferences, and other events. They should also develop interdisciplinary health policy councils and remove administrative impediments to routine sharing of EMS and public health data.

Barrier:

Range of Community Needs - the specific nature of a local EMS and public health collaboration will likely be shaped by community needs, complicating efforts to produce easily adopted or transferred models for integration.

Recommended Actions:

Knowledge: EMS and public health professionals should be aware of techniques for interpreting and implementing national guidelines at the local level. Guidelines should be constructed to allow a range of implementation approaches depending on local EMS and public health resources.

Attitudes: EMS and public health professionals should be aware of the concepts underlying their collaboration and be flexible and innovative in their application. Health care providers should be cognizant of the spectrum of health care services needed by the community.

Practice: The two disciplines should collaborate on eliminating health care discrepancies in the community. They should work together to evaluate the needs of underserved populations and formulate national guidelines to promote their flexible application.

Barrier:

Awareness of the Need for Collaboration - to date, there has been little call for collaboration of EMS and public health from within either profession or from the community.

Recommended Actions:

Knowledge: Health care policymakers as well as national EMS and public health leaders should be educated concerning the complementary roles of the two professions and of the potential benefits of collaboration.

Attitudes: Health care professionals need to expand their scope of concern beyond the traditional EMS- or public health-specific measures to include an assessment of overall

community health. Program and budget justifications should consider effects on community health and administrative impediments to collaboration should be eliminated.

Practice: Publicize collaborative efforts to increase public and policymaker awareness of progressive health care practices. Utilize available opportunities, such as seasonal flu epidemics, to demonstrate benefits of a partnership between EMS and public health.

Postscript:

The EMS & Public Health Roundtable Series was completed prior to the events of September 11, 2001. The terrorist attacks on the United States have underlined the need for the very types of collaboration that were discussed and proposed during these roundtables. Never has there been a more critical need for EMS and public health to collaborate on our common mission of protecting and caring for our communities.

In response to this urgent need, three of the organizations involved in the EMS & Public Health Roundtables, the American Public Health Association, the National Association of EMS Physicians, and the National Association of State EMS Directors established a Memorandum of Understanding in November 2001 to combine resources for addressing priority infrastructure needs. The groups have since organized a multidisciplinary coalition of medical and responder organizations that is developing educational tools for front line medical and public safety personnel. Only through this sort of collaboration at the local, state, and national levels will health services in the United States be able to adequately respond to community needs, especially those associated with future attacks of terrorism.

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EMS & Public Health: Building a Partnership for Community Health Care **Introduction**

On April 28, 2000 an unprecedented event took place which promises to have far reaching implications for health care. For the first time, representatives of national emergency medical services (EMS) and public health organizations came together to discuss strategies for joining forces to improve community health.

The meeting was the first step in a series of planned discussions between EMS and public health officials intended to lay out a strategy for combining the strengths of these dissimilar, but complementary services. The goal is to document the best thinking of a group of national experts so that their advice might be used to guide the actions of community health care providers across the country.

This milestone effort is being jointly sponsored by the National Highway Traffic Safety Administration (NHTSA) and the Health Resources and Services Administration (HRSA) and led by the American Public Health Association (APHA) and the National Association of EMS Physicians (NAEMSP). A series of four meetings is planned with the outcome of each discussion documented and distributed for consideration by local care providers.

Background

Communities struggle continuously to provide their population with the very best health care. Federal, state, and local programs are balanced with privately-supported delivery systems in an attempt to provide a healthy community environment, comprehensive illness and injury prevention, quality medical services, and fast and effective emergency care.

These components of our community health care system developed independently and in most cases remain isolated from one another in management and operation. As health care resources become more scarce and community health expectations continue to increase, health care administrators and providers are searching for opportunities to eliminate redundancies, extend the value of services, and target delivery efforts for greater cost effectiveness. One such opportunity may be closer collaboration between community public health and EMS.

EMS and public health approach a similar challenge from different directions. Public health traditionally seeks to improve community health by monitoring population trends and manipulating environmental factors to prevent the spread of illness or injury agents. Public health provides proactive, population-based services. In contrast, EMS delivers reactive, individual-based health care. Where public health seeks to prevent the spread of illness or injury among the population, EMS is configured to deliver a fast response to individual victims.

Along with their differences in approach, EMS and public health services have developed very dissimilar operational structures, with public health emphasizing data collection, centralized health monitoring, and population-based interventions, and EMS stressing individual emergency

access and one-on-one intervention.

Recently, EMS and public health professionals have recognized the potential benefit of integrating these services to improve the delivery of community health care. Far-sighted professionals from both disciplines began to envision how a collaboration between these complementary services could result not only in improved efficiency for their traditional functions, but also in increased opportunities for reaching underserved segments of the community. Several initiatives were undertaken to define the nature of this partnership and build interest and commitment among the public health and EMS professions.

The EMS Agenda for the Future

In 1996, the EMS professional community laid out a vision for the future of emergency medical services, the *EMS Agenda for the Future*. The vision was the result of extensive deliberation and consensus building within the profession and defined an expanded role for EMS in the community. A key element in this projection focused on the integration of EMS services with other community health care systems, especially public health. The EMS Agenda proposed that this collaboration would extend the effectiveness of both services, multiplying the influence of EMS through the adoption of population-based intervention strategies, and empowering public health with new community outreach potential.

The Medicine and Public Health Initiative

Recognizing the potential benefits of a collaboration between medicine and public health, in 1994 the APHA and the American Medical Association (AMA) established a working alliance to develop innovative solutions to deal with the health needs of the people of the United States. The Medicine and Public Health Initiative has since promoted joint strategic planning and stimulated collaborative efforts at the national, state and local levels.

The Initiative focuses on engaging leading medicine and public health organizations and individuals in efforts to reshape health education, research and practice. The seven primary goals of the initiative are as follows:

Engaging the Community in an effort to change existing thinking within academic health centers, health oriented community organizations, health care delivery systems and providers, and among health care purchasers to focus them on improving the health of the community.

Changing the Education Process by expanding public health's understanding of medicine and medicine's understanding of public health.

Creating Joint Research Efforts by educating clinical and public health researchers, focusing on significant health issues, and promoting public and private funding of research supporting conceptual and institutional linkages between public health and medicine.

Devising a Shared View of Health and Illness that provides a conceptual framework for collaboration between the professions.

Working Together in Health Care Provision by developing a framework, including standards and strategies, for integrating health promotion and prevention services and activities into both clinical and community settings.

Jointly Developing Health Care Assessment Measures to improve the quality, effectiveness, and outcome measures of health care.

Creating Networks to Translate Ideas into Actions by outlining processes for translating and implementing proposals from the Medicine/Public Health Initiative.

The First Meeting

Nearly forty health care professionals representing a range of EMS and public health specialties gathered on April 28 at the Washington, D.C. offices of the American Public Health Association. Following a welcome by hosts Dr. Mohammad Akhter, Executive Director of the APHA and Dr. Jon Krohmer, President of the NAEMSP, the group took a step toward partnership by sharing thoughts on opportunities and benefits anticipated as a result of an EMS and public health collaboration.

“Coming from a background of both EMS and public health, I can clearly see the need - and benefit - of adding to one another’s activities. I am sure that we all here agree on this. It will be our responsibility as stewards of this movement to take the word from this roundtable and carry it to our constituencies”

Mohammad Akhter, MD, MPH

“EMS is changing every day to meet the needs of our growing communities. Like other areas of health care, we are facing escalating demands for service without commensurate increases in system resources. We need to find better ways of doing things to stretch our community value. A collaboration with public health will be key to doing more with less”

Jon Krohmer, MD

Mutual Commitment

One of the first accomplishments of the roundtable was to confirm a sense of mutual commitment among the representatives of the two disciplines. Participants were quick to emphasize the obvious advantages of combining strengths.

“It is essential that this group create a model for the future integration of EMS and public health. We will be building a new matrix of health care delivery and we need to

define our respective roles - first among ourselves and then among our peers”
EMS Participant

In his keynote address at the first roundtable, Dr. Ricardo Martinez, Senior Vice President for Health Affairs at Healtheon WebMD, reminded the group:

“EMS and public health each have strong histories of community service and well developed methods for delivering health care. Public expectations are changing and our health care systems need to keep pace. It makes sense now to combine our community resources in the right way to provide the best care. Linking the strengths of public health with those of EMS is the right way.”

Ricardo Martinez, MD

Both EMS and public health representatives emphatically pointed out the potential value of a collaboration of EMS and public health. While acknowledging the challenges to be faced in changing the traditions of these professions, the experts expressed confidence in the ultimate success of this movement.

“This will be a profound shift for each system, but no one system can improve the health of the people. We need to look carefully at how we can bring EMS and public health together and design a single health care delivery system with shared responsibility and shared accountability.”

Public Health Participant

Convinced of the benefit of integrating EMS and public health, roundtable participants eagerly accepted the challenge of developing guidelines to shape the collaboration. To structure their deliberations, the experts chose to first consider the specific advantages that a community would realize from this change, then identify the types of challenges which must be overcome to implement the change. Finally, they will develop strategies for overcoming these barriers and propose an action plan for mobilizing communities.

Anticipated Benefits

Discussion of the specific benefits of EMS and public health integration began with the EMS representatives offering their perspective, which led to a reciprocal viewpoint from the public health professionals, and finally to a joint statement concerning the value to the community.

How Will Integration Help EMS With Its Mission?

Increased Professionalism - a partnership with public health will enhance the professionalism of EMS, expanding the knowledge base of EMS providers and facilitating linkages with academic institutions.

More Analytic Approach - EMS will benefit from experience with the data-driven problem

identification and evaluation methods utilized by public health professionals, using data to identify and manage EMS patient safety issues.

Use of Public Health Data for EMS Purposes - public health data will enable EMS to target resources and evaluate interventions.

New Funding Opportunities - EMS can expand funding possibilities by contributing to public health priorities.

More Satisfaction From Issue Resolution - by adopting the public health approach, EMS providers will have opportunities to become more proactive in community injury and illness control.

Strong Leadership - public health will provide leadership and coordination for EMS and other agencies involved in community health issues and at the same time increase the recognition of EMS as a community health resource.

Broader Community Perspective - linkage with public health will broaden the outlook and approach of EMS systems from an individual focus to a community perspective.

Expertise - affiliation with public health will offer EMS access to specific technical expertise such as epidemiology and disease management.

Access to Career Ladder - linkage with public health opens a range of career possibilities for EMS providers who otherwise have limited opportunities.

Greater Coverage - localized problems and high risk populations identified through public health data can help EMS target services and expand community coverage.

How Will Integration Help Public Health Fulfill Its Mission?

Prevention - EMS providers offer a uniquely credible voice and a ready, mobile workforce for delivering injury or illness prevention messages.

Visibility - public health agencies will benefit from the high level of recognition and exposure that EMS enjoys in the community.

Response Capability - EMS offers a well developed access and response system that could be used to extend the outreach of public health services.

Rapid Communication - the emergency communications system utilized by EMS could be of great value to public health, particularly during critical community health emergencies.

Data Collection - EMS run reports can provide nearly instantaneous data input for public health purposes such as assessing the spread of illness symptoms.

Referrals - EMS providers could refer appropriate patients to public health facilities for care or

follow-up.

Cost Effectiveness - integrating services and sharing resources will offer opportunities for both public health and EMS to reduce costs and improve the effectiveness of services.

Access to Populations - through the EMS system, public health can take advantage of routine access to a variety of high risk community populations.

How Will Integration Help the Community?

Reduced Health Care Costs - a collaboration between EMS and public health will provide each service with a greater range of resources and options for delivery of services, offering improvements in efficiency and reduced costs.

Greater Accountability - combining responsibilities will reduce uncertainty about roles and improve accountability for community health.

Education - with a simplified delivery system and improved community outreach, consumers will have a better understanding of methods of access and proper use of the health care system.

Coverage - combining the unique surveillance and access resources of EMS and public health will allow each service to extend its reach in the community, improving reach into underserved areas and populations.

Security and Stability - by combining resources and responsibilities, EMS and public health can assess the relative value of health services and allocate health care funding to provide the greatest value to the community, ensuring the continued availability of a balanced community health care system.

Access - utilizing public health information to extend the reach of EMS and the mobility of EMS to enhance the delivery of public health services will improve overall community health care access.

Adaptability - with improved surveillance and delivery, a combined EMS and public health system will be capable of quickly detecting and responding to community health needs.

Improved Health - with improved responsiveness, greater efficiency, and enhanced effectiveness, the bottom line is that a collaboration of EMS and public health will lead to improved health in the community.

Challenges to Integration

While convinced of the far-ranging benefits of integration, roundtable participants acknowledged that there will be challenges to achieving widespread collaboration of EMS and public health.

The group characterized these barriers as follows:

Potential for new roles - a greater collaboration between EMS and public health may significantly change existing health care roles and responsibilities and could result in resistance from those who perceive a threat to their job or security.

Traditional roles & cultures - overcoming traditions and long-held perceptions may be difficult, especially considering the vast differences in professional environments between EMS and public health providers.

Traditional performance measures - combining professions may mean combining very different performance measures and benchmarks, population-based for public health and response-based for EMS.

Limited funds - scarce resources for traditional core services for both EMS and public health may limit interest or ability to adopt roles which are viewed as expanded scope.

EMS Industry Turmoil - with the rate of change brought on by managed care and the new HCFA reimbursement policies, EMS agencies may not be able to devote attention to new ideas.

Lack of Cross Training - EMS personnel receive little education concerning the theories or practice of public health - and vice versa - so a collaboration will require a period of learning.

Legislative Support - state or local statutes and regulations may prevent an effective integration of EMS and public health, such as those that would prevent EMS personnel from administering vaccinations or limit EMS reimbursement to patient transport.

Communication - EMS and public health have few established mechanisms to share information or ideas, such as common forums and organizations, data systems, or operational protocols that bring the two groups together.

Range of Community Needs - the specific nature of a local EMS and public health collaboration will likely be shaped by community needs, complicating efforts to produce models for integration.

Awareness of the Need for Collaboration - to date, there has been little call for collaboration of EMS and public health from within either profession or from the community.

Next Steps

Encouraged by the enthusiasm from both EMS and public health representatives, roundtable participants laid out a plan for a series of meetings to systematically consider strategies for fostering a collaboration of the two professions. The group determined that the end result of these meetings should be a set of guidelines or recommendations for use by local health care providers.

Three additional meetings were planned with the next to take place in conjunction with the APHA Annual Conference in Boston in mid-November. The third meeting will be conducted as part of the NAEMSP Annual Conference in Sanibel Island, Florida in January 2001, and the final meeting is tentatively planned for Washington, D.C. in the spring of 2001.

As a strategy for working through these issues, the group decided to turn its attention to the challenges listed during the first roundtable discussion. Consequently, the November meeting will focus on these barriers to collaboration and consider methods for overcoming resistance and fostering a productive collaboration between EMS and public health.

Participants in the First EMS and Public Health Roundtable

Mohammad Akhter, MD
American Public Health Association

Jay Glasser, PhD
University of Texas

Robert Bass, MD
Maryland Institute for EMS Services

Jay Goldman, MD
Kaiser Permanente

Les Becker, PhD
Pacific Institute for Research and Evaluation

Jon Krohmer, MD
National Association of EMS Physicians

Michael Bird, MSW, MPH
Santa Fe Public Health Service

Richard Levinson, MD
American Public Health Association

Lawrence Brown, EMT-P
State University of New York

Lewis Margolis, MD
University of North Carolina School of
Public Health

Fernando Daniels, MD
District of Columbia Fire and EMS

Ricardo Martinez, MD
Healtheon WebMD

Drew Dawson
Montana Department of Public Health

Ted Delbridge, MD
University of Pittsburgh

Susan McHenry
National Highway Traffic Safety
Administration

Norm Dinerman, MD
Eastern Maine Medical Center

Mark Meijer
American Ambulance Association

James Dunford, MD
University of California at San Diego

Jeff Michael, EdD
National Highway Traffic Safety
Administration

Arthur French, MD
National Highway Traffic Safety
Administration

Frank Mitchell, MD

University of Missouri Hospital

Jane Moore
Association of State and Territorial Health
Officials

Lori Moore, MPH, EMT-P
International Association of Fire Fighters

Wayne Moore, MD
Metropolitan Nashville General Hospital

Harvey Sloane, MD
Project Hope

Jan Wallinder, RN, MSN
Multnomah County, OR Health

Depart
ment

Barak Wolff
New Mexico Department of Health

Arthur Yancey, MD
Emory University

EMS and PUBLIC Health Bulletin

A Strategy for Enhancing Community Health Care

The fourth and final roundtable was held in July 2001 in Washington, DC. As with the previous three meetings, participants from both Emergency Medical Services and Public Health participated in the meeting. Continued goals are the identification of opportunities to improve the delivery of community health services through the collaboration between local EMS and public health professionals.

Leadership for the roundtable was provided by the National Association of EMS Physicians (NAEMSP) and the American Public Health Association (APHA), and support from the National Highway Traffic Safety Administration and the Health Resources and Services Administration. The group is committed to combining the experience of both EMS and Public Health professions by identifying six to ten demonstrations of public health and EMS collaboration in fiscal year 2002.

Committee Membership

Group discussed the advantages and disadvantages of bringing a more diverse group of professionals, such as commerce, industry to the table. Original thought with extending the group was to obtain easier community buy in on initiatives. Drawback to having more people from various backgrounds is the inability to reach consensus on major issues and initiatives. Group opted to maintain membership with EMS and Public Health professionals and opt for focused projects that will be readily accepted by communities.

Healthy People 2010

HP2010 is a way of highlighting successful, innovative projects that are directly related to objectives set out by HP2010. Group discussed concepts for projects that could be developed into six to ten focused demonstrations. Topics are discussed below:

- Injury prevention/treatment: Topic has common tie-ins with EMS, public health, the community and industry. Educate the public on common injuries that occur in the home and ways to prevent/ treat them. Distribution of fire detectors to homes in a neighborhood.
- Wellness fairs: Performing tasks such as cholesterol and glucose testing, measuring blood pressure, informing the public about stroke and cardiac arrest (MI), bone density screening and teenage suicide screening.
- Transport of the elderly for non-emergency runs that can turn out to be emergencies if delayed or patient opts not to make arrangement for their own transport. Increases community wellness and visibility for crews performing the tasks. Work together to improve access to care and transportation resources.

- Weapons of Mass Destruction (WMD): EMS/ public health response during and after mass casualty/ WMD event. Increased scope of care provided by EMS professionals in WMD event.
- Medical/New EMS protocols: Implementation of pediatric protocols. Increase number of medications available for administration by EMS crews.
- Training: Implement ladder type public health training for EMS personnel and offer EMS related training/exposure to public health officials.
- 911: Work with community to enhance 911 capabilities. Identify areas with delayed response times. Encourage communities with delayed EMS times to purchase AEDs and provide community training on their use.
- Poison Control: Implementation of one 800 number for that the public can call for potential poison exposure.

Project Considerations

Group was asked to consider the following and sub-components for each of the discussed topics for potential demonstration projects:

- Limited Funds: Should the concept be changed from expanded scope to added value services & value to the organization
 - Knowledge
 - Attitudes
 - Practices
- Lack of Cross Training –Training (where others see trouble, we see possible funding)
 - Knowledge
 - Attitudes
 - Practices
- Legislative Support
 - Knowledge
 - Attitudes
 - Practices
- Communications (should co-credentialing of EMS and PH be tied somehow to the 911 communications process)
 - Knowledge
 - Attitudes
 - Practices

- Range of Community Needs (this is a PLUS – not a barrier)
 - Knowledge
 - Attitudes
 - Practices

- Awareness of Need
 - Knowledge
 - Attitudes
 - Practices

Demonstration Program

Demonstration programs must have the following elements to be successful:

- ✓ Credibility: show that it can be done
- ✓ Purpose: demonstrate effectiveness
- ✓ Demonstrate feasibility
- ✓ Have measurable outcomes

Collaboration on Projects

Group should consider entities such as insurance companies, EMS community, PH community, government, legislature and businesses for the demonstration projects.

Areas to Focus on For Improving the Health Care of Americans

- Chronic illnesses
- Access to care
- Substance abuse

Dual Credentialling

- 78 different credentials available in the public health community
- Will be web based for easier access
- Will have three levels of public health in the workforce:
 - Secretary/clerks: orientation to PH issues
 - Level I: basic concepts of population work – most PH workers
 - Level II: program directors – graduate degree... MPH equivalent
- On going process right now

Where Do We Go From Here?

- Document completion: writing group revision
- Self-promotion of the group and its efforts: present at respective conferences and other related conferences.
- Demonstration projects: go from concept paper to marketing
- Dual credentialing: on-going process, may need input in the future.

Recommendations

- Replicate the group's process at both state and local levels
- Consider coordinating a national meeting of state directors, EMS physicians, NACO and NOSTHO and appropriate organizations



National Association of EMS Physicians®

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May 30, 2012

Secretary
NFPA Standards Council
1 Batterymarch Park
Quincy, MA 02169

Comment No. 3

Dear Secretary:

I am writing to comment on the proposed establishment of "A Guide for the Development of Community Paramedicine Programs" on behalf of the National Association of EMS Physicians®.

The NAEMSP® is an international organization of physicians and other professionals partnering to provide leadership and foster excellence in out-of-hospital emergency medical services. Dr. David Tan has represented our organization admirably on the NFPA EMS-AAA TC. As thought leaders in the dynamic health care environment of EMS, NAEMSP® takes pride in bringing its medical expertise to innovative programs such as Community Paramedicine and desires to inform the influential NFPA guideline process.

It is hoped that these novel programs will fill an important gap in our health care systems; however, the question must be raised, "Is it premature to begin the NFPA Guideline process on Community Paramedicine?" The application states that data on Community Paramedicine Programs are "sparse where no formal study has been done to evaluate this subject." This lack of evidence proposes a conundrum to the NAEMSP® and NFPA. Clearly NAEMSP® wishes to offer its expertise to the project, yet this advice, candidly, would be based on little science.

We believe the necessary evidence to initiate the guideline process is just beginning to become available. For example, the CMS Innovation Center has announced its first round of Health Care Innovation Awards. The Upper San Juan Health Service District will receive \$1,724,581 to expand access to specialists and improve the quality of acute care in rural and remote areas of southwestern Colorado. This 3 year project will train 25 Paramedics to become a new type of clinical team that will improve care outcomes for rural cardiovascular patients. It is estimated that this Community Paramedicine Program will achieve a remarkable \$8.1 million savings. Well documented and evaluated programs such as this must be scrutinized prior to national guideline development.

In closing, I wish to reaffirm Dr. Tan's and NAEMSP® support of Community Paramedicine when more evidence exists in order to meet the NFPA guideline-making standards.

Sincerely,

Ronald G. Pirrallo, MD, MHSA
President

679 Encinitas Blvd., Ste. 211 | Encinitas, CA 92024

760-632-7375 | info@nemsma.org

Office of the President
Wake County Public Safety Center
331 S. McDowell Street
Raleigh, NC 27601
(919) 856-6026
skip.kirkwood@wakegov.com

Comment No. 4

June 4, 2012

Secretary
NFPA Standards Council
1 Batterymarch Park
Quincy, MA 02169

Ladies and Gentlemen:

I am writing to comment on the proposed creation of "A Guide for the Development of Community Paramedicine Programs" by the NFPA.

The National EMS Management Association (NEMSMA) is an organization of EMS leaders representing all sectors of the EMS community (hospitals, not-for-profit, governmental services, fire services, and private for profit). Our members, particularly Past President Gary Wingrove, are deeply involved in the development of community paramedicine programs.

Implementation of community paramedicine programs across the United States is in its infancy. The number of programs with "boots on the ground" today is probably less than a dozen. Thus far, each model is uniquely tailored to the health needs of the particular community and EMS system that it serves.

It is hoped that these novel programs will fill an important gap in our health care systems; however, we believe that it is premature to begin the development of standards or program guidelines. The application states that data on community paramedicine programs are "sparse where no formal study has been done to evaluate this subject." This lack of evidence proposes a conundrum to the NEMSMA and NFPA. Clearly NEMSMA wishes to offer its expertise to the project, yet any advice that we might offer would be based on little or no science. Both NEMSMA and NFPA believe that standards and guidelines should be developed based on scientific evidence, but there is as yet none available to us.

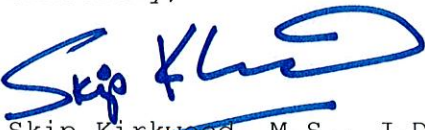
We believe the necessary evidence to initiate the guideline process is just beginning to become available. For example, the Centers for Medicare and Medicaid Innovation (CMMS) has announced its first round of

Health Care Innovation Awards. Several community paramedicine programs have been funded in the first round, and others are being organized for field testing under a Rand Corporation initiative. Well documented and thoroughly evaluated programs must be scrutinized prior to national guideline development.

Accordingly, we submit that the proposed development of a standard or guidelines is premature, and should be postponed until a sufficient base of peer-reviewed knowledge about the benefits of such programs can be established. These will then form the basis for a standard or guideline that will be useful to the EMS community.

Thank you.

Sincerely,



Skip Kirkwood, M.S., J.D., EMT-P, EFO, CEMSO
President



June 14, 2012

Comment No. 5

Secretary
NFPA Standards Council
1 Batterymarch Park
Quincy, MA 02169

Dear Secretary:

I am writing to comment on the proposed establishment of "A Guide for the Development of Community Paramedicine Programs" on behalf of the National Association of Emergency Medical Technicians (NAEMT).

Formed in 1975 and more than 32,000 members strong, NAEMT is the nation's only organization solely dedicated to representing the professional interests of all EMS practitioners, including paramedics, emergency medical technicians, emergency medical responders and other professionals working in prehospital emergency medicine. NAEMT members work in all sectors of EMS, including government service agencies, fire departments, hospital-based ambulance services, private companies, industrial and special operations settings, and in the military.

We applaud and support the innovative work that is being conducted across the country and around the globe to explore alternative approaches to delivering patient care that is both cost effective and high quality. We believe that Community Paramedicine is an approach that may fill an important gap in our health care systems. However, we feel that the establishment of a guide on Community Paramedicine is premature and should not be undertaken at this time. Although a variety of Community Paramedicine programs exist, there is a lack of independent data on these programs from which guidelines could be developed.

The CMS Innovation Center has announced its first round of Health Care Innovation Awards. The Upper San Juan Health Service District will receive a \$1.7 million grant to expand access to specialists and improve the quality of acute care in rural and remote areas of southwestern Colorado. This three year project will train 25 Paramedics as new type of clinical team designed to improve care outcomes for rural cardiovascular patients. It is estimated that this program will result in \$8.1 million savings. Well documented and evaluated programs such as this will provide the kind of data needed to develop national guidelines.

Thank you very much for allowing NAEMT the opportunity to comment. Please feel free to contact me if you have any questions.

Sincerely,

Connie Meyer
President, NAEMT

Maynard, Mary

From: Rick Murray [rmurray@acep.org]
Sent: Friday, June 01, 2012 9:35 PM
To: stds_admin
Subject: Guide for the Development of Community Paramedicine Programs

Comment No. 6

The American College of Emergency Physicians (ACEP) would like to express support for the project to develop a Guide for the Development of Community Paramedicine Programs. ACEP is currently working on a similar document and feels a national guidance document or policy is needed in this area. We believe the information contained in the New Project Initiation Form is complete and accurate and addresses the issue and identifies the needed stakeholder groups. We are very interested in participating in this project and serving on the committee, if formed.

Rick Murray, LP, EMT-P
Director, Dept of EMS and Disaster Preparedness
American College of Emergency Physicians
800-798-1822 ext. 3260

www.acep.org

rmurray@acep.org

ACEP - Advancing Emergency Care



Maynard, Mary

Subject: FW: NFPA Community Paramedicine public input request.

From: "Gary.Ludwig@memphistn.gov" <Gary.Ludwig@memphistn.gov>
To: "Holland, Kendall" <kholland@NFPA.org>
Cc: "mlight@iafc.org" <mlight@iafc.org>, "dsbeckermo@msn.com" <dsbeckermo@msn.com>, "jds606@aol.com" <jds606@aol.com>, "ncroom@cr.gov" <ncroom@cr.gov>, "mmetro@fire.lacounty.gov" <mmetro@fire.lacounty.gov>, "klasala@iafc.org" <klasala@iafc.org>, "jtlindsey1@aol.com" <jtlindsey1@aol.com>
Sent: Thu, May 31, 2012 12:52:20 GMT+00:00
Subject: RE: NFPA Community Paramedicine public input request.

Comment No. 7

Ken - it was good seeing you yesterday at the NEMSAC meeting.

In response to your request - yes, I believe the NFPA should convene a committee to establish a "Guide to Community Paramedicine." This is an emerging issue that I believe will have a dramatic impact on the fire service in the future. The move is toward Accountable Care Organizations (ACO) with the goal of not returning a patient to the hospital after their initial care. Hospitals will be penalized financially if a patient returns. Therefore, I envision hospitals in the future partnering with fire agencies to deliver care in the field under treat and release programs. If the fire service is not involved, other EMS agencies will step into that void. The other part of community paramedicine will be to serve rural or under-served areas. Again, this will have an impact on fire organizations that serve these areas.

The EMS Section has convened a committee for the purposes of advising and making recommendations to the EMS Section Executive Board so that we can make recommendations and provide guidance to the IAFC as the parent organization. If we can be of any assistance if the NFPA decides to move forward with this project, please let me know.

Gary Ludwig
Deputy Fire Chief
Memphis Fire Department



INTERNATIONAL ASSOCIATION OF FIRE FIGHTERS

HAROLD A. SCHAITBERGER
General President

Attachment 12-8-49

Page 131 of 143

THOMAS H. MILLER
General Secretary-Treasurer

Comment No. 8

June 11, 2012

Codes and Standards Administration Department
NFPA
1 Batterymarch Park
Quincy, MA 02169-7471

Dear NFPA Codes and Standards Administration Department,

The IAFF believes that a standard on 'community paramedics' is necessary. In today's economically strained environment, fire-based EMS systems must continue to diversify to meet the needs in their communities.

We support the concept and understand that there is a great need for expanded scope of services provided by EMS professionals in many communities. Additionally, we agree that the Patient Protection and Affordable Care Act provides opportunity for fire department-based EMS to serve local communities with the potential for a revenue source not previously available.

The IAFF also believes that fire departments creating such programs should not do so at the expense of existing 9-1-1 response resources and that the success of such programs will be based on the definition of 'Community Paramedic' that stems from the NFPA effort.

The first step taken by any technical committee established should be to research examples of such programs that already exist including any enabling laws in place (i.e. Minnesota and Alaska). NFPA should research existing expanded scope models, review laws and regulations that exist, identify best practices, and then prepare a standard for the fire service. NFPA should prepare a standard that sets the minimum education and scope of practice describing these new paramedic opportunities and should also include potential revenue sources available.

It should also be noted that in communities seeking to employ such expanded programs, the workload increase should be recognized and compensation should be commensurate with revenue gained.

The IAFF has taken an official position on the matter as stated below.

The IAFF will continue to identify and evaluate opportunities to expand or enhance the services provided by IAFF affiliates, members or fire service-based EMS systems without sacrificing the core missions of the fire service which are protection of life and property through fire suppression and prevention, and emergency medical response, care and transport.

Codes and Standards Administration Department
Page 2
June 11, 2012

We will provide representatives as allotted for any technical committee established.

Please forward any questions to my attention.

Sincerely,

A handwritten signature in cursive script that reads "Lori Moore-Merrell". The signature is written in black ink and is positioned above the printed name.

Dr. Lori Moore-Merrell
Assistant to the General President
International Association of Fire Fighters

Potential Organizations that may provide input
--

Mr.	Andy	Carter	President and Chief Executive Officer	Visiting Nurse Associations of America
Ms.	Lori	Moore-Merrell		International Association of Fire Fighters
Mr.	Edward	Plaugher		International Association of Fire Chiefs
Mr.	Gary	Ludwig	Deputy Chief of EMS	International Association of Fire Chiefs
Mr.	Tony	Baker	EMS Section Liaison	International Association of Fire Chiefs
Ms.	Pamela	Lane	Executive Director	National Association of Emergency Medical Technicians
Ms.	Jerri	Lynne Kind	Executive Director	National Association of Emergency Medical Services Physiciar
Mr.	Dean	Wilkerson	Executive Director	American College of Emergency Physicians
Mr.	Gregg	Margolis, P	Associate Director	National Registry of Emergency Medical Technicians
Mr.	Bill	Brown		National Registry of Emergency Medical Technicians
Mr.	Dave	Finger	Director of Government Relations	National Volunteer Fire Council
Ms.	Elizabeth	Armstrong	Executive Vice President	National Association of State EMS Officials
Mr.	Kevin	McGinnis	Chair, Executive Committee	National Association of State EMS Officials
Mr.	Joe	Schmider	Director	Pennsylvania Department of Health
Mr.	Chris	Bell	Vice Chair	Vermont Department of Health Office of Public Health Prepar
Ms.	Leslee	Stein-Spen	Program Advisor	NASEMSO
Ms.	Joanne	Freel	Executive Director	National Association of State EMS Educators
Mr.	Torren	Colcord	Executive Director	National Emergency Medical Services Association
Mr.	Drew	Dawson		National Highway Traffic Safety Administration Office of EMS
Chief	James	Robinson		International Association of EMS Chiefs
				Fire Service-Based EMS Advocates
Mr.	Stephen	Williamson	President	American Ambulance Association
Mr.	Stephen	Williamson	President and Chief Executive Officer	Emergency Medical Services Authority
Mr.	James	Orsino	President	Emergency Medical Services Labor Alliance
Ms.	Emily	Swanson	Senior Director of Marketing and Operatio	Visiting Nurse Associations of America
Ms.	Beth	Bartlett	Membership Services	Advocates for EMS
			Director, Public Relations	National Association for Homecare and Hospice
Ms.	Kristia	Aylett	Media Department	American Association of Critical-Care Nurses
			Media Department	American Society of Registered Nurses
				American Association of Nurse Practitioners
Mr.	Skip	Kirkwood, I	M.SS, J.D., NREMT, EFO, CMO	EMS Chiefs of Canada
Mr.	Ron	Meyers	Project Manager, Standards	CSA Group
Mr.	Kevin	McGinnis	CP Project Coordinator	Maine EMS



National Fire Protection Association

1 Batterymarch Park, Quincy, MA 02169-7471
Phone: 617-770-3000 • Fax: 617-770-0700 • www.nfpa.org

*Linda J. Fuller, Manager
Codes and Standards Administration*

SC Item 12-3-11
March 2012 Meeting

March 23, 2012

David K. Tan
Washington University School of Medicine
600 South Euclid Ave., Campus Box 8072
St. Louis, MO 63110

Dear Mr. Tan:

I am transmitting to you herewith the following action of the Standards Council (March 5-6, 2012):

The Council reviewed the request of David Tan of the National Association of EMS Physicians that NFPA consider the establishment of a new document that would provide a guide for the development of community paramedicine programs. After review of all the material before it, the Council voted to publish a notice to solicit public comments on the need for the project, information on resources on the subject matter, those interested in participating, if established, and other organizations actively involved with the subject.

Very truly yours,

A handwritten signature in cursive script, appearing to read 'Linda Fuller', is positioned above the typed name.

Linda Fuller, Manager
Codes and Standards Administration

c: K. Willette, K. Holland, D. Baio, C. Cronin
TC Emergency Medical Services (EMS-AAA)
Interested Parties

12-3-11

New Project Initiation Form

(To be completed by proponent of new project/document)

*Additional pages may be attached if necessary.***SC Item 12-3-11****March 2012 Meeting**

a.	<p>Explain the Scope of the new project/document:</p> <p>A Guide for the Development of Community Paramedicine Programs. The scope of this document would be to assist EMS systems in integrating EMS into public health as called for in the EMS Agenda for the Future.</p>
b.	<p>Provide an explanation and any evidence of the need for the new project/document:</p> <p>The landmark publication <i>EMS Agenda for the Future</i> called for the integration of pre-hospital medical systems into the continuum of medical care to include the spectrum of public health. While many EMS systems have begun to consider methods of answering this call, few resources exist to guide administrators in this underdeveloped niche of pre-hospital medicine. Fueling the recent interest in community paramedicine initiatives is the latest pronouncement by CMS that hospitals will begin to receive penalties for patients who are re-admitted to a facility for the same diagnosis within 30 days of discharge. Hospital administrators are now looking to EMS as a possible bridge between inpatient discharge and outpatient follow-up appointments to identify those patients at highest risk for relapse. It is a natural fit for EMS in many ways. First, EMS systems are designed to expand and contract resources based on demand. The infrastructure exists having mobile resources placed around a service area that could easily perform a post-discharge wellness check on a patient. Second, the EMS providers themselves are highly accustomed to working under physician protocols and standing orders. These providers have the experience and training necessary to recognize the acutely ill or decompensated patient and to stabilize them if transport is necessary. Third, a number of highly skilled and experienced EMS providers leave the work force due to physical limitations that prevent them from tolerating the daily abuse and demands typical of a street medic. These providers are often relegated to desk duty where their skill and experience is no longer benefiting direct patient care. Community paramedicine programs allow these seasoned providers to continue using their valuable assessment skills and inherent patient advocacy position to directly benefit high-risk patients while fulfilling the vision for complete integration of EMS into the healthcare continuum. We believe that an NFPA document addressing community paramedicine development would become a highly sought after resource for EMS leaders across the country.</p>
c.	<p>Identify intended users of the new project/document: Any EMS system and hospitals, community health centers, public health advocates, and physicians.</p>
d.	<p>Identify individuals, groups and organizations that should review and provide input on the need for the proposed new project/document, and provide contact information for these groups: IAFF, IAFC, NAEMT, NAEMSP, Insurance industry, ACEP, NREMT, NVFC, NASEMSO, NAEMSE, Advocates for EMS, NEMSMA, Fire Based Advocates for EMS.</p>
e.	<p>Identify individuals, groups and organizations that will be or could be affected, either directly or indirectly, by the proposed new project/document, and what benefit they will receive by having this new document available: IAFF, IAFC, NAEMT, NAEMSP, Insurance industry, ACEP, NREMT, NVFC, NASEMSO, NAEMSE, Advocates for EMS, NEMSMA, Fire Based Advocates for EMS.</p>
f.	<p>Identify other related documents and projects on the subject both within NFPA and external to NFPA: None within the NFPA. Unknown of any that address this subject, however there is a large need or demand for a document to address this subject.</p>
g.	<p>Identify the technical expertise and interest necessary to develop the project/document, and if the committee membership currently contains this expertise and interest: The EMS-AAA TC has the sufficient technical expertise necessary to develop this document.</p>

SC Item 12-3-11
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h.	Provide an estimate on the amount of time needed to develop the new project/document: 2-3 years.
i.	Comment on the availability of data and other information that exists or would be needed to substantiate the technical requirements and other provisions of the proposed new project/ document: The data is sparse where no formal study has been done to evaluate this subject. This is the reason for the desire of the EMS-AAA TC to develop this document with the expertise on the TC with input from any and all interested parties.

Please send your request to:

NFPA

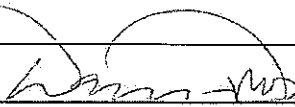
Codes and Standards Administration

1 Batterymarch Park

Quincy, MA 02169

Stds_admin@nfpa.org

Rev. 10/09

Signature: 

Name: David K. Tan, M.D., FAAEM
(please print)

Affiliation: National Association of EMS Physicians

NFPA TC on Emergency Medical Services Meeting

July 29-30, 2010

SC Item 12-3-11
March 2012 Meeting

Members Present:

Ken Holland, NFPA Staff Liaison
Ken Knipper, Chair & Principal
Richard Patrick, Principal (acting Secretary)
David Simmons, Principal
Jonathan Moore, Principal
Frank Pratt, Principal

Known excused: Jack Krakeel, Kyle Gorman, Ron Pirrallo

Guest: Tim Crowley (Chief ret. Las Vegas, NV, Fire Dept.)

The meeting was called to order at 8:55 a.m. by Chairman Ken Knipper.

Ken Knipper explained to the group that NFPA 450 is scheduled to enter the Annual 2012 cycle. The committee charge from the Standards Council is to consider the new project of recommended practice as a stand alone project and or to incorporate it into the existing NFPA 450. The committee is also reviewing NFPA 450.

Introductions of attendees

There was some discussion on the potential timelines for future meetings.

I. Discussion of NFPA Updates.

Ken Holland briefed the group on the passing of Chief Frank Florence. Ken is now the NFPA Staff Liaison to this committee.

NFPA 450 entered cycle on July 9, 2010 and proposal closing date is November 23, 2010.

II. Approval of Minutes.

Minutes from January 21, 2010 meeting were approved.

III. Discussion of Document Development Process.

Ken Knipper and Ken Holland provided an overview of how the EMS Systems standard originated and the rationale to the document and it being a guide versus a standard.

Ken Knipper inquired on clarification of the 'committee charge' and are we addressing the entire NFPA 450 or a specific section. Discussion ensued pertaining to ties with national programs such as NEMSIS and evidence based rationale. The following is the charge for consideration as previously described.

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Description: *NFPA 450 provides a template that identifies the essential elements of an EMS system. While the purpose of NFPA 450 is to provide guidelines and recommendations to assist those interested or involved in EMS system design, provision of local pre-hospital care requires the coordination and cooperation of disparate elements. System design is critical to effective patient care, NFPA 450 does not comprehensively provide a standard methodology to determine if the system design is effective. The proposed document will provide for local system design evaluation. It is the intent of the proposed document to create a system of analysis utilizing the essential design elements provided in NFPA 450*

Scope: *This document is designed to assist individuals, agencies and organizations as well as those interested or involved in EMS system a method by which to evaluate the effectiveness of the EMS system. The evaluation methodology is predicated on the utilization of NFPA 450 design elements and locally established standards for the delivery of emergency medical services.*

Rationale: *There are a multiple evaluation processes such as CAAS, CFAI, CALEA, JCAHO and NHSTA that assess the capabilities of individual system agencies, however none of these processes are designed to evaluate the EMS system throughout the continuum of patient care. The document intends to create a recommended practice that allows for the evaluation of multiple system parameters that are frequently provided by many different participants that have a defined role in the delivery of EMS.*

Group reviewed the EMS Performance Measures document produced jointly by the NASEMSO, NAEMSP, NHTSA/OEMS and HHS. Discussion followed on how to best approach the development of measurement models. Suggestion was made to thoroughly review the performance measures document and assure that we crosswalk the information with the NFPA 450 functional intervals (table 5.6 Essential System Analysis Components, page 450-13, 2009 Edition)

Following additional discussion the group decided to pursue a link of NEMSIS, NHTSA Performance Measures and NFPA 450. As part of the due diligence the committee reviewed the EMS Performance Measures document line by line.

The group recommended to NFPA staff liaison to communicate the NHTSA EMS Performance Measures along with NFPA 450 information with the committees intent to incorporate the performance measures into the NFPA 450 versus creating a separate document. The committee present reviewed the NHTSA Performance Measures document with discussions and no conflicting issues.

Group discussed the Standards Councils pointed comment regarding comprehensive performance measures and how the NHTSA Performance Measures are not comprehensive, specifically in relation to NFPA 450. The resulting question remains - Should the committee look at additional measures applicable to NFPA 450 or focus on the identified measures within the NHTSA document?

Performance measures identify the targets to measure. There is no reference as to the performance expected. Group discussed. Examples identified were some known performance expectations such as medical care for MI, STEMI.

Link to NHTSA Performance Measures: <http://www.ems.gov/pdf/811211.pdf>

The committee recessed for the day at 4:30 p.m.

July 30, 2010

The committee reconvened at 8:00 a.m. Chairman Knipper called the meeting to order.

III. (con't)

Committee worked on development of a committee ballot regarding the Standards Council recommendation. David Simmons made a motion to accept the draft ballot, 2nd by Rick Patrick.

Committee discussed several recommendations for proposed revisions to NFPA 450. Ken Holland has the draft of proposed revisions. These proposed changes that were discussed at the meeting are not official changes as they will need to be balloted officially through the entire TC. These are just here to get any further discussion from the committee regarding these specific changes. The committee can also make any proposed changes at the Report on Proposal meeting to be held in January, 2011.

Proposed revision of 1.2 Purpose

....This document provides a template resources for local stakeholders to evaluate EMS systems and make improvements based on that evaluation.....

OR

1.2 Purpose.

The purpose of this document is to provide guidelines and recommendations to assist those interested or involved in EMS system design. Provision of local prehospital care requires the coordination and cooperation of disparate elements. ~~This document provides a template for local stakeholders to evaluate EMS systems and make improvements based on that evaluation.~~ While other resources on this topic exist, this document provides a framework for designing and/or evaluating a comprehensive EMS system.

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Proposed revision of 5.5.3.2.2

NHTSA. The National Highway Traffic Safety Administration (NHTSA) ~~is currently working on~~ has ~~developed~~ published the document “EMS Performance Measures: Recommended Measures for System and Service Performance” using a consensus process to develop performance measures for EMS. The document contains indicators and attributes which EMS practitioners identified as critical for performance measurement and evaluation of any emergency medical services system. This resource describes the sources of required data, the formulas or questions necessary to examine critical components as well as other evaluation criteria parameters.

2.3.4 NHTSA Publications.

National Highway Traffic Safety Administration, 400 Seventh Street, S.W., Washington, DC 20590.

Delbridge, T. R., et al., “Emergency Medical Services: Agenda for the Future.” August 1996. DOT HS 808-441, NTS-42.

EMS Performance Measures: Recommended Measures for System and Service Performance

National EMS Education and Practice Blueprint.

NHTSA Uniform Prehospital Data Set.

Add new text:

2.3.X NEMSIS Publication reference.

5.11.3 NEMSIS. Add statement regarding NEMSIS here.

Discussion on recommendations to assure that the definitions used are consistent with those in NEMSIS and to reference NEMSIS as a standard for prehospital EMS data collection and the National EMS Database. The committee agreed to recommend insertion of language to address these topics in Chapter 2. Reference Documents, 2.3 Other Publications of NFPA 450.

Committee membership

Group discussed suggested recommendations for membership. Several names were provided to NFPA. Additional discussion on the importance of having alternates for the current principal representatives.

Next Meeting:

The next meeting will be scheduled in January 6-7, 2011 location options are Memphis, TN and San Antonio, TX.

Meeting Adjourned

Respectfully submitted,

Richard W. Patrick



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Community Paramedic

To address the critical shortages of health care professionals and services in rural and remote areas, the Community Healthcare and Emergency Cooperative is developing a Community Paramedic training program. The Community Paramedic will not replace existing health care services, but will fill the gaps revealed by examining each community. The Community Paramedic will ensure basic and advanced levels of care appropriate to prevention, emergencies, evaluation, care, triage, disease management, mental health and referrals. The Community Paramedic will receive standardized training—training that is consistent internationally—yet can be modified for each community, state and nation.

Role

The Community Paramedic will respond to identified health needs in underserved communities, ultimately improving the quality of life and health of rural and remote citizens and visitors. Roles will include outreach; wellness; health screening assessments; health teaching; providing immunizations; disease management, including a thorough understanding of monitoring diabetes, congestive heart failure and other high cost diseases and the methods and medications used to treat them; recognition of mental health issues and referral into the existing mental health care system; wound care; safety programs; and, functioning as physician extenders in rural clinics and hospitals in communities that have them.

Partners

Creighton University in Nebraska, Dalhousie University in Nova Scotia, the MNSCU Healthcare Education-Industry Partnership in Minnesota, the Mayo Clinic Medical Transport, the North Central EMS Institute, the state Offices of Rural Health in Minnesota and in Nebraska, and the University of Nebraska Medical Center formed the Community Healthcare and Emergency Cooperative in July 2007 to create a new community health provider model to serve rural and remote communities.

Status

The partners are working to create a Community Paramedic health care model, are writing a curriculum that builds on the MNSCU Community Health Worker curriculum and are planning a pilot of the model. The partners studied the Alaska Community Health Aide, the Nova Scotia Community Paramedic model, and the Australia Rural and Remote Paramedic Program. Each home grown project has something unique to offer. For example, Nova Scotia informally expanded the role of their paramedics in a three-phase process and demonstrated a 40 percent reduction in emergency room visits and a 28 percent reduction in clinic visits over five years.

For more information, contact Dennis Berens, director of the Nebraska Office of Rural Health at (402) 471-0142 or dennis.berens@dhhs.ne.gov or Gary Wingrove, director of strategic affairs for Mayo Clinic Medical Transport in Minnesota at (612) 366-3532 or wingrove.gary@mayo.edu. More information is available at <http://chec.ncemsi.org>.



Official Website of Eagle County, Colorado

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Contact Us

Avon
100 W. Beaver Creek Blvd. 107
P.O. Box 3419
Avon, CO 81620
Phone: 970-949-7026
Fax: 970-949-8120

Eagle
551 Broadway
P.O. Box 660
Eagle, CO 81631
Phone: 970-328-8840
Fax: 970-328-8829

El Jebel
0020 Eagle County Dr. Ste E
El Jebel, CO 81623
Phone: 970-704-2760
Fax: 970-704-2783

County and WECAD launch community paramedic pilot program

Contact: Anne Robinson, Public Health Nurse Manager, 970-748-2005, anne.robinson@eaglecounty.us or
Chris Montera, Chief Eagle County Western Eagle County Ambulance District, 970-328-1130,
cmontera@wecadems.com

Through a collaborative effort between Eagle County's Public Health Department and the Western Eagle County Ambulance District (WECAD), a new community paramedic pilot program is being launched that will provide better, more cost-effective access to essential healthcare services. As part of the community paramedic model, patients are referred to Emergency Medical Services (EMS) personnel by their primary care physician to receive services in the home, including hospital discharge follow-up, blood draws, medication reconciliation and wound care. The program is the first of its kind in the state and officially begins on Aug. 17.

Currently, Colorado Mountain Medical, Eagle Care, Eagle Valley Medical Center, Vail Valley Medical Center and Valley View Hospitals' primary care physicians are committed to the pilot and will begin referring patients immediately. The program will initially serve individuals within the WECAD district, which encompasses 1,100 square miles in western Eagle County and eastern Garfield County.

Future expansion is a possibility, according to Chris Montera, WECAD Chief. "Geographically speaking, we live in an area that would greatly benefit from this program. Many of our most vulnerable patients live miles away from the hospital, it can be difficult or costly for them to find transportation for regular visits or routine checkups," said Montera.

Patients will not be charged for services during the pilot. Funding includes approximately \$500,000 in grant money, with \$225,000 from the Colorado Health Foundation. Anne Robinson, Public Health Nurse Manager with Eagle County, says the grants will cover two years of operation without reimbursement. "During the five-year pilot program, Eagle County will serve as a test case for the State of Colorado," said Robinson. "We expect to collect enough compelling data to petition to have the program reimbursed by Medicare, Medicaid and private insurers," she said.

The program will initially operate with two specially-trained community paramedics who will coordinate with the referring physician to ensure quality of care and appropriate oversight. In addition, paramedics will work with Eagle County's Public Health Department to provide preventative services throughout the community.

"The key to the success of the program will be the integration of all healthcare entities, so that we can give the best possible care to all patients," said Robinson. "This model for healthcare has resulted in tremendous benefits in other communities, including reduced emergency room visits and high levels of patient satisfaction."

The launch will follow this week's 6th Annual International Roundtable on Community Paramedicine, taking place today through Wednesday at Manor Vail Lodge in Vail. Approximately 100 attendees from around the world will discuss major trends and topics in paramedicine, including the community paramedic model. "We are excited to host those on the forefront of paramedicine in our valley, especially with the launch of our own leading-edge program so close," said Robinson. For more information, contact Robinson at 970-748-2005 or Montera at 328-1130.

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Emergency Medical Services EMS-AAA

SC Item 12-3-11
March 2012 Meeting

Committee Scope:

This Committee shall have primary responsibility for documents relating to emergency medical services, except those documents covered by other existing NFPA committees.

ATTACHMENT

3

NAME	COMPANY	E-MAIL ADDRESS	ATTENDING	E-MAIL ADDRESS
Anne Robinson	Fmr Public Health Nurse	ar@caringanne.com		
Brendan Carr	HHA PHE Office of the Assistant Secretary for Preparedness & Response	brendan.carr@hhs.gov		
Chris Montera	Eagle County Paramedics	cmontera@ecparamedics.com		
Dan Swayze	University of Pittsburgh	dswayze@statmedevac.com		
Dave Bryson	NHTSA Office of EMS	dave.bryson@dot.gov		
Dia Gainor	NASEMSO	dia@nasemso.org	Yes	
Don Lundy	NAEMT	dlundy@charlestoncounty.org		
Donna Tidwell	NAEMSE	health.ems@tm.gov		
Drew Dawson	NHTSA Office of EMS	drew.dawson@dot.gov		
Gary Wingrove	North Central EMS Institute	wingrove.gary@mayo.edu	Yes	
Gregg Margolis	HHS PHE Office of the Assistant Secretary for Preparedness & Response	gregg.margolis@hhs.gov		
James Orsino	EMS Labor Alliance	jorsino@emsla.org	Jason Brollini	jason.brollini@uems.org
James Robinson	Int. Assoc. of EMS Chiefs	james.robinson@IAEMSC.org		
Jim DeTienne	NASEMSO/President	dia@nasemso.org	Yes	
Joann Freel	NAEMSE	joann.freel@naemse.org		
Karen Daley	American Nurses Assoc.	kdaley@ana.org		
Keith Griffiths	NEMSMA	kgriffiths@redflashgroup.com		
Kevin Munjal	NYS Mobile Integrated Health	kevin.munjal@gmail.com	no/scheduling conflict	
Kevin Stanhope	Association of Critical Care Transport	kevin.stanhope@airmethods.com		
Lisa Tofil	Association of Critical Care Transport	lisa.tofil@hklaw.com		
Mark Rector	National Academies of Emergency Dispatch	mark.rector@emergencydispatch.org		
Matt Zavadsky	Medstar EMS	mzavadasky@medstar911.org	yes	
Melissa Costello	American College of Emergency Physicians	emsdoc1@gmail.com		
Rick Murray	American College of Emergency Physicians	rmurray@acep.org		
Rick Sherlock	AAMS	rsherlock@aams.org		
Rinal Patel	EMS for Children National Resource Center	ripatel@childrensnational.org		

Ron Thackery	AMR	ronald.thackery@amr.net	Alan Craig	alan.craig@evhc.net
Scott Freitag	National Academies of Emergency Dispatch	scott.Freitag@emergencydispatch.org		
Severo Rodriquez	NREMT	SAR@nremt.org	Tommy Loyacono	tloyacono@gmail.com
Skip Kirkwood	Wake County Emergency Services	skip.kirkwood@nemsma.org		
Troy Hagen	NEMSMA	troyh@careambulance.net	Brian LaCroix	brian.lacroix@allina.com

ATTACHMENT









4

Sign-In Sheet
 Emergency Medical Services
 EMS-Paramedic Development Project
 April 2-3, 2014
 Las Vegas, NV

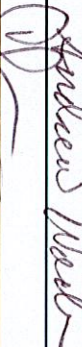








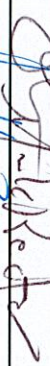




Name	Office	Organization	Signature	Staying at hotel	Days 1 2 3 4 5
Knipper, Kenneth	Chair	National Volunteer Fire Council	<i>Attended</i>		
Gorman, Kyle	Secretary	Clackamas County Fire District #1	<i>Kyle Gorman</i>	X	X
Altemose, Scott	Principal	Trefoil Training & Technical Assistance			
Beardsley, Heather	Principal	McNeil and Company, Inc.			
Blais, Richard	Principal	Providence Fire Department			
Bradley, David	Principal	Volunteer Firemen's Insurance Services,	<i>David Bradley</i>	NO	X
Crowley II, Timothy	Principal		<i>Timothy Crowley</i>	NO	X
Dailey, Michael	Principal	Albany Medical College			
Deardorff, Chad	Principal	City of York Fire/Rescue Services	<i>Chad Deardorff</i>	YES	X
Donovan, Timothy	Principal	Bridgewater Fire Department	<i>Timothy Donovan</i>	YES	X
Figg, Coleman	Principal	Newport Fire Department	<i>called in</i>		
Harris, David	Principal	US Air Force			
Hickerson, Barry	Principal	Emergency Medical Services Labor	<i>Barry Hickerson</i>	X	X
Lindsey, Jeffrey	Principal	Health & Safety Institute	<i>Jeffrey Lindsey</i>	X	X
Lucas, Charles	Principal	Bolivar County Fire Department			
Mackinnon, Richard	Principal	International Association of Fire Fighters			
McGee, Kevin	Principal	Prince William County Fire & Rescue	<i>called in</i>		
Nason, Marc	Principal	Artesia Fire Department	<i>Marc Nason</i>	X	X
Niemeyer, Mark	Principal	Western Fire Chiefs Association			
Patrick, Richard	Principal	US Department of Homeland Security			
Pickard, Karen	Principal	International Association of Fire Chiefs	<i>called in</i>		

✓ Non Participation 4/7/14

Sign-In Sheet
Emergency Medical Services

Name	Office	Organization	Signature	Staying at hotel	Days 1	2	3	4	5
Pratt, Franklin	Principal	American College of Emergency							
Reinert, Aaron	Principal	Lakes Region EMS		NO	X	X			
Simmons, David	Principal	Firemen's Association of the State of New			X	X			
Tan, David	Principal	National Association of EMS Physicians		Y	X				
Ungar, Robert	Principal	American Federation of State, County &							
Waddell, Robert	Principal	AMR - Cheyenne/Laramie County							
Ziegler, Robert	Principal	Emergency Resource Management, LLC		Y	X	X	X	X	X
Andrews, Byron	Alternate	International Association of Fire Chiefs							
Ellis, Matt	Alternate	Mississippi State Fire Academy		NO	X	X			
Fredenburgh, Heather	Alternate	McNeil and Company, Inc.							
Huff, Richard	Alternate	National Volunteer Fire Council							
Moore, Jonathan	Alternate	International Association of Fire Fighters							
Niehenke, William	Alternate	Volunteer Firemen's Insurance Services,							
Holland, Kendall	Staff Liaison	National Fire Protection Association							

Sign-In Sheet Emergency Medical Services

Name	Office	Organization	Signature	Staying at hotel	Days			
Guests:				Staying at hotel	Days			
Name	Office	Organization	Signature	1	2	3	4	5
Andrew Mordkin		IAEMS - Metro Chief Div		yes	✓			
Chris Chobler		NAEMT		yes	✓			
Ernest LaCruz		NAEMSA		yes	✓			
Paul Thackeray		American Ambulance Assoc		✓	✓			
Chris Montemai		Eagle County Paramedics		No				
Ann Robinson-Montez		American Nurses Assoc.		No				
Gary Mangione	President	The Paramedic Foundation		No				
DeTempe, Tim	President	NAEMSD		No				
Tommy Loggason	Post Chair	NREMT		yes	✓			
Jeff Beeson		ACEP		yes	✓			
Mark Hector		NAEMD		yes	✓			
Mark Zavadsky		MedStar Mobile Healthcare		yes	✓			
Dia Trainor	Exec. Director	NAEMSO		No	✓			
Brad Pittman	EMSRs Dir.	EMSRs						

Ryan Deane
Meghan Houswright
ALAN CRAIG
Thomas Blyler

VF-clinical
STRAATGERS

APRIL MEDICAL
RESPONSE

4.17
 KAS

70

FAFE called in

ATTACHMENT

5

Meeting Agenda

Technical Committee on Emergency Medical Services New Project Request Development Meeting April 2-3, 2014 Las Vegas, NV

- I. Welcome – Chair Ken Knipper
- II. Introductions of committee members and guests
- III. NFPA updates Ken Holland
 - a. New process
 - b. Online submissions
 - c. Doc info pages
 - d. New project request process
- IV. Review/discuss previous request (was administratively withdrawn)
- V. Discuss development of new request on MIH/CP
- VI. Discuss any other new project requests the committee would submit
- VII. Old Business
- VIII. New Business
 - a. Task groups for work on next edition of NFPA 450
 - b. Begin work on next revision for NFPA 450
- IX. Next Meeting

ATTACHMENT

6

Project Statement Form

Return to Amanda Kimball (akimball@nfpa.org)

Fire Protection Research Foundation, One Batterymarch Park, Quincy, MA 02169-7471

1) Proposed Project Title:

Data and Resources on Mobile Integrated Healthcare and Community Paramedicine (MIH/CP).

2) Problem Statement (One or two sentences addressing “What is the research or data need?”):

The landmark publication *EMS Agenda for the Future* called for integrating out-of-hospital medical systems into the continuum of medical care to include the spectrum of public health. While many EMS systems have begun to consider methods of answering this call, few resources exist to guide administrators in this underdeveloped niche of out-of-hospital medicine. While the EMS providers are seen as the bridge to bring healthcare to the community, are there any models or practices available that are being used to do this and if so what has been their impact? It is also thought of as a program where the EMS providers could reduce the amount of non-emergent 911 calls or requests for services that are made. This would also ideally include providing access to other healthcare resources for those that need it.

3) Research Objective (One or two sentences addressing “What is needed to solve the problem?”

Examples include: Develop guidance for a specific issue, Determine effectiveness of current code/standard requirement):

The objective would be to show where mobile integrated healthcare/community paramedicine (MIH/CP) is being used, what information is available from those communities, and how could this information help to develop a document relating to MIH/CP systems. Also what resources are being used to implement such a program? What resource or reference material is available? What information is available on functioning systems and failed systems?

4) Project Description (One or two paragraphs on study design & expected tasks. Project tasks can include literature reviews, data collection, loss summaries, field usage surveys, code comparisons, statistical analysis, computer modeling, hazard analysis, risk assessments, fire testing, recommendation development, and gap identification.):

The project would most likely include a global literature review because this is a new and emerging area in the field of healthcare and ems. The projects goals would include searching any literature or best practices so that the technical committee on emergency medical services (EMS-AAA) can examine the successes and failures throughout the spectrum of MIH/CP programs. Further, the project would examine agencies throughout the world to determine if and how they are addressing these issues and how they are managing resource utilization. The committee is specifically interested in how existing ems resources are being used to deliver services.

5) Data Collection (If data collection is part of the project scope, does data exist? If data exists, is it available to be used in the study? Please identify potential data sources.)

The data does exist and is available, which is the crux of this code find request, however it is scattered throughout various sources and having it as one “deliverable” would greatly assist the EMS-AAA TC in this subject.

6) Relevant NFPA Document(s), Technical Groups, or [Foundation strategic research agenda item](#) & How Project Will Impact:

At present there are no NFPA documents on MIH/CP; however, the EMS TC hopes that a comprehensive research review will determine the need for the EMS TC to develop a document on this subject.

7) Estimated Funding Required for Project:

Under \$30,000.00 is the general thinking.

8) Organizations That Could Possibly Fund (Examples: government grants, industry consortia, stakeholders):

NAEMSO, NHTSA, NAEMT, IAFF, IAFC, NVFC, Advocates for EMS, NAEMSP, NAEMSE, CMS, ACEP, Kaiser Family Foundation.

9) When Do You Need Project Deliverables (when is information needed to coordinate with document revision cycles, sense of urgency):

The EMS TC believes that this project is critical to not only the committee but also the industry. Completing this project as soon as possible will allow the committee to determine whether a guide, standard, or other new project is appropriate, or whether the information can be used to update an existing document. This has received attention from many outside organizations as well as the NFPA Board of Directors and this information would be most helpful, if not critical, in the work of the EMS-AAA TC.

10) Submitted By (Staff Liaison/TC Chair/etc) and Date Submitted:

Kenneth Knipper EMS-AAA TC Chair

Ken Holland NFPA staff liaison to the EMS-AAA TC

ATTACHMENT

7

Technical Committee on Emergency Medical Services
New Project Request Development Meeting Minutes
April 2-3, 2014
Las Vegas, NV

TC Members

Kenneth Knipper- Chair

Kyle Gorman- Secretary

David Bradley

Timothy Crowley II

Chad Deardorff

Timothy Donovan

Coleman Figg

Barry Hickerson

Jeffrey Lindsey

Kevin McGee

Marc Nason

Karen Pickard

Aarron Reinert

David Simmons

David Tan

Robert Ziegler

Matt Ellis

Heather Fredenburg

Jonathan Moore

Ken Holland- NFPA Staff

Ryan Depew- NFPA Staff

Meghan Housewright- NFPA Staff

Guests

Andrew Wordin- International Association of EMS Chiefs, Metro Chief Division (IAEMSC)

Chris Cebollero- National Association of EMT's (NAEMT)

Brian Lacroix- National EMS Management Association (NEMSMA)
Ron Thackery- American Ambulance Association (AAA)
Chris Montera- Eagle County Paramedics
Anne Robinson-Montera- American Nurses Association
Gary Wingrove- The Paramedic Foundation
Jim DeTienne- National Association of State EMS Officials (NASEMSO)
Tommy Loyacono- National Registry of EMT's (NREMT)
Jeff Beeson- American College of Emergency Physicians (ACEP)
Mark Rector- National Academies of Emergency Dispatch
Matt Zavadsky- Medstar Mobile Healthcare
Dia Gainor- National Association of State EMS Officials (NASEMSO)
Jason Brollini- EMS Labor Alliance (EMSLA)
Allan Craig- American Medical Response (AMR)
Thomas Breyer- International Association of Fire Fighters (IAFF)

Chairman Knipper welcomed the entire group, committee members and guests, to this meeting and expressed his gratitude for such a highly attended meeting on such an important subject that is before the committee. He called it a "historical" meeting based on the large number of guests present and what organizations they represent, the subject of Mobile Integrated Healthcare/Community Paramedicine (MIH/CP), and the committee members present. The interest and desire to participate by everyone in the room was recognized by Chairman Knipper where he hoped for and welcomed some intense and thorough dialogue over the next two days.

NFPA staff liaison, Ken Holland, went over the new NFPA process for document development, how to submit public inputs and public comments using the new online submission format. Also discussed was the Doc info pages, which is where any information pertaining to any NFPA document and NFPA committee could be found. Each NFPA document has their own unique doc info page that can be accessed by committee members and any member of the public. Also noted was that all NFPA documents can be viewed online for free. Also explained was the process as it relates to the development and submission of a new project request, which is the intent or goal of this meeting. The process is a bit different in the beginning for a new project, but once the new project becomes a document it falls into the NFPA document development process. Explained were the minor differences in how a new project is developed and processed as opposed to NFPA 450.

Discussion on the previous request that was developed by the committee and submitted in 2011 by Dr. David Tan, which was ultimately administratively withdrawn, took place to advise the committee and guests why that occurred.

The committee spent the rest of the day discussing, with significant involvement from the guests, as to what direction the committee should go in with regards to the subject of MIH/CP. The main options that

were discussed were to create another new project request on MIH/CP, include MIH/CP as a separate chapter in the next edition of NFPA 450, thus not completing a new project request, or do nothing at all. Based on the many repeated comments from those in attendance, such as “it’s too early”, “the NFPA shouldn’t be the ones to write the standard on MIH/CP”, “what business does the NFPA have in the delivery of healthcare?”, “the NFPA is a fire organization and would not represent all types of providers”, “the NFPA shouldn’t be the sole writers of a standard but must be part of a larger collaborative effort”, “the NFPA has done great work in other areas and is an established ANSI accredited organization thus they should be the ones to take the lead on developing a document on MIH/CP”. This is just a sample of the many comments that were part of the overall discussion and dialogue that took place.

Based on all of the discussions that were made to the committee regarding the development of a new project request on MIH/CP a motion was made by a committee member that the committee should not develop this request for a new project. This motion failed. Another motion was made to submit a code fund request to the Fire Protection Research Foundation to conduct an in-depth literature review on the subject and report back to the committee their findings. The results of these findings would then be used to help guide the committee as to what their next step will be regarding MIH/CP. This motion passed and a code fund request was worked on. While the committee decided at this meeting that they would not develop a new project request, the intent was one would not be developed at this moment. That is not to say that one couldn’t be developed by the committee in the future. It was also noted that anyone from the public could certainly submit a new project request to the NFPA on the subject of MIH/CP.

The committee discussed the possibility of establishing task groups for the revision of NFPA 450 and that any public input that would come from any task groups or committee members was urged to be submitted by the public input closing date. That date is July 7th, 2014.

The committee is looking to have the First Draft meeting of NFPA 450 on or around October 14th and 15th, 2014 in the Memphis area. While exact location and dates will be worked out the committee will be meeting in the eastern part of the country before December 12, 2014.

The work of the committee was spread over the two days with an adjournment at 12:00 on April 3rd, 2014.