

**State Emergency Medical Services System Models
Project:**

**Model Statutory and Regulatory Content for
State EMS Systems**

June, 2010

By:

The National Association of State EMS Officials

With Support From:

**Office of Emergency Medical Services
National Highway Traffic Safety Administration
US Department of Transportation**

State Emergency Medical Services System Models Project: Model Statutory and Regulatory Content for State EMS Systems

Table of Contents

I. Introduction and Purpose	3
II. Model Statutory and Regulatory Content for State EMS Systems	7
A. Detailed Statutory and Regulatory Content Guide	9
B. Self-Assessment Checklist	30
IV. Appendices	
A. Steering Group and Staff List	45
B. References	46
C. Index	46

I. Introduction and Purpose

Milestone documents in the early development of Emergency Medical Services Systems (EMSS) have included the National Academy of Sciences-National Research Council White Paper “*Accidental Death and Disability: The Neglected Disease of Modern Society*”, the federal Highway Safety Act of 1966, and the federal Emergency Medical Services (EMS) Systems Act of 1973. They guided the first thirty years of booming Emergency Medical Services System growth on the local, regional and state levels. Assisting in organized regional and, to a lesser degree, state system growth was significant funding provided by a large federal Health and Human Services (USDHHS); preceded in the 1970’s by the U.S. Department of Health, Education and Welfare or USDHEW) emergency medical services agency under the 1973 EMSS Act. Both the EMS agency and its categorical funding for EMS were eliminated in the early 1980’s.

The National Highway Traffic Safety Administration’s Emergency Medical Services program (NHTSA EMS) has provided state and local system development support since the late 1960’s. It has innovated programs such as the state EMS system Technical Assistance Team evaluation process and, with its federal partners, created the visionary 1996 *EMS Agenda for the Future*. The “EMS for Children” and the “Trauma System” programs in USDHHS have also provided EMS system development support over the years.

This history contributed to an environment of varying focus of resources and guidance on the development of state EMS systems. Partly as a result of this variable guidance/resources and because of the unique needs and capabilities of each state, state EMS systems have evolved inconsistently. Some have mature networks of leadership connecting state, regional and local systems with broad responsibility for all aspects of emergency care. Others have narrow responsibility for the regulation of certain aspects of prehospital EMS provider certification, licensure and practice.

A recent report by the Institutes of Medicine (IOM) underscores that:

“In states and regions across the country, there is substantial variation among emergency and trauma care systems. These systems differ along a number of dimensions, such as the level of development of trauma systems, the effectiveness of state EMS offices and regional EMS councils, and the degree of coordination between fire, EMS, hospitals, trauma centers, and emergency management.”¹ And, as a result:

“...today the system is more fragmented than ever, and the lack of effective coordination and accountability stand in the way of further progress and improved quality of care. EMS has an opportunity to move toward a more integrated and accountable system through fundamental, systemic changes. Or it can continue on its current path and risk further entrenchment of the fragmentation that stands in the way of system improvement.”²

The premise of the State Emergency Medical Services System Models Project accepts the challenge of these observations.

The 1973 EMS System Act described an “EMS system” very broadly to include a system for preventing emergent illness and injury and, where these could not be prevented, for mitigating their impact through emergency, acute and rehabilitative patient care including all subsystems of care such as emergency cardiac and trauma care. This original definition has become less clear with time. Some have come to define EMS as essentially only the prehospital phase of emergency care.

The Project’s original steering group recognized the IOM’s concept of “emergency care system” as being what the EMS Systems Act broadly defined as the “EMS System”. One purpose of the Project is to reinforce this broader definition of EMSS and to reinforce the responsibility and effectiveness of state EMS offices leadership in guiding the development, implementation and oversight of these systems. This leadership and an increased emphasis on a “systems approach” is especially important as EMS evolves and matures to meet the changing needs of an aging population.

The Project has identified the following products to assist in a multi-year project to enhance state EMS system development:

- **Year 1 (All Completed Calendar 2007; With Pilot Testing, Published July, 2008)**
 - **Model State Emergency Medical Services System.** This is a description of the idealized state emergency medical services system. It is organized in ten subsystems which generally reflect the evolution of thinking about the components and attributes of the EMS system. These have ranged from the original “15 components” of the EMSS Act of 1973 through the 10 components of the NHTSA Technical Assistance Team state EMS evaluation process, and the 14 components or attributes of the 1996 *EMS Agenda for the Future*. Each subsystem is then considered by the three core functions of public health system planning: assessment processes, policy processes, and assurance processes. The descriptions of each core function are based on the “highest” scoring (“5” on a “0 to 5” scale) descriptions for indicators of each as found in the State Emergency Medical Services System Self-Assessment tool (below).
 - **State Emergency Medical Services System Self-Assessment.** This is a guide to rating the strengths and weaknesses of the state emergency medical services system. For each subsystem, indicators have been developed and arranged by the three core public health functions (assessment processes, policy processes, and assurance processes) and by the “ten essential services” of public health which have been adapted for this tool (for more information on public health planning applications in EMS, please see the USDHHS Trauma Program document *Model Trauma System Planning and Evaluation*, pages 18 to 32). These indicators

recognize that a state EMS system should be a planned and coordinated organization of local, regional and state EMS capabilities on a statewide basis. Therefore, the indicators are broad in some respects (e.g. statutory authorization of the state system and its lead agency) and very specific in others (e.g. use of performance indicators, and performance against certain performance standards such as treatment rates).

- **Model State Emergency System Planning Process.** This is a brief discussion of the process for implementing the Self-Assessment and then incorporating the results into a state EMSS plan.

The products above have been successfully tested in several states and are now available through NASEMSO and on www.NASEMSO.org.

- **Year 2 (and Beyond)**
 - **State Officials Toolbox to Implementing the Model State EMS System Plan.** This is a set of guidance tools to assist state emergency medical services system officials in implementing the state emergency medical services system plan. These include:
 - (Year 2) **The Model State Emergency Medical Services System Lead Agency.** This document describes the idealized office, functions, staff, and responsibilities of the lead agency for the broadly defined state emergency medical services system.
 - (Year 2) **Model Statutory and Regulatory Content for State Emergency Medical Services Systems.** This document describes necessary statutory and regulatory content to authorize, fund and operate a broadly responsible state EMS lead agency and system based on the State Model EMS System Plan.
 - (Year 3 and beyond) **“Rainbow Series” of State EMS System Guidance Tools.** These will be guidance documents for state EMS offices on a variety of topics dictated by contemporary need. These may include model rules/regulations, policies/procedures, protocols and other documents evolving from the Year 2 activities. These might include:
 - Integration with the State Strategic Highway Safety Plan and with the State Highway Safety Office
 - Using the National EMS Information System (NEMSIS) Effectively in System Development.
 - Providing Effective Local Technical and Funding Support in an Era of Changing Emergency Medical Services System Provider Types and Self-Sufficiency.
 - Integrating EMS Communications Planning in Statewide Interoperable Systems.
 - Role of State Emergency Care Medical Directors.
 - The Public Health Approach to Emergency Medical Services System Planning and Implementation.

- Revised Curriculum for NASEMSO “New Directors Boot Camp”.
- Model policies, procedures, and memoranda of agreement for cross-border data collection.
- Model policies and procedures, agreements and other tools to facilitate development of a strong system of integrated local, regional and state medical direction .
- Policies related to the integration and regulation of air medical services.

II. Model Statutory and Regulatory Content for State EMS Systems

The purpose of the *Model Statutory and Regulatory Content for State EMS Systems* document is to provide state EMS system (EMSS) leaders and state policy makers with concepts to guide the regulation and oversight of state EMS systems. Depending on the state, these might be included in state statute, in administrative regulations/rules, in policies and procedures or in other tools unique to a state. Regardless of the manner in which they are used, the concepts should help assure that the state will provide broad statewide EMS system leadership, programming and operations to oversee and facilitate modern systems of regionalized, accountable emergency medical care. Such systems are described in the 2008 document *State Emergency Medical Services Systems: A Model*.

State Emergency Medical Services Systems: A Model based its findings on current studies of EMS systems, as well as expert panel discussions and national consensus. This document summarizes how that Model can be implemented through the state executive and legislative processes. While this document was initially an effort to create model legislation and regulation, it quickly became apparent that the differing conventions of state legislative and regulatory processes, document organization, and language precluded this approach. Therefore, this document presents common, key provisions which can be translated into the state's statute and administrative rules and into statewide treatment/practice patterns.

As with the *State Emergency Medical Services Systems: A Model*, this document organizes its coverage by employing a state model system consisting of ten subsystems:

1. System Leadership, Organization, Regulation & Policy Subsystem
2. Resource Management Subsystems – Financial
3. Resource Management Subsystems - Human Resources
4. Resource Management Subsystems – Transportation
5. Resource Management Subsystems – Facility and Specialty Care Regionalization
6. Public Access and Communications Subsystems
7. Public Information, Education and Prevention Subsystem
8. Clinical Care, Integration of Care, and Medical Direction
9. Information, Evaluation, and Research Subsystem
10. Large Scale Event Preparedness and Response Subsystem

While *Emergency Medical Services Systems: A Model* used a public health planning framework of three “core functions” (assessment, policy development, and assurance) to describe each subsystem, that framework does not work well to describe state statutory authority and regulatory content. However, the public health framework is still useful for conducting statewide EMS planning.

For a more detailed discussion of this approach, and to compare the model statutory and regulatory content with the original 2008 state EMS system model, please refer to the NASEMSO website (<http://www.nasemso.org/Projects/ModelEMSPlan/index.asp>).

The Model Statutory and Regulatory Content for State EMS Systems:

- A. Detailed Model Statutory and Regulatory Content Guide** - This section presents descriptions of recommended statutory and regulatory content. For each of the ten subsystems, the discussion begins with an “Overview” listing the basic goal, or state of the system, to be achieved by implementing the content. That is then followed by specific, suggested statutory content. For most of the statutory content, there is also suggested regulatory or other content.
- B. Self-Assessment Checklist** – This is a tool for inventorying a state’s current EMSS statutory and regulatory content against the recommended content. Questions about intent or definitions in the Checklist can be referred to the same subsystem section in the Detailed Model Statutory and Regulatory Content Guide.

Notes:

1) This document is intended to recommend content and not specific language. Therefore, some language is purposely non-specific (e.g. “adequate”, “timely”, “regularly”, “routinely”) to allow states flexibility in using their own definition conventions.

2) When responsibility is assigned to the state EMSS lead agency, it is up to that agency to determine the mechanisms and processes used to carry out that responsibility and whether they are local, regional or state level.

3) When responsibility is assigned to the state EMSS lead agency, it is understood that the functions required to fulfill that responsibility may be assigned to another state agency. This is acceptable providing the state EMSS lead agency can assure the responsibility is fulfilled through collaboration with that other agency.

4) The concept of regional or regionalized, coordinated, and accountable systems of care is too complex to translate into a single statutory/regulatory content. In some states (e.g. smaller states), all of these systems of care may be coordinated on a statewide basis and not through regions. In other states, these may be coordinated on a regional basis with funded, robust regional infrastructures. And, in yet other states, these may be coordinated on both a regional and statewide basis. The language of this document intends that states use the type of organization appropriate to achieve regionalized, coordinated and accountable systems of care in their state.

A. Detailed Statutory Content Guide

Note:

The **numbered and bolded content** below should be **authorizing/enabling statutory content** for the EMS system.

The **lettered and italicized content** below should be contained in the appropriate sub-statutory content (e.g. regulations, rules, policies, procedures, protocols, memoranda of understanding or agreement) consistent with the administrative processes of the state.

1. System Leadership, Organization, Regulation & Policy

Overview

A single state agency has the statutory authority for comprehensive leadership, development and regulation of the Emergency Medical Services System (EMSS). It has sufficient funding and authority to develop a statewide regionalized, coordinated and accountable system of emergency care. It utilizes a multi-disciplinary, multi-agency, broadly representative stakeholder body and committee structure to guide the development of the EMSS. The agency has routine and direct access to its cabinet level policy-maker or appointing agencies (for an independent board).

- 1. A single state EMSS lead agency shall have the authority and responsibility for comprehensive leadership, development and regulation of the Emergency Medical Services System (EMSS), including each of the ten EMSS subsystem components and the standards-setting authority/responsibility for each those components.**
 - a. The state EMSS lead agency shall be given routine and direct access to its cabinet level policy-maker or appointing agencies (for an independent board).*
 - b. The state EMSS lead agency shall develop and maintain clearly defined EMSS standards and regulations (e.g., facility standards, triage and transfer guidelines, and data collection standards) and will be empowered to ensure and enforce compliance with the standards/regulations.*
 - c. The EMSS lead agency will assure the use of performance tools to enforce prehospital agency compliance with all rules, regulations, or protocols (e.g., taking patients to the correct facility in accordance with pre-existing destination protocols).*
 - d. The EMSS lead agency shall provide, or assure, services addressing system needs to include but not be limited to:*
 - *Executive and clinical leadership*

- *System planning, coordination, and implementation*
- *Response and technical assistance.*

- 2. The positions of full-time state EMSS lead agency director and medical directors shall be authorized and filled. Their roles, responsibilities, qualifications, and reporting status will be defined.**
- 3. A state EMSS board or committee, either advisory to or with authority (independent board model) over the state EMSS lead agency, shall be established, integrated as part of the EMSS lead agency, adequately funded to support its routine activities, and maintained. The EMSS lead agency shall be required to solicit for the board a diverse and representative EMS stakeholder membership including local and state EMS and related associations.**
 - a. Its purpose shall be to assist (or to direct, if an independent board model) the development and implementation of the EMSS.*
 - b. The needs of pediatric and other special populations shall be integrated into rules and regulations and are represented on the state EMSS board.*
- 4. Local or regional municipal governments, or other forms or levels of government as appropriate in a given state, shall be required to assure the provision of EMS as an essential service. This should provide the same level of assurance of universal coverage as that required for fire protection and law enforcement.**
- 5. There are clearly defined statewide regionalized, coordinated and accountable systems of emergency care.**
 - a. There are regional infrastructures established uniformly under the state EMSS lead agency by rules, regulations, protocols or other policies to guide and monitor care.*
 - b. These regionalized, coordinated and accountable systems of emergency care routinely and uniformly report on care performance through the state EMSS lead agency.*
- 6. There is routine assessment of the EMSS which must utilize measurable program goals and objectives.**
 - a. There is an independent external assessment of the EMSS at least every five years; or instead, a broad-based and a sustained, clearly articulated statewide quality improvement process may be used.*
 - b. The assessment is linked with a strategic planning process to update the state EMSS plan.*

- c. *The state EMSS lead agency shall regularly review, through established committees and stakeholders, the statutes and regulations governing system performance, including policies and procedures for system operations at the State, regional, and local levels.*
- d. *The state EMSS lead agency will establish measurable program goals and outcome-based, time-specific, quantifiable, and measurable objectives that guide system effectiveness and system performance.*
- e. *System performance measurement and annual system performance and status reports shall routinely utilize state emergency medical services information system (EMSIS) data and be required to provide comparisons of their state's performance measurement with similar states using, in part, the National Emergency Medical Services Information System (NEMSIS) data.*
- f. *The state EMSS lead agency will develop and continuously update a comprehensive EMSS plan in conjunction with all key EMSS stakeholders, and include the integration of all ten subsystem components. This plan shall be linked to other relevant plans such as public health and the Strategic Highway Safety Plan to ensure that EMSS information is used to evaluate public health and highway safety problems and vice versa.*

7. Comprehensive, statewide annual EMSS performance and status reports will be created by the state EMSS lead agency and made easily available to the EMS community and public.

2. Resource Management – Financial

Overview

The EMSS infrastructure, including its lead agency, is adequately funded. Mechanisms exist to assure adequate payment for emergency care and to maintain the prehospital EMS safety net. There is effective integration of emergency care, primary care, specialty care and other patient preventive and treatment services and the mechanisms for reimbursement for these services provides incentives for this integration.

- 1. There shall be established and maintained a dedicated, non-lapsing source(s) of revenue, supplemented as necessary by general fund revenue, appropriate to the mission of the EMSS and the level of funding required to meet the budgetary needs of the state EMSS lead agency for:**
 - **Operations to complete its own statutory responsibilities.**

- **Operations and funding to complete the statutory responsibilities of the EMSS and its ten subsystems.**
2. **The EMSS lead agency will develop and submit a budget for its own operations and for the operations of the EMSS for which it is responsible under section 2.1, above. The EMSS lead agency shall be authorized to obtain the data required to create these budgets**
 - a. *State EMSS Lead Agency Budget: In establishing the proposed budget, during each regular budgetary cycle, for funds which it intends to apply to its operations and to the EMSS and its ten component subsystems, the state EMSS lead agency shall routinely utilize strategic planning processes, with broad-based stakeholder representation and participation, which are based data from state EMSS evaluations and/or specific statewide needs assessment processes.*
 - b. *EMSS Operations Funding: The state EMSS lead agency shall routinely seek EMSS operational financial data from the EMS Information System (EMSIS), providers, insurers, emergency department, hospital discharge, death certificate and rehabilitation data. These data, along with data on general EMSS infrastructure costs, are used to assess cost/benefit of the system and needs for EMSS lead agency and other state (e.g. state health insurances) funding of EMSS operations.*
 - c. *The state EMSS lead agency shall include reports on its budget status and the EMSS operations funding status in its EMSS system performance assessment and annual reporting processes.*

3. Resource Management - Human Resources

Overview

Organized processes exist for work force assessment, recruitment, retention, education as needed, and for identification and deployment of emergency medical care providers within the state for both routine and large scale event operations.

1. **The EMSS lead agency shall be required to routinely assess the adequacy of the EMSS workforce.**
 - a. *The workforce assessment shall consider, at least, personnel shortages and their causes, statewide trends in EMS personnel utilization, and wellness/health/safety issues specific to the EMS working environment.*
 - b. *A mechanism exists and is routinely employed to evaluate and change EMS education opportunities as a result of regular reviews of EMS system performance including workforce assessment.*

- c. *A component of the workforce assessment shall include establishing a performance measure for the turnover rate of prehospital licensed/certified personnel. The NHTSA Performance Measures (PM) Indicator “2- Annual Turnover Rate” or a similar measure shall be adopted as a statewide Performance Measure indicator and data contributing to it shall be routinely collected, and the results analyzed.*
- d. *Performance standards shall be established as policy for the indicators in section 3.1 (3.1.c, specifically, as well as any indicators created pursuant to 3.1.a) and it shall be policy of the state EMSS lead agency that performance will meet or exceed these standards and that interventions are sought to improve performance accordingly where necessary on a local, regional, and state level. .*
- e. *The EMSS lead agency shall document its actions to address needs identified by its routine workforce assessments or else document that no significant workforce needs or provider agency management issues exist.*
- f. *The EMSS lead agency provides recruitment, retention, and education program support and technical assistance where indicated by the workforce assessments that it performs.*
- g. *The EMSS lead agency shall routinely collect workforce data based on the most recent version of the DOT’s National EMS Workforce Data Definitions.*

2. The EMSS lead agency clearly defines the requirements for licensure/certification (meaning initial and renewal) as an EMS provider, consistent with the National Scope of Practice Model and National Education Standards.

- a. *The EMSS lead agency will adopt and implement scopes of practice for:*
 - *Emergency Medical Responder*
 - *Emergency Medical Technician*
 - *Advanced Emergency Medical Technician*
 - *Paramedic*
 - *Emergency Medical Dispatcher*
 - *Medical Director*

as well as the requirements for licensure/certification as an EMS provider, including at least:

- *Training/education*
- *Testing and other certification*
- *Local/regional permissions/credentials needed to practice, if any*
- *Criminal background clearance*
- *Health and physical*

- b. *The EMSS lead agency shall require national certification (employing a professionally validated, psychometrically sound, standardized national testing process similar to that of the current National Registry of EMTs, preferably accredited by a nationally recognized organization such as the National Commission for Certifying Agencies, and as identified in the National EMS Education Agenda for the Future: A Systems Approach to “certify” that a candidate has met a standard required by the state to license/certify the candidate to practice).*
 - c. *The EMSS lead agency shall require national accreditation (employing a qualifying national process similar to that of the current Committee on Accreditation for the EMS Professions and as identified in the National EMS Education Agenda for the Future: A Systems Approach) of paramedic education programs.*
 - d. *The EMSS lead agency shall maintain a mechanism for approving other levels of education programs or courses, as well as EMS instructor/educator/trainer credentialing, until such time as national accreditation is available at one or more of these levels. This mechanism shall employ standards that are consistent with the National EMS Education Standards. The lead agency shall require national accreditation (employing a qualifying process similar to that of the current Committee on Accreditation for the EMS Professions and as identified in the National EMS Education Agenda for the Future: A Systems Approach) of other levels of education programs within two years of accreditation availability.*
 - e. *The EMSS lead agency defines its process(es) to educate personnel in new protocols and treatment approaches adopted by medical direction, in a timely manner.*
 - f. *The EMS lead agency shall monitor compliance with new procedures as they are instituted.*
- 3. The EMS lead agency shall define and make publicly available its procedures for enforcing personnel compliance with laws, regulations, and policies pertaining to provider licensure/certification. These include processes for adequate review and due process.**
- 4. The EMSS lead agency is required to develop and manage a system to identify and deploy emergency medical care providers within the state or elsewhere for special and large scale event operations.**

4. Resource Management – Transportation

Overview

A mechanism exists to identify and assure adequate deployment of ground, air, and water response and transportation resources. These resources must meet specific standards of quality, to assure timely and appropriate response scaled to the nature of an event. There is an ability to monitor safety, response time and other state or locally specified performance measurements.

- 1. The state EMSS lead agency shall routinely assess the adequacy of ground, air, and water response and transportation resources and their deployment.**
 - a. This assessment shall be a part of the overall state EMSS performance assessment which is routinely conducted.*
 - b. As a part of this assessment tool, the state EMS lead agency shall develop and maintain performance measures for response, scene, and transport time intervals by both mean and 90th percentile measures. The NHTSA Performance Measures (PM) Indicators “10.1- Mean Emergency Patient Response Interval”, “10.2- 90th Percentile Emergency Response Interval”, “10.3- Mean Emergency Scene Interval”, “10.4- 90th Percentile Emergency Scene Interval”, “10.5- Mean Emergency Transport Interval”, and “10.6- 90th Percentile Emergency Transport Interval”, or similar measures, shall be adopted as statewide PM indicators.*
 - c. Performance standards shall be established as policy for the indicators in section 4.1.a and 4.1.b, and it shall be policy of the state EMSS lead agency that performance will meet or exceed these standards and that interventions are sought where necessary to improve performance accordingly on a local, regional, and state level.*
- 2. The lead EMSS agency will establish standards, drawing upon national or other evidence-based standards and guidelines where possible, for the equipping and operation of all EMS provider agencies as well as all ground and water ambulances and other EMS vehicles, and for the medical aspects of air medical services. The agency shall have enforcement authority, including well-defined due process procedures, to take timely and effective action when transportation and/or operational inadequacies are discovered that may pose a hazard to patients or the public.**
 - a. The lead EMSS agency shall conduct on-going performance improvement and/or regularly inspect vehicles utilizing the standards and performance indicators it has established. For air medical services, it shall assure that enforcement actions do not conflict with Federal airline regulation – either Federal Aeronautical Administration regulations or the Airline Deregulation Act.*
- 3. The state EMSS lead agency shall be empowered and funded to assure the provision of EMS coordinating and other facilitating services, and to assure**

the provision of EMS services in areas where usual and customary EMS services have been withdrawn, are overextended by mass casualty/disaster or special circumstances, or otherwise do not exist, and have been determined by the agency to be necessary.

- a. *The EMSS lead agency shall be responsible for, and be granted the authority to lead EMSS operations in statewide disaster planning and in mass casualty events that exceed local EMS agency and hospital mutual aid capabilities in cooperation with other agencies.*

5. Resource Management – Facility and Specialty Care Regionalization

Overview

Regional, accountable systems of emergency medical care are effectively integrated into the statewide EMSS and formally designated by the lead agency. These systems are organized to identify, treat and route critically ill or injured patients who would benefit from immediate trauma, cardiac, stroke, pediatric, or other types of specialty care. The EMSS lead agency must be authorized and adequately funded to supervise the activities of these statewide, contiguous, regionalized, accountable systems of care and to designate and implement staffed regional infrastructure as dictated by the size and complexity of the state to support them. There may be multiple regional, accountable systems of care for a single type of specialty care (e.g. trauma) which are designated by the lead EMSS agency to form a statewide, coordinated network of coverage, or there may only be a single accountable system of care. Regardless, such regional accountable systems of care will be organized by the lead EMSS agency under its statewide EMSS medical committee. In this manner, there will be centralized oversight and coordination of the operations, protocols, policies, performance improvement and other aspects of these specialty care systems.

- 1. The state EMSS lead agency shall be authorized and adequately funded to establish and maintain a statewide network of regional, accountable systems of care (at a minimum: trauma, cardiac, stroke, pediatric emergency). Where necessary, the state is authorized and funded to designate, establish, and operate regional administrative infrastructure to support these systems of care. This infrastructure may support single or multiple specialty systems of care in a region depending on the size and complexity of the regions in the state.**
 - a. *If regional infrastructure is deemed by the EMSS lead agency to be necessary, it shall establish processes and administrative infrastructure, to support planning, implementation and coordination of regional, accountable systems of care. The state EMSS lead agency shall base regional definitions and boundaries on the geographic organization of all the specialty systems of care, their designated specialty system hospitals, and patient flow around them. If this is done, the state EMSS lead agency shall develop a participatory, representative process for the designation of*

regional, accountable systems of care and their boundaries. Emergency management, emergency health preparedness, and public safety agencies shall be included in these discussions in order to coordinate regional response organization.

2. For each statewide network of regional, accountable systems of care, the EMSS lead agency will establish and operate a broadly representative coordinating committee reporting to the state EMSS medical committee.

- a. These committees will have broad stakeholder representation and meet regularly to develop and implement those specialty care systems. They shall:
 - *Develop system plans which shall be integrated effectively into the statewide EMSS plan and its on-going review and improvement.*
 - *Assure that their system components coordinate well through the lead agency and state medical committee (e.g. medical direction subsystem development of prehospital protocols draws upon representatives of specialty care systems for protocols in those areas).**
- b. The state EMSS lead agency, through its medical committee overseeing the specialty care committees, shall develop standard definitions of transfer “qualifying patient” for each specialty care system.*
- c. The state EMSS lead agency will implement statewide processes to base transfers on the definitions of transfer “qualifying patient” in the specialty systems of care. These shall be linked to state level performance improvement and medical direction review subsystems, and updated as needed on a statewide basis. They will also be linked to regional level systems where regions have been designated by the state EMSS lead agency.*
- d. The state EMSS lead agency, through its medical committee overseeing the specialty care committees, shall establish statewide prehospital triage criteria for each specialty care system. These shall include specific criteria for transporting “qualifying patients” so that they bypass emergency departments of hospitals not designated as specialty care centers of the type required by the patient. These shall be linked to performance improvement and medical direction review for appropriateness in identifying “qualifying patients” and in ensuring that they are transported to the appropriate specialty care facility. Where transfer volumes are insufficient to measure this appropriateness, there is assurance that transfer protocols and agreements are in place. Sensitivity and specificity (over- and under-triage rates) of the criteria used shall be regularly reported through the state EMSS lead agency and its specialty care committees. Updates to the triage criteria shall be made as necessary to improve system performance. Where regional infrastructure has been created by the EMSS lead agency, the state medical committee can*

determine which of these responsibilities may be delegated to regional medical committees and specialty care committees.

- 3. The state EMSS lead agency is authorized to establish and maintain a process for the designation of emergency medical and specialty care facilities that is governed by the EMSS lead agency through its medical committee overseeing the specialty care system committees and which may utilize a national verification body or its standards. The EMSS lead agency shall have the authority to designate emergency medical and specialty care hospitals and to establish criteria for the designation which may be based on existing national standards. The EMSS lead agency shall prescribe administrative rules or State policies regarding the procedures for designation, for disciplinary action and for de-designation.**

- a. The state EMSS lead agency shall assure that hospitals and other affected facilities are represented in the regional, accountable systems of care performance improvement processes and benchmark their performance against local and national standards. The state EMSS lead agency shall assure that issues of noncompliance are monitored and addressed as part of the regional performance improvement process. The state EMS lead agency is authorized to remove a hospital specialty care designation, but this is reserved only as a final public health safeguard. This action will be delegated to the designated regions by the state EMSS lead agency if such regional structures and committees exist, otherwise it will make the decision through its state EMS medical committee overseeing the appropriate statewide specialty care system committee.*

- 4. The state EMSS lead agency shall, as a part of its routine assessment of statewide system performance, assess the adequacy of its regional, accountable systems of emergency medical care. It shall be authorized under the designation authority in section 5.3, above , to intervene when assessments indicate the need to do so.**

- a. The state EMSS lead agency shall establish at least the following statewide performance measures for regional and statewide reporting. Data contributing to them shall be routinely collected and the results shall be analyzed at all levels. Similar measures shall be developed for all specialty systems of care established:*

- A performance measure has been established for “Major Trauma Triage to Trauma Center Rate”. The NHTSA Performance Measures (PM) Indicator “5- Major Trauma Triage to Trauma Center Rate” or a similar measure has been adopted.*

- *A performance measure has been established for “STEMI Triage to Specialty Center Rate”. The NHTSA Performance Measures (PM) Indicator “9- STEMI Triage to Specialty Center Rate” or a similar measure has been adopted.*
- b. *Performance standards shall be established as policy for the indicators in and otherwise created pursuant to section 5.2.a and it shall be policy of the state EMSS lead agency that performance will meet or exceed these standards and that interventions are sought to improve performance accordingly on a local, regional, and state level.*
 - c. *The state EMSS agency shall monitor hospital decisions activate facility bypass, and the circumstances that led to those decisions, and determine whether those decisions were reasonable or whether intervention is required.*

6. Public Access and Communications

Overview

A subsystem exists to organize wire-line, cellular, voice over internet protocol, automatic crash notification, patient alerting system device and other public 9-1-1 access to the Emergency Medical Services System. The EMSS utilizes all voice, video, telemetry, and other data communications as necessary to best enhance real-time information management for patient care. Medically directed systems of emergency medical dispatch (EMD) and communications are in place to adequately support the statewide regionalized, accountable systems of care. Regional communications centers may be employed based on the size and organization of the state, and will be coordinated on a statewide basis by, or with input from, the EMS lead agency.

- 1. The state EMSS lead agency will assure and coordinate an EMS public access and communications subsystem, which may be organized as coordinated regional communications centers, and will participate in management of interoperable public safety access and communications subsystems statewide.**
 - a. *The state EMSS lead agency shall produce and maintain an EMSS communications system plan and a separate system user’s guide which provide guidelines and goals, respectively, for system improvement and for day to day system use. The plan and guide shall also specifically address according to their different audiences and purposes:*
 - *The capabilities within the EMSS for wire-line, cellular, voice over internet protocol, automatic crash notification, patient alerting system device and other public 9-1-1 access.*

- *A process to improve how the EMSS will utilize all voice, video, telemetry, and other data communications as necessary to best enhance real-time information management for patient care.*
 - *How medically directed systems of emergency medical dispatch (EMD) and communications are in place or will develop to adequately support the statewide regionalized, accountable systems of care.*
 - *How the statewide EMSS communications interoperability will progress as a whole from its current status to the far right on the USDHS SafeCom Interoperability Continuum (below).*
- b. *The state EMSS lead agency will assure the establishment and maintenance of an index of EMS agencies, emergency medical dispatch centers, and hospitals listing (as appropriate) their emergency access type (9-1-1, E-9-1-1, other), direct ten-digit dispatch number, ten-digit business number, dispatch voice frequency, dispatch data frequency, field to hospital frequency/ies, hospital to hospital frequency/ies, EMS tactical frequency/ies, broadband or wideband frequency/ies and purpose. As appropriate, the state EMSS lead agency will incorporate this information into its EMSS communications system user's guide.*
- c. *The state EMSS lead agency shall also assure the establishment and maintenance of a list of major communications system assets (at least fixed radio consoles and mobile units, towers, base stations, and recording equipment) by date and type.*
- d. *The state EMSS lead agency will assure the development of clinically validated EMD protocols with statewide input and with EMSS medical direction oversight. These shall recognize that EMD protocols for resource dispatch must be specific to the resources present in any given locale and decisions on these protocols must reflect input of those locales.*
- e. *The state EMSS lead agency shall assure the establishment of procedures to involve representatives of EMD staff in EMD and EMSS performance improvement and a "feedback loop" to change protocols or to update dispatcher education when appropriate. These protocols shall include, but are not limited to, which resources to dispatch (for example, Advanced Life Support (ALS) versus Basic Life Support (BLS), use of lights and sirens mode, early notification of the air medical and specialty facility resources, pre-arrival instructions, and other procedures necessary to ensure resources dispatched are consistent with the needs of emergency patients.*
- 2. The state EMSS lead agency will be empowered to require that all emergency callers to Public Safety Answering Points (PSAPs) are assured of interaction with EMD certified staff in a facility whose EMD program has a medical**

director and has been reviewed and approved/certified by the state EMSS lead agency.

3. The following is model content which impacts the EMS access and communications subsystem, but is not intended as content under the EMS statute or as a sole responsibility of the EMSS lead agency (however, where such content does not exist somewhere in state statute, the EMS lead agency shares in the leadership responsibility to see that it is implemented as appropriate):

A state agency shall be designated and adequately funded within the executive branch to coordinate statewide interoperable public safety access and communications.

a. This agency shall:

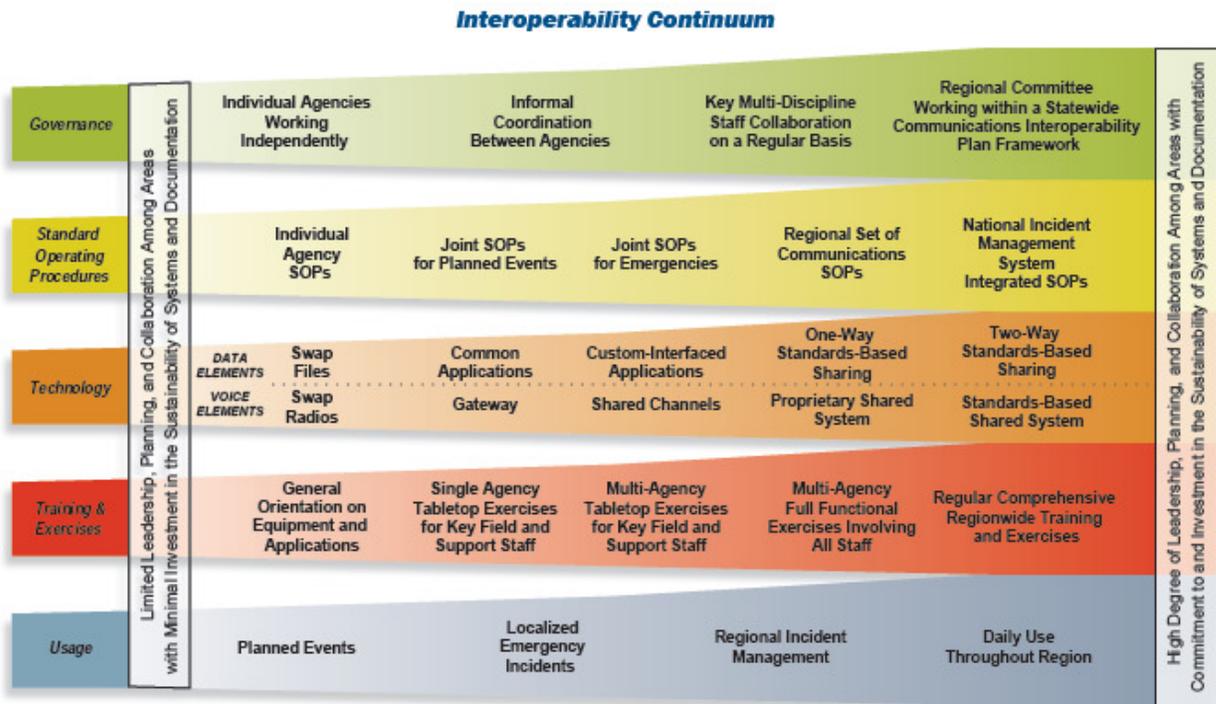
- *Plan, coordinate, implement, manage, and enforce policies for interoperable communications including in-state and neighboring state/province/territory frequency coordination*
- *Name a multidisciplinary statewide interoperability executive committee (SIEC) or similarly named and functioning body that has representation from the state EMSS lead agency and local EMS and hospital providers*
- *Produce and disseminate a public safety statewide communications interoperability plan (SCIP) integrating the EMSS communications system plan.³*
- *Produce a “system user’s guide” which explains NIMS and SafeCom compliant policies and procedures for participation in the public safety communications interoperable system (e.g. use of interoperability channels in major events and plain language usage at all times).*
- *Establish as a goal, within a specified period, that all jurisdictions are at least at mid-point, and most are at the far right on the SafeCom Interoperability Continuum (below).⁴*

b. The executive branch is required to assure, through the appropriate agency, that state-of-the-art electronic, seamlessly linked citizen access (specifically E-9-1-1 and wireless E-9-1-1) and dispatch communication systems are available within all jurisdictions and utilize state-of-the-art EMD and other dispatch procedures routinely evaluated in an on-going performance improvement program.

c. The executive branch is required to assure, through the appropriate agency, that state-of-the-art electronic communication systems are available within all jurisdictions and are coordinated by an SIEC or similar body. The systems shall:

- *Constitute a linkable statewide system, ideally coordinated in a single EMS or other state communications center or through linked, statewide regional communications centers, that is utilized for day to day operations and is effective in all-hazards responses.*
- *Be linked to public health and other nontraditional partners.*
- *Be routinely evaluated on a statewide basis and affords narrowband, wideband and broadband solutions to EMS agencies and facilities in all jurisdictions.*

US Department of Homeland Security, SafeCom Interoperability Continuum
(as referred to by the last bullet in section 6.3.a above)



7. Public Information, Education and Prevention

Overview

A subsystem exists to monitor and identify those health care needs that can be addressed by the EMSS integrated with primary care and other health/medical service systems. Specific public information and education components should include the public’s familiarity with the EMSS and appropriate access to that system, self-help and bystander care.

1. **The state EMSS lead agency will be responsible for identifying and implementing means to better integrate EMS providers into their communities to improve citizen use of EMS, the availability of EMS, and the use of EMS providers to address health care needs in the community. Methods will include public information, education, prevention, community EMS assessment and informed self-determination, and community paramedicine programming. These are described in rules/regulation and/or policy/procedure content below.**
 - a. *The state EMSS lead agency shall periodically assess public expectations about the EMSS such as access, speed of response, and level and type of care expected. The results of this activity shall be utilized to focus public information and education activities and system service development.*
 - b. *The state EMSS lead agency shall maintain routine and effective links with local, regional, and state policy-makers, as well as the media, to inform them and the public about proper use and expectations of the EMSS on a day-to-day basis and during large scale emergencies, use of public funds in the development and maintenance of the EMSS, and the structure and effectiveness of the EMSS.*
 - c. *The state EMSS lead agency shall maintain a written descriptive, graphic, and/or tabular comparison of the top ten leading causes of emergent illness and injury death using local, regional, statewide, and national data and will use these, at least as a component, in its on-going system performance improvement assessments.*
 - d. *The state EMSS lead agency and the state agency charged with public health epidemiology will work cooperatively and employ data sharing and/or linkage to assess emergent illness/injury and ways to improve EMSS and other health system response.*
 - e. *The EMSS lead agency shall provide a formal technical assistance program for communities. This shall include a detailed explanation of community EMS system evaluation methods and informed self-determination processes (through which communities can evaluate their local EMSS, learn about alternative levels and type of EMS response and their comparative costs and then determine the type of system and level of public cost they prefer)⁵. The EMSS lead agency shall direct staff support, guidance materials and subsidies to these programs.*
 - f. *The EMSS lead agency will routinely distribute public information, education, and relations (PIER) support materials to provider agencies, will publicize this availability, and will provide staff technical assistance to local agencies as requested. This program shall include resources to raise the profile of the local EMSS and explain its appropriate use, and to enhance emergency illness/injury prevention efforts in the community.*

- g. The EMSS lead agency will provide resources to encourage community health/medical and EMSS leaders to explore opportunities for EMS to become involved in directly meeting preventive health, primary care and other needs in the community in order to strengthen the clinical base and response capabilities of the EMSS agency. This shall encourage consideration of “community paramedicine” (using paramedics and EMTs to provide health/medical services in the community between emergency calls)⁶, and shall offer technical assistance in approaching issues such as medical direction and training for such services.*

8. Clinical Care, Integration of Care, and Medical Direction

Overview

This subsystem identifies and guides the organized relationships among local, regional, and state providers of medical direction, their mechanisms and authority for clinical oversight and the establishment of medical and operational protocols, for the clinical services of EMSS providers and their integration within other community systems of care.

- 1. The state EMSS lead agency shall define and enforce, through standards, regulation, policies, and procedures (including protocols) all EMS clinical practice.**
 - a. The following performance measures shall be established as statewide measures, data contributing to them shall be routinely collected and results shall be analyzed at all levels:*
 - A performance attribute measure for the types of calls received by the EMSS: The NHTSA Performance Measures (PM) Attributes “17.1- Call Complaint Distribution” and “17.2 – Call Complaint Rate”, or similar measures, (e.g. with a goal of better matching resources to call types experienced).*
 - A performance measure for prehospital relief of pain: The NHTSA Performance Measures (PM) Indicators “6.1- Pain Relief Rate”, “6.2- Pain Worsened Rate”, and “6.3- Pain Unchanged Rate”, or similar measures.*
 - A performance measure EMS cardiac arrest survival rate to hospital discharge: The NHTSA Performance Measures (PM) Indicator “18.2- EMS Cardiac Arrest Survival Rate to Hospital Discharge” or similar measure.*
 - A performance measure for at least one additional indicator of EMSS interest in expanding its role to meet the changing needs of the patient population (e.g. this might be coordinated with the emergent illness/injury system performance interests of subsystem component number 7, above).*

- b. *Performance standards will be established as policy for the indicators in section 8.1.a and it shall be policy of the state EMSS lead agency that performance will meet or exceed these standards and that interventions are sought where necessary to improve performance accordingly on a local, regional, and state level.*
- c. *Standards will be established for initiating and maintaining medical director recruitment and retention activities.*
- d. *The state EMSS lead agency shall employ a documented, effective system of performance improvement which has specific points of integration with and separation from disciplinary and other licensure/certification actions and is coordinated well with the statewide medical direction system. In all enforcement practices, the lead agency shall maintain well-defined procedures for adequate review and due process. There shall be medical director oversight of all state, regional and local patient care-related quality improvement.*

2. The state EMSS lead agency is authorized to define and credential, by regulation, the role and responsibilities of EMS medical directors at all levels and their functional interconnection, and their reporting and authority relationships.

- a. *Medical direction will, at a minimum be defined as the processes of protocol adoption, performance improvement, credentialing the practice of EMS providers and provider agencies, and directing the care of EMS providers. restrict*
- b. *The state EMSS lead agency shall employ medical committees as deliberative, advisory or authoritative, bodies at appropriate local, regional and/or state levels to encourage and facilitate the two-way (local through state level) flow of information and input to support medical direction and the processes described immediately above.*
- c. *The state EMSS lead agency shall, as a part of its routine assessment of statewide system performance, assess the adequacy of medical provider workforce for maintaining the system of medical direction on a state, regional, and local basis.*
- d. *The EMSS lead agency shall require EMSS medical directors to be credentialed. The EMSS lead agency credential shall require a specific initial training program and on-going continuing education as determined by a medical committee of emergency medicine practitioners familiar with EMS systems and the availability of and constraints on emergency medical professional resources throughout the state.*

- 3. The state EMSS lead agency medical director is authorized to have the ultimate authority and responsibility for EMSS medical direction statewide. This authority and responsibility may, by regulation, be delegated to state, regional and/or local medical committees and/or medical directors, and this authority and responsibility will be accompanied by delegated governmental or other protection from liability. Further delegation of EMSS medical decision-making and practice to EMSS providers shall be made through EMSS protocols which may be adopted as a matter of state EMSS lead agency policy, and which may have opportunities for local variation. In a disaster or significant event, the State EMS Medical Director shall have the authority to modify, on an emergent basis, the Scope of Practice of EMS providers, to establish emergency and temporary protocols and to establish the additional training and competency certification, if any, that may be required.**

9. Information, Evaluation, and Research

Overview

The state EMSS lead agency is assigned responsibility, authority, and adequate resources for the collection of accurate data on EMSS activity, including a NEMSIS compliant and integrated patient care/call reporting (PCR) subsystem with 100% provider participation, a regionalized subsystem of performance improvement, and a mechanism to encourage research to improve patient care and EMSS operations.

- 1. A National EMS Information System (NEMSIS) compliant EMS Information System (EMSIS) shall be implemented and maintained by the state EMSS lead agency, and all EMSS provider agencies shall be required to provide data electronically on a regular, timely basis. The state EMSS lead agency is authorized to submit appropriate EMSIS data to NEMSIS, to participate in NEMSIS programs, and to utilize NEMSIS data to assist in EMSS improvement through inter-state benchmarking and other comparisons. EMSS stakeholders are required to submit data as required by the state EMSS lead agency to monitor the financial and operational aspects of the system.**
 - a. At a minimum, providers will submit data on all emergency calls for assistance regardless of their disposition/conclusion (transport or otherwise), and on all non-emergency transports. These will include all events handled by the state's licensed/certified agencies/services regardless of where the event occurred, and all in-state events handled by an out of state service.*
 - b. The EMSS lead agency shall routinely utilize NHTSA Performance Measures (PM) and additional state EMSS created indicators (including outcome measures) and attributes to gauge the effectiveness of the EMSS*

at all levels and against state and national results. The lead agency shall provide these to the public with appropriate explanation and system improvement suggestions.

- c. The state EMSS lead agency and the state agency charged with public health epidemiology shall maintain a cooperative, well-integrated, emergent illness/injury reporting system. This system will be utilized for the specific monitoring of work-related illnesses and injuries for the EMS workforce.*
 - d. The state EMSS lead agency will be required to establish a system encouraging and facilitating system providers to routinely use EMSIS data to identify program needs, to develop strategies on program priorities, and to set annual goals for emergent illness/injury prevention.*
 - e. The statewide multidisciplinary, multi-agency EMSS (advisory or authority) body formally shall delegate by rule to a statewide medical direction committee, or other similar body, the responsibility to complete regular system-level reviews of annotated EMSIS data reports to determine and recommend the need for system modifications. This process should be integrated with and comprise part of the statewide system performance assessment process.*
 - f. The state EMSS lead agency shall create (or require to be provided), statewide, regional, and jurisdictional/local agency EMSIS data reports no less than once per year to assure system and agency accountability for the services provided at each level. The lead agency shall specify the data/measures to be included.*
 - g. The state EMSS lead agency shall identify all EMSS data stakeholders. The state EMSS lead agency and these stakeholders will be required to execute data access agreements to assure that clinical, operational, financial and other performance aspects of the EMSS may be routinely measured and monitored.*
- 2. The state EMSS lead agency shall be required and authorized to collect and analyze death certificate data, by E-code. These should be used for the overall assessment of EMSS care, including statewide rural and urban preventable mortality studies. If another agency is already responsible for collecting these data, the EMSS lead agency should be authorized to also receive them.**
- 3. The state EMSS lead agency shall be assigned adequate hardware and software infrastructure and staff resources to deterministically and probabilistically link, analyze, and report from a variety of data sources in a**

routine and timely manner on the performance of all ten subsystems described in this document.

- 4. The EMSS lead agency is authorized to establish regulations, policies, procedures, and memoranda of agreement, as appropriate, to provide data to NEMIS and to allow data collection with other states' EMSS lead agencies for cross-border operations.**
- 5. The state EMS lead agency is authorized to enforce EMS provider agency participation in the EMSIS and statewide performance improvement (PI) systems, as well as hospital and health care facility participation in EMSIS for operational, clinical, and outcome evaluation purposes.**
 - a. The state EMSS lead agency shall be required to assure, through written policy and/or other means, that there is compliance concerning data management and governance including an evaluation of the quality, timeliness, and completeness of data, with confidential protection of records ensured while allowing appropriate access for research purposes.*
 - b. EMSS hospitals and other facilities identified as EMSS system participants shall be required to facilitate real-time data transmission for operational and clinical purposes (e.g. field access to patient history; on-line medical direction access to field data on patients and resources). They will also be required to provide data linkage for retrospective outcome evaluation.*
 - c. The state EMSS lead agency shall develop and maintain a statewide performance improvement (PI) plan with mandatory prehospital and hospital provider participation at the state, regional, jurisdictional, and local agency level with dedicated, specified medical oversight. All EMSIS, hospital and other data and information utilized in PI review processes shall be protected from discoverability. This plan shall not be exclusive of other PI, system assessment or data collection activities described in this document but should be well integrated with them. This plan shall include a mechanism for reporting patient care/treatment errors.*
 - d. State EMSS lead agency policies for educational programs shall require that familiarity with the scientific literature, appropriate research principles, and the value of initiating and participating in research to produce evidence-based advancement of the field are included in EMS education content.*

10. Large Scale Event Preparedness and Response

Overview

A National Incident Management System (NIMS) compliant subsystem exists to enable the scaling up of day-to-day operations to meet the needs of larger, all-hazards events.

Threat and capabilities assessments have identified the likeliest events to occur in the state and the capabilities required and available to address them. It is essential that mass casualty responses involve logical expansion and extension of daily practices and not the establishment of new practices reserved for large scale events. Equipment, human and other resources are described in a manner compliant with NIMS resource typing definitions. The state EMSS plan described below is an operational plan or system user's guide and not the traditional "state EMSS plan" which is a developmental strategic plan.

- 1. The EMSS plan (including user's guide) shall have clearly defined methods of integrating with other state emergency preparedness plans (all-hazards). The EMSS plan shall address the lead agency's coordination among EMS, public health, public safety and emergency management. The state EMSS plan (including system user's guide) shall be rehearsed, and shall be supported by sufficient funding for training and exercises as well as for caches of equipment and backup personnel, that ensure the rapid deployment of additional resources during mass casualty incidents.**
 - a. The state EMSS plan (including user's guide) and other state agency response plans shall be well integrated and include annual multidisciplinary exercises to test this capability using scenarios based on appropriate targeted capabilities lists, risk vulnerability assessment, and Homeland Security Exercise and Evaluation Program (HSEEP) guidelines. Results from drills and live responses must be analyzed and used to further improve the plans and processes.*
 - b. The EMSS plan (including user's guide) shall specify means to allow EMS resources to be used across jurisdictions, both intrastate and interstate, using the Emergency Management Assistance Compact, memoranda of understanding, the National Incident Management System, and other contracting arrangements which may be in force on the national level..*
 - c. The state EMSS lead agency, in conjunction with the state emergency management lead agency, will assure that the EMSS adequately identifies additional resources (both manpower and equipment) necessary to respond to a large scale mass casualty incident and utilizes NIMS compliant resource typing definitions to describe these.*
 - d. The EMSS plan (and user's guide) has specific provisions for an influenza pandemic based on the most recent version of the DOT's pandemic influenza preparedness guidelines and clinical guidance from the CDC .*
 - e. The state EMSS lead agency is required to conduct a resource assessment of the EMSS' ability to expand its capacity to respond to mass casualty incidents (MCIs) in an all-hazards approach.*

- f. *The state EMSS lead agency, in conjunction with the state emergency management lead agency will complete a gap analysis comparing the resource assessment for EMSS emergency preparedness and system resource standards adopted.*
- h. *The state EMS lead agency shall perform an assessment of need for protective resources (including vaccinations, prophylaxis, and personal protective equipment) for EMS providers and their families. The lead agency shall maintain a system for routinely reassessing the need for protective resources and for identifying new providers as they enter the EMSS. Based on this assessment, all of the resources identified as being needed shall be assured as available by the lead agency.*
- i. *The EMSS, through the lead agency, shall identify and have access to additional equipment, materials, and personnel for large-scale events. The lead agency shall maintain additional equipment and materials for EMS response to all-hazards events.*
- j. *The state EMSS lead agency has implemented a deployment mechanism to share personnel resources and this shall be tested on a routine basis in both the prehospital and hospital settings (e.g., mutual aid, precredentialing of practitioners, and rapid assignment of privileges).*
- k. *The State EMS lead agency shall have legal authority, based upon the Model State Emergency Health Powers Act, to modify the scope of practice of EMS personnel during an influenza pandemic and other public health emergencies. This shall include enabling EMS providers to treat and release patients while still assuring appropriate education, medical oversight and quality assurance.*

B. Self-Assessment Checklist

1. System Leadership, Organization, Regulation & Policy

- a. Statewide regionalized, coordinated and accountable systems of emergency care are defined, have adequate support infrastructure, and report on care performance.
Yes___ Statute/Regulation/Other Citation:

No ___ Need: New Language ___ Amend Language in _____

Partial/Inadequate___ Amend Language in_____

- b. An independent external assessment of the EMSS is routinely done or replaced by a broad quality improvement program, and the results are tied to strategic planning.
Yes___ Statute/Regulation/Other Citation:

- No ___ Need: New Language ___ Amend Language in _____
 Partial/Inadequate ___ Amend Language in _____
- c. A single state EMSS lead agency is designated with comprehensive leadership, development and regulation responsibilities, and with direct reporting to cabinet level policy-maker.
 Yes ___ Statute/Regulation/Other Citation:

 No ___ Need: New Language ___ Amend Language in _____
 Partial/Inadequate ___ Amend Language in _____
- d. The state EMSS lead agency will set clear system performance standards for all EMS participants.
 Yes ___ Statute/Regulation/Other Citation:

 No ___ Need: New Language ___ Amend Language in _____
 Partial/Inadequate ___ Amend Language in _____
- e. The state EMSS lead agency director and medical director are identified, have full-time positions, and their qualifications, and reporting status defined.
 Yes ___ Statute/Regulation/Other Citation:

 No ___ Need: New Language ___ Amend Language in _____
 Partial/Inadequate ___ Amend Language in _____
- f. A representative state EMSS body, either advisory or authority, is established.
 Yes ___ Statute/Regulation/Other Citation:

 No ___ Need: New Language ___ Amend Language in _____
 Partial/Inadequate ___ Amend Language in _____
- g. Pediatric and other special population needs are recognized and have representation on state EMSS representative body.
 Yes ___ Statute/Regulation/Other Citation:

 No ___ Need: New Language ___ Amend Language in _____
 Partial/Inadequate ___ Amend Language in _____
- h. Rules/regulations and policies/procedures are routinely reviewed.
 Yes ___ Statute/Regulation/Other Citation:

 No ___ Need: New Language ___ Amend Language in _____
 Partial/Inadequate ___ Amend Language in _____
- i. Measurable EMSS program goals and objectives are established and guide system performance.

Yes ___ Statute/Regulation/Other Citation:

No ___ Need: New Language ___ Amend Language in _____
Partial/Inadequate ___ Amend Language in _____

- j. A comprehensive EMSS plan is established and routinely updated.

Yes ___ Statute/Regulation/Other Citation:

No ___ Need: New Language ___ Amend Language in _____
Partial/Inadequate ___ Amend Language in _____

- k. Local government is required to assure the provision of EMS.

Yes ___ Statute/Regulation/Other Citation:

No ___ Need: New Language ___ Amend Language in _____
Partial/Inadequate ___ Amend Language in _____

- l. EMSS performance improvement processes and enforcement of prehospital agency compliance with all rules, regulations, or protocols are assured.

Yes ___ Statute/Regulation/Other Citation:

No ___ Need: New Language ___ Amend Language in _____
Partial/Inadequate ___ Amend Language in _____

- m. The EMSS lead agency shall provide leadership and technical assistance services.

Yes ___ Statute/Regulation/Other Citation:

No ___ Need: New Language ___ Amend Language in _____
Partial/Inadequate ___ Amend Language in _____

- n. Comprehensive annual reports on the performance and status of the statewide EMSS will be based on EMSIS and NEMSIS data and are published.

Yes ___ Statute/Regulation/Other Citation:

No ___ Need: New Language ___ Amend Language in _____
Partial/Inadequate ___ Amend Language in _____

2. Resource Management – Financial

- a. The proposed EMSS agency budget is based on strategic planning processes, data from EMSS evaluation and/or performance improvement processes, and stakeholder input.

Yes ___ Statute/Regulation/Other Citation:

No ___ Need: New Language ___ Amend Language in _____

Partial/Inadequate____ Amend Language in_____

- b. Cost/benefit analyses of the system will be routinely performed and published, with interventions as necessary, based on data which the EMSS lead agency is authorized to collect from all system participants.

Yes___ Statute/Regulation/Other Citation:

No ___ Need: New Language ___ Amend Language in _____

Partial/Inadequate____ Amend Language in_____

- c. A dedicated, non-lapsing source(s) of revenue, supplemented as necessary by general fund revenue, is established.

Yes___ Statute/Regulation/Other Citation:

No ___ Need: New Language ___ Amend Language in _____

Partial/Inadequate____ Amend Language in_____

3. Resource Management - Human Resources

- a. The state EMSS lead agency will routinely assess the adequacy of the EMS workforce. Data collected will be based on the USDOT's National EMS Workforce Data Definitions.

Yes___ Statute/Regulation/Other Citation:

No ___ Need: New Language ___ Amend Language in _____

Partial/Inadequate____ Amend Language in_____

- b. The state EMSS lead agency will define licensing/certification and relicensure/recertification requirements. The National Scope of Practice Model and National Education Standards are used as a framework.

Yes___ Statute/Regulation/Other Citation:

No ___ Need: New Language ___ Amend Language in _____

Partial/Inadequate____ Amend Language in_____

- c. Scopes of practice for EMS providers and medical directors are defined. The National Scope of Practice Model and National Education Standards are used as a framework.

Yes___ Statute/Regulation/Other Citation:

No ___ Need: New Language ___ Amend Language in _____

Partial/Inadequate____ Amend Language in_____

- d. A process for approval of education programs and courses, as well as EMS instructor/educator/trainer credentialing, is defined. A national accreditation process is utilized for paramedic education programs.
 Yes ___ Statute/Regulation/Other Citation:

 No ___ Need: New Language ___ Amend Language in _____
 Partial/Inadequate ___ Amend Language in _____
- e. A system for identifying and deploying providers within the state or elsewhere for large scale events upon request for a local provider is established.
 Yes ___ Statute/Regulation/Other Citation:

 No ___ Need: New Language ___ Amend Language in _____
 Partial/Inadequate ___ Amend Language in _____
- f. Due process procedures are in place.
 Yes ___ Statute/Regulation/Other Citation:

 No ___ Need: New Language ___ Amend Language in _____
 Partial/Inadequate ___ Amend Language in _____
- g. Roles and responsibilities of medical oversight at the local level are identified.
 Yes ___ Statute/Regulation/Other Citation:

 No ___ Need: New Language ___ Amend Language in _____
 Partial/Inadequate ___ Amend Language in _____

4. Resource Management – Transportation

- a. A statewide standardized tool is routinely used on the local/regional level to assess the adequacy of deployment of ground, air, and water response and transportation resources.
 Yes ___ Statute/Regulation/Other Citation:

 No ___ Need: New Language ___ Amend Language in _____
 Partial/Inadequate ___ Amend Language in _____
- b. As a part of this assessment tool, response time performance measures are used, performance standards are set, it is policy that the EMSSS will meet or exceed these standards, and interventions are sought when this does not happen.
 Yes ___ Statute/Regulation/Other Citation:

 No ___ Need: New Language ___ Amend Language in _____
 Partial/Inadequate ___ Amend Language in _____

- c. Standards are established for the equipping and operation of ground, water and other EMS agencies and vehicles.
 Yes___ Statute/Regulation/Other Citation:

 No ___ Need: New Language ___ Amend Language in _____
 Partial/Inadequate____ Amend Language in_____
- d. Standards are established for the medical aspects of air medical services.
 Yes___ Statute/Regulation/Other Citation:

 No ___ Need: New Language ___ Amend Language in _____
 Partial/Inadequate____ Amend Language in_____
- e. There is a policy to inspect vehicles and/or review performance measures about them on a regular basis.
 Yes___ Statute/Regulation/Other Citation:

 No ___ Need: New Language ___ Amend Language in _____
 Partial/Inadequate____ Amend Language in_____
- f. The EMSS lead agency is authorized to take timely and effective action when transportation and/or operational inadequacies are discovered.
 Yes___ Statute/Regulation/Other Citation:

 No ___ Need: New Language ___ Amend Language in _____
 Partial/Inadequate____ Amend Language in_____
- g. The EMSS lead agency will lead EMSS operations in statewide disaster planning and in mass casualty events that exceed local EMS agency and hospital mutual aid capabilities.
 Yes___ Statute/Regulation/Other Citation:

 No ___ Need: New Language ___ Amend Language in _____
 Partial/Inadequate____ Amend Language in_____
- h. The EMSS lead agency will assure the provision of EMS service, response coordination and other facilitating services in some circumstances.
 Yes___ Statute/Regulation/Other Citation:

 No ___ Need: New Language ___ Amend Language in _____
 Partial/Inadequate____ Amend Language in_____

5. Resource Management – Facility and Specialty Care Regionalization

- a. The adequacy of regional, accountable systems of emergency medical care is routinely assessed.
 Yes___ Statute/Regulation/Other Citation:

 No ___ Need: New Language ___ Amend Language in _____
 Partial/Inadequate___ Amend Language in_____
- b. As part of this assessment, certain performance measures will be utilized, performance standards set, policy established that the EMSS will meet or exceed these standards, and interventions sought where necessary.
 Yes___ Statute/Regulation/Other Citation:

 No ___ Need: New Language ___ Amend Language in _____
 Partial/Inadequate___ Amend Language in_____
- c. Statewide committees are maintained for each regional, accountable system of care and these report to the state EMSS medical committee.
 Yes___ Statute/Regulation/Other Citation:

 No ___ Need: New Language ___ Amend Language in _____
 Partial/Inadequate___ Amend Language in_____
- d. The state EMSS lead agency is authorized to designate emergency medical and specialty care facilities. It defines “qualifying patients” who are to benefit from specialty care facilities through transfer agreements and triage processes, monitors facility performance, and may remove designations as necessary.
 Yes___ Statute/Regulation/Other Citation:

 No ___ Need: New Language ___ Amend Language in _____
 Partial/Inadequate___ Amend Language in_____
- e. Where necessary, the state EMSS lead agency has established and operates infrastructure to support regional, accountable systems of care.
 Yes___ Statute/Regulation/Other Citation:

 No ___ Need: New Language ___ Amend Language in _____
 Partial/Inadequate___ Amend Language in_____
- f. The state EMSS lead agency shall develop a well-integrated program of rehabilitation.
 Yes___ Statute/Regulation/Other Citation:

 No ___ Need: New Language ___ Amend Language in _____
 Partial/Inadequate___ Amend Language in_____

- g. The state EMSS agency shall monitor hospital decisions to activate facility bypass, and the circumstances that led to those decisions, and determine whether those decisions were reasonable or whether intervention is needed.

Yes ___ Statute/Regulation/Other Citation:

No ___ Need: New Language ___ Amend Language in _____
Partial/Inadequate ___ Amend Language in _____

6. Public Access and Communications

- a. The state EMSS lead agency will routinely survey and list in its EMSS user's guide all communications resources and related information.

Yes ___ Statute/Regulation/Other Citation:

No ___ Need: New Language ___ Amend Language in _____
Partial/Inadequate ___ Amend Language in _____

- b. The state EMSS lead agency publishes and routinely updates an EMSS communications plan and separate communications system user's guide.

Yes ___ Statute/Regulation/Other Citation:

No ___ Need: New Language ___ Amend Language in _____
Partial/Inadequate ___ Amend Language in _____

- c. A state agency shall be designated and adequately funded within the executive branch to coordinate statewide interoperable public safety communications.

Yes ___ Statute/Regulation/Other Citation:

No ___ Need: New Language ___ Amend Language in _____
Partial/Inadequate ___ Amend Language in _____

- d. The state EMSS lead agency will assure development of emergency medical dispatch (EMD) protocols and an EMD performance improvement system, and is empowered to require EMD provision by all Public Safety Answering Points.

Yes ___ Statute/Regulation/Other Citation:

No ___ Need: New Language ___ Amend Language in _____
Partial/Inadequate ___ Amend Language in _____

- e. The executive branch is required to assure seamless, state-of-the-art citizen access to the EMSS.

Yes ___ Statute/Regulation/Other Citation:

No ___ Need: New Language ___ Amend Language in _____
Partial/Inadequate ___ Amend Language in _____

- f. The executive branch is required to assure that state-of-the-art electronic communication systems are available statewide and are coordinated by a representative, state level body.

Yes ___ Statute/Regulation/Other Citation:

No ___ Need: New Language ___ Amend Language in _____
Partial/Inadequate ___ Amend Language in _____

7. Public Information, Education and Prevention

- a. The state EMSS lead agency will track the *top ten* leading causes of emergent illness and injury death, will use that data as part of its on-going system performance improvement in concert with local/regional EMS, and will work with the state health agency to assess emergent illness/injury and ways to improve EMSS and other health system response.

Yes ___ Statute/Regulation/Other Citation:

No ___ Need: New Language ___ Amend Language in _____
Partial/Inadequate ___ Amend Language in _____

- b. The state EMSS lead agency will periodically assess public expectations about the EMSS, and will seek interventions as indicated.

Yes ___ Statute/Regulation/Other Citation:

No ___ Need: New Language ___ Amend Language in _____
Partial/Inadequate ___ Amend Language in _____

- c. The state EMSS lead agency will maintain routine and effective links with policy-makers and work with the media, within state policy guidelines, to educate them about EMS and to assure proper public use of the system.

Yes ___ Statute/Regulation/Other Citation:

No ___ Need: New Language ___ Amend Language in _____
Partial/Inadequate ___ Amend Language in _____

- d. The EMSS lead agency shall provide a formal “informed self-determination” technical assistance program for communities.

Yes ___ Statute/Regulation/Other Citation:

No ___ Need: New Language ___ Amend Language in _____
Partial/Inadequate ___ Amend Language in _____

The EMSS lead agency will provide public information, education, and relations (PIER) support to provider agencies to assist them in assuring proper use of the system

Yes ___ Statute/Regulation/Other Citation:

No ___ Need: New Language ___ Amend Language in _____
Partial/Inadequate ___ Amend Language in _____

- e. The EMSS lead agency will direct resources to encourage consideration of the use of community paramedicine practices⁶ as needed to address community health needs and enhance the level and response capability of local and regional EMSS.

Yes ___ Statute/Regulation/Other Citation:

No ___ Need: New Language ___ Amend Language in _____
Partial/Inadequate ___ Amend Language in _____

8. Clinical Care, Integration of Care, and Medical Direction

- a. The state EMSS lead agency will routinely assess the adequacy of the EMSS medical director provider workforce. It will set standards for initiating recruitment/retention activities based on the assessment.

Yes ___ Statute/Regulation/Other Citation:

No ___ Need: New Language ___ Amend Language in _____
Partial/Inadequate ___ Amend Language in _____

- b. The EMSS lead agency will identify, set and employ certain performance measures and standards, will establish policy that the EMSS will meet or exceed these standards, and will seek interventions where necessary.

Yes ___ Statute/Regulation/Other Citation:

No ___ Need: New Language ___ Amend Language in _____
Partial/Inadequate ___ Amend Language in _____

- c. The scope, organization and authority-chain for medical direction is defined and authorized.

Yes ___ Statute/Regulation/Other Citation:

No ___ Need: New Language ___ Amend Language in _____
Partial/Inadequate ___ Amend Language in _____

- d. EMSS medical committees are used as deliberative bodies to facilitate the two-way (local through state level) flow of information and input to support medical direction activities.

Yes ___ Statute/Regulation/Other Citation:

No ___ Need: New Language ___ Amend Language in _____
Partial/Inadequate ___ Amend Language in _____

- e. The state EMSS lead agency medical director shall be the ultimate authority, shall have the ultimate responsibility for EMSS medical direction statewide, may delegate these responsibilities on a regional or local basis, and will guide prehospital practices through uniform protocols statewide with local variation as required.

Yes ___ Statute/Regulation/Other Citation:

No ___ Need: New Language ___ Amend Language in _____
Partial/Inadequate ___ Amend Language in _____

- f. The state EMSS lead agency will enforce all prehospital clinical practice.

Yes ___ Statute/Regulation/Other Citation:

No ___ Need: New Language ___ Amend Language in _____
Partial/Inadequate ___ Amend Language in _____

- g. A documented and protected system of performance improvement, which has specific points of integration with and separation from disciplinary and other licensure/certification actions, is used.

Yes ___ Statute/Regulation/Other Citation:

No ___ Need: New Language ___ Amend Language in _____
Partial/Inadequate ___ Amend Language in _____

- h. EMSS medical directors will be credentialed based on national standards as may exist.

Yes ___ Statute/Regulation/Other Citation:

No ___ Need: New Language ___ Amend Language in _____
Partial/Inadequate ___ Amend Language in _____

- i. The state EMSS medical director is empowered to modify scopes of practice, protocols, and other standards and practices in large scale emergencies.

Yes ___ Statute/Regulation/Other Citation:

No ___ Need: New Language ___ Amend Language in _____
Partial/Inadequate ___ Amend Language in _____

9. Information, Evaluation, and Research

- a. Death certificate data, by E-code, will be collected and analyzed.
 Yes___ Statute/Regulation/Other Citation:

 No ___ Need: New Language ___ Amend Language in _____
 Partial/Inadequate___ Amend Language in_____
- b. The EMSS lead agency and EMSS data stakeholders will execute data access agreements to assure that clinical, operational, financial and other performance aspects of the EMSS may be measured and monitored in an on-going fashion.
 Yes___ Statute/Regulation/Other Citation:

 No ___ Need: New Language ___ Amend Language in _____
 Partial/Inadequate___ Amend Language in_____
- c. The state EMSS lead agency will have adequate hardware and software and staff resources to deterministically and probabilistically link, analyze, and report from a variety of data sources in a routine and timely manner.
 Yes___ Statute/Regulation/Other Citation:

 No ___ Need: New Language ___ Amend Language in _____
 Partial/Inadequate___ Amend Language in_____
- d. There is compliance concerning data management and governance including an evaluation of the quality, timeliness, and completeness of data, with confidential protection of records ensured while allowing access for research purposes.
 Yes___ Statute/Regulation/Other Citation:

 No ___ Need: New Language ___ Amend Language in _____
 Partial/Inadequate___ Amend Language in_____
- e. A National EMS Information System (NEMSIS) -compliant EMS information system (EMSIS) shall be implemented and maintained and all provider agencies will be required to provide data. The EMSS lead agency is responsible for tracking all activity of its licensed/certified providers and agencies and for all calls in the state handled by out of state providers/agencies.
 Yes___ Statute/Regulation/Other Citation:

 No ___ Need: New Language ___ Amend Language in _____
 Partial/Inadequate___ Amend Language in_____
- f. The state EMSS lead agency is authorized to submit appropriate EMSIS data to NEMSIS, to participate in NEMSIS programs, and to utilize NEMSIS data.
 Yes___ Statute/Regulation/Other Citation:

 No ___ Need: New Language ___ Amend Language in _____
 Partial/Inadequate___ Amend Language in_____

g. The EMSS lead agency will routinely utilize NHTSA Performance Measures and additional state EMSS created indicators and publish the results.

Yes___ Statute/Regulation/Other Citation:

No ___ Need: New Language ___ Amend Language in _____
Partial/Inadequate___ Amend Language in_____

h. The state EMSS lead agency and the state health agency will maintain an emergent illness/injury reporting system. This system will be utilized for the specific monitoring of work-related illnesses and injuries for the EMS workforce.

Yes___ Statute/Regulation/Other Citation:

No ___ Need: New Language ___ Amend Language in _____
Partial/Inadequate___ Amend Language in_____

i. EMSS providers will routinely use EMSIS data to identify program needs, to develop strategies on program priorities, and to set annual goals for emergent illness/injury prevention.

Yes___ Statute/Regulation/Other Citation:

No ___ Need: New Language ___ Amend Language in _____
Partial/Inadequate___ Amend Language in_____

j. The state EMSS body completes regular reviews of annotated EMSIS data reports to determine and recommend the need for system modifications.

Yes___ Statute/Regulation/Other Citation:

No ___ Need: New Language ___ Amend Language in _____
Partial/Inadequate___ Amend Language in_____

k. The state EMSS lead agency shall provide statewide, regional, and jurisdictional/local agency EMSIS data reports no less than once per year.

Yes___ Statute/Regulation/Other Citation:

No ___ Need: New Language ___ Amend Language in _____
Partial/Inadequate___ Amend Language in_____

l. EMSS hospitals will be required to facilitate real-time data linkage and transmission for operational and clinical purposes.

Yes___ Statute/Regulation/Other Citation:

No ___ Need: New Language ___ Amend Language in _____
Partial/Inadequate___ Amend Language in_____

- m. The state EMSS lead agency will maintain a statewide performance improvement (PI) plan with universal prehospital and hospital provider participation.

Yes___ Statute/Regulation/Other Citation:

No ___ Need: New Language ___ Amend Language in _____
Partial/Inadequate___ Amend Language in_____

- n. State EMSS lead agency policies for educational programs require exposure to scientific literature, appropriate research principles, and the value of initiating and participating in research.

Yes___ Statute/Regulation/Other Citation:

No ___ Need: New Language ___ Amend Language in _____
Partial/Inadequate___ Amend Language in_____

- o. The EMSS lead agency is authorized to assure the collection of EMSIS data, to share data with NEMESIS, and to share the responsibility for data collection with other states' EMSS lead agencies for cross-border operations.

Yes___ Statute/Regulation/Other Citation:

No ___ Need: New Language ___ Amend Language in _____

- p. The state EMS lead agency is empowered to enforce provider agency participation in the EMSIS and statewide performance improvement (PI) systems.

Yes___ Statute/Regulation/Other Citation:

No ___ Need: New Language ___ Amend Language in _____
Partial/Inadequate___ Amend Language in_____

10. Large Scale Event Preparedness and Response

- a. The state EMSS lead agency will conduct a resource assessment of the EMSS' ability to expand its capacity to respond to mass casualty incidents and will perform a gap analysis.

Yes___ Statute/Regulation/Other Citation:

No ___ Need: New Language ___ Amend Language in _____
Partial/Inadequate___ Amend Language in_____

- b. The need for protective resources (including vaccinations, prophylaxis, and personal protective equipment) for EMS providers and their families will be routinely assessed and made available.

Yes___ Statute/Regulation/Other Citation:

No ___ Need: New Language ___ Amend Language in _____
Partial/Inadequate___ Amend Language in_____

c. The EMSS plan (including user's guide) will have clearly defined methods of integrating with other emergency preparedness plans, will be routinely exercised, and will be supported by sufficient caches of equipment and backup personnel.
Yes___ Statute/Regulation/Other Citation:

No ___ Need: New Language ___ Amend Language in _____
Partial/Inadequate___ Amend Language in_____

d. The EMSS plan (including user's guide) shall specify means to allow EMS resources to be used across jurisdictions, both intrastate and interstate, using the Emergency Management Assistance Compact, memoranda of understanding, and the National Incident Management System.
Yes___ Statute/Regulation/Other Citation:

No ___ Need: New Language ___ Amend Language in _____
Partial/Inadequate___ Amend Language in_____

e. The EMSS plan (and user's guide) has specific provisions for a pandemic influenza event.
Yes___ Statute/Regulation/Other Citation:

No ___ Need: New Language ___ Amend Language in _____
Partial/Inadequate___ Amend Language in_____

f. The lead agency has access to equipment, materials, and personnel for large-scale events, including the strategic national stockpile.
Yes___ Statute/Regulation/Other Citation:

No ___ Need: New Language ___ Amend Language in _____
Partial/Inadequate___ Amend Language in_____

g. The state EMSS lead agency has a deployment mechanism to share personnel resources and this is exercised routinely.
Yes___ Statute/Regulation/Other Citation:

No ___ Need: New Language ___ Amend Language in _____
Partial/Inadequate___ Amend Language in_____

h. The State EMS lead agency shall have legal authority, based upon the Model State Emergency Health Powers Act, to modify the scope of practice of EMS personnel during an influenza pandemic and other public health emergencies.
Yes___ Statute/Regulation/Other Citation:

No ___ Need: New Language ___ Amend Language in _____
Partial/Inadequate___ Amend Language in_____

IV. Appendices

APPENDIX A – Steering Group and Staff

Core Members (in addition, all NASEMSO member Councils and major national EMS associations were consulted in the development and review of this document)

Terry Mullins
Bureau Chief of EMS
Arizona Department of Health Services

Dan Manz
Director
EMS Division
Vermont Department of Health

Robert Waller
Administrator
Kansas Board of Emergency Medical Services

David Taylor
Chief
EMS and Trauma Systems
Arkansas Department of Health

Keith Wesley, M.D.
Medical Director
Minnesota EMS

Federal Partners/Participants

Drew Dawson
Director
Office of EMS
National Highway Traffic Safety Administration
US Department of Transportation

Susan McHenry
EMS Specialist
Office of EMS
National Highway Traffic Safety Administration
US Department of Transportation

Staff

Leslee Stein-Spencer R.N.
Principal Investigator
National Association of State EMS Officials

Kevin McGinnis, MPS, EMT-P
Principal Writer
National Association of State EMS Officials

APPENDIX B – References

1. *Emergency Medical Services at the Crossroads*; Committee on the Future of Emergency Care in the United States Health System; Board on Health Care Services; Institute of Medicine of the National Academies; p. 10; 2006
2. Ibid
3. <http://www.apcointl.org/frequency/siec/documents/documents.htm>
4. http://www.safecomprogram.gov/SAFECON/library/interoperabilitycasestudies/1223_statewidecommunications.htm
5. McGinnis, KK; *Rural and Frontier EMS Agenda for the Future*; National Rural Health Association Press; 10/04; p. 62
6. Ibid; pp. 9-13
7. *Emergency Medical Services at the Crossroads*; Committee on the Future of Emergency Care in the United States Health System; Board on Health Care Services; Institute of Medicine of the National Academies; p. 72 and elsewhere throughout; 2006

APPENDIX C – Index

9-1-1 access, 19
air medical services, 6, 15, 34, 35
annual reports, 11, 32
Annual Turnover Rate, 13
Budget, 12
cabinet level policy-maker, 9, 31
cardiac, 4, 16, 17, 24
Clinical Care, Integration of Care, and
 Medical Direction, 7, 24, 39
clinical oversight, 24
communications, 19, 20, 21, 22, 37
comprehensive leadership, 9, 31
credentialing, 14, 25, 33
data collection, 6, 9, 28, 43
data communications, 19, 20
deploy emergency medical care
 providers, 14
designation, 16, 18
Detailed Statutory Content Guide, 2, 8, 9
disaster planning, 16, 35
due process, 14, 15, 25
E-9-1-1, 20, 21
education, 12, 13, 14, 20, 22, 23, 25, 28,
 33, 38
educator, 14, 33
EMD, 19, 20, 21, 37
emergency medical dispatch, 19, 20
EMS instructor, 14, 33
EMS stakeholder, 10
EMSIS, 11, 12, 26, 27, 28, 32, 41, 42, 43
EMSS communications system plan, 21

EMSS plan, 5, 10, 11, 17, 29, 32, 43, 44
 EMSS standards, 9
 EMSS workforce, 12
 enforcement authority, 15
 enforcing personnel compliance, 14
 facility standards, 9
 ground and water ambulances, 15
 independent external assessment, 10, 30
 information management, 19, 20
 Information, Evaluation, and Research
 Subsystem, 7, 26, 40
 inspect vehicles, 15, 35
 IOM, 3, 4
 Large Scale Event Preparedness and
 Response Subsystem, 7, 28, 43
 licensure/certification, 13, 14, 25, 40
 mass casualty events, 16, 35
 measurable program goals, 11
 medical committees, 25, 26, 39
 medical direction, 6, 14, 17, 20, 24, 25,
 27, 28, 39, 40
 medical directors, 6, 25, 26, 40
 national accreditation, 14
 national certification, 14
 National EMS Education Standards, 14
 NEMSIS, 5, 11, 26, 32, 41, 43
 NHTSA Performance Measures, 13, 15,
 18, 19, 24, 26, 41
 on-going performance improvement, 15,
 21
 patient care, 4, 15, 19, 20, 26, 28, 35
 pediatric, 10, 16, 17
 performance improvement, 9, 17, 18, 20,
 25, 26, 28, 32, 37, 40, 42, 43
 performance improvement processes, 9,
 18, 32
 Performance standards, 13, 15, 19, 25
 practice of prehospital care providers, 25
 protocols, 5, 9, 10, 14, 17, 20, 24, 26, 32,
 37, 40
 Public Access and Communications
 Subsystems, 7, 37
 Public Information, Education and
 Prevention Subsystem, 7, 38
 qualifying patient, 17
 quality improvement, 10, 30
 recruitment, 12, 13, 25, 39
 regional, accountable systems of care,
 16, 18, 36
 Regional, accountable systems of
 emergency medical care, 16
 Resource Management Subsystems –
 Facility and Specialty Care
 Regionalization, 7, 16, 35
 Resource Management Subsystems –
 Financial, 7, 11, 32
 Resource Management Subsystems -
 Human Resources, 7, 12, 33
 Resource Management Subsystems –
 Transportation, 7, 14, 34
 retention, 12, 13, 25, 39
 rules/regulations, 5, 11
 SafeCom Interoperability Continuum,
 20, 21, 22
 SCIP, 21
 scopes of practice, 13
 Self-Assessment Checklist, 8, 30
 SIEC, 21
 special populations, 10
 specialty care, 11, 16, 17, 18, 36
 specialty care system committees
 specialty care system committee, 18
 stakeholder body, 9
 state EMSS deliberative body, 10, 31
 state EMSS lead agency director, 10, 31
 state EMSS lead agency medical
 director, 25, 40
 statewide interoperability executive
 committee, 21
 statewide regionalized, coordinated and
 accountable systems of emergency
 care, 9, 10
 Strategic Highway Safety Plan, 11
 strategic planning, 10, 12, 30, 32
 System Leadership, Organization,
 Regulation & Policy Subsystem, 7, 9,
 30
 system performance, 11, 12, 17, 18, 23,
 24, 25, 27, 31, 38
 system users guide, 19, 20, 21, 29
 trainer, 14, 33
 trauma, 3, 4, 16, 17

workforce assessment, 12, 13, 25