

A Companion Document to the 2009 Gap Analysis Template

Pediatric Considerations

For Implementing the National EMS Education Standards:

- Emergency Medical Responder (EMR)
- Emergency Medical Technician (EMT)
- Advanced Emergency Medical Technician (AEMT)
- Paramedic

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Introduction

A component of the *EMS Education Agenda: A Systems Approach (Education Agenda)*, the National Highway Traffic Safety Administration (NHTSA) published the *National EMS Education Standards (Education Standards)* in 2009. Because states needed to revise and/or develop processes to facilitate a smooth transition from the *U.S. Department of Transportation National Standard Curricula (NSC)* to the *Education Standards*, the National Association of State EMS Officials (NASEMSO) convened an expert panel with representation from several national stakeholder groups to establish a companion resource or [Gap Analysis Template](#) for states.

The purpose of the gap analysis was to identify skills, content, and new course considerations not included in the previous *National Standard Curricula* for each EMS practitioner level. The *Gap Analysis Template* was never intended as a “stand-alone” transition document; the template continues to serve as another tool to facilitate implementation of the *EMS Education Agenda*. Its intended audience is state EMS offices although NASEMSO acknowledges that the content may be useful to a much broader audience.

In 2013, NASEMSO convened a second expert panel to help address cognitive, psychomotor, and affective learning needs of EMS practitioners related to the care of pediatric populations. The following goals were established:

- Identify evidence-based knowledge and skills that lead to improvements in the delivery of EMS care for pediatric populations
- Increase input and enhance communications among EMS partner groups on pediatric education issues
- Increase pediatric competency for all EMS practitioners

The expert panel noted that the *Education Standards* effectively illustrate the increasing complexity of knowledge and behaviors through the progression of licensure levels and originate, in part, from the *National EMS Scope of Practice Model*. Pediatric objectives are integrated throughout and the document reflects the differences in the breadth, depth, and considerations required at each licensure level.

- **Depth (of knowledge):** the amount of detail a student needs to know about a particular topic,
- **Breadth:** the number of topics or issues a student needs to learn in a particular competency are difficult concepts for persons informally trained

in educational methodology to comprehend and implement.

Therefore, the panel identified several current barriers to effective pediatric education:

1. Most programs have not allocated sufficient time to pediatric-related didactic content, labs, or clinical experiences.
2. EMS Programs often rely heavily on instructor-centered teaching methods and do not gain the benefit of simulations (high fidelity or low tech) or contact with “real” children or clinical time in a pediatric care setting.
3. It is unclear to many instructors how to design lesson plans and educational strategies that fully address the needed depth and breadth of instruction.
4. Educator time may be very limited for curriculum development, especially if it involves sophisticated simulations and/or AV aids.
5. Adult students have different learning styles and are more motivated to accept responsibility for learning when convinced of the need for knowing the information.

The transition away from the NSC to the *Education Standards* is ongoing. NASEMSO believes that the primary goal should be that children of all ages, circumstances, and needs receive appropriate assessment and care from EMS personnel consistent with their scope of practice and local protocols. This is best accomplished through:

- effective entry level and continuing education for EMS and on-line medical control personnel;
- valid and reliable competency measurement tools;
- model evidence based guidelines that serve as a foundation for EMS care across states and jurisdictions;
- and a robust quality management process that spans the entire career of each practitioner.

This document will attempt to identify focus areas for ongoing EMS pediatric education and competency efforts.

Essential components of EMS pediatric practice that lie outside the scope of the *Education Standards* may include, but are not limited to:

- Pediatric Readiness Guidelines,

- Performance measures to improve pediatric infrastructure, such as:
 - Availability of EMS online and off line pediatric medical direction,
 - Availability pediatric equipment on ambulances,
 - EMS pediatric continuing education requirements,
 - Inter facility pediatric transfer guidelines,
 - Inter facility pediatric transfer agreements, and
 - Hospital pediatric facility recognition.

The *Education Standards* are one component of the *EMS Education Agenda for the Future: A Systems Approach*. The *Education Agenda* and the following components: National EMS Core Content, National EMS Scope of Practice Model, and the National EMS Education Standards are available at www.ems.gov.

The NASEMSO Implementation Team and Pediatric Working Group are available to provide technical assistance to states with the gap analysis and other Education Agenda implementation efforts. State officials that desire additional information can contact NASEMSO via info@nasemso.org or call NASEMSO Program Advisor Kathy Robinson at (703) 538-1799 ext 1894.

1. Cross Reference of Education Standards and Instructional Guidelines (by Sections)

Please also see [Section 2, National EMS Education Standards Related to Pediatrics: Matrix](#) and [Section 3, Review of Pediatric Content: Instructional Guidelines](#) for pediatric references currently included in the *Education Standards* and *Instructional Guides*.

Section Title	Education Standards Page Number	EMR Instructional Guidelines Page Number	EMT Instructional Guidelines Page Number	AEMT Instructional Guidelines Page Number	Paramedic Instructional Guidelines Page Number
Preparatory	11	1	1	1	1
• EMS Systems	11	1	1	1	1
• Research	11	4	4	3	9
• Workforce Safety and Wellness	12	4	5	4	12
• Documentation	13	12	9	5	16
• EMS System Communication	13	13	13	8	18
• Therapeutic Communications	13	14	17	11	20
• Medical/Legal Ethics	13	15	20	12	25
Anatomy and Physiology	14	18	24	13	31
Medical Terminology	14	21	29	19	54
Physiology	14	22	30	20	55
Life Span Development	14	24	34	22	72
Public Health	15	26	40	23	76
Pharmacology	15	27	42	25	78
• Principles of Pharmacology	15	27	42	25	78
• Medication Administration	16	28	44	30	85
• Emergency Medications	16	29	46	32	87
Airway Management, Respiration, and Artificial Ventilation	17	30	47	33	90
• Airway Management	17	30	47	33	90
• Respiration	18	33	50	36	94
• Artificial Ventilation	18	37	57	39	100

Section Title	Education Standards Page Number	EMR Instructional Guidelines Page Number	EMT Instructional Guidelines Page Number	AEMT Instructional Guidelines Page Number	Paramedic Instructional Guidelines Page Number
Patient Assessment	19	41	60	42	102
• Scene Size Up	19	41	60	42	102
• Primary Assessment	20	44	63	43	105
• History-Taking	20	48	66	45	107
• Secondary Assessment	20	50	71	46	118
• Monitoring Devices	21	53	76	47	131
• Reassessment	21	54	78	48	133
Medicine	22	56	80	49	134
• Medical Overview	22	56	80	49	134
• Neurology	23	57	84	53	138
• Abdominal and Gastrointestinal Disorders	24	59	87	56	142
• Immunology	25	61	89	58	148
• Infectious Diseases	26	62	91	60	151
• Endocrine Disorders	27	63	93	63	163
• Psychiatric	28	65	96	65	166
• Cardiovascular	29	68	99	68	169
• Toxicology	30	70	104	73	203
• Respiratory	31	73	107	77	210
• Hematology	32	74	109	80	217
• Genitourinary/Renal	33	75	110	82	220
• Gynecology	34	76	112	84	226
• Non-traumatic Musculoskeletal Disorders	34	77	113	85	229
• Diseases of the Eyes, Ears, Nose, and Throat	35	78	114	86	231
Shock and Resuscitation	35	79	115	87	233
Trauma	35	82	122	94	244
• Trauma Overview	35	82	122	94	244

Section Title	Education Standards Page Number	EMR Instructional Guidelines Page Number	EMT Instructional Guidelines Page Number	AEMT Instructional Guidelines Page Number	Paramedic Instructional Guidelines Page Number
Trauma con't	35	82	122	94	244
• Bleeding	35	83	125	95	248
• Chest Trauma	37	85	128	98	255
• Abdominal and Genitourinary Trauma	38	86	131	104	262
• Orthopedic Trauma	39	87	135	108	267
• Soft Tissue Trauma	40	89	142	110	272
• Head, Facial, Neck and Spine Trauma	41	93	147	115	279
• Nervous System Trauma	42	96	155	118	283
• Special Considerations in Trauma	42	97	160	121	288
• Environmental Trauma	43	99	164	127	293
• Multi-System Trauma	43	103	170	128	299
Special Patient Populations	44	104	174	132	303
• Obstetrics	44	104	174	132	303
• Neonatal Care	45	107	177	133	308
• Pediatrics	46	108	178	134	327
• Geriatrics	47	112	189	135	345
• Patients With Special Challenges	48	114	197	136	362
EMS Operations	48	115	200	139	377
• Principles of Safely Operating a Ground Ambulance	48	115	200	139	377
• Incident Management	49	117	202	140	378
• Multiple Casualty Incidents	49	118	203	141	379
• Air Medical	49	120	205	142	380
• Vehicle Extrication	49	122	207	144	381
• Hazardous Materials Awareness	49	125	210	147	384
• Mass Casualty Incidents Due to Terrorism and Disaster	50	126	211	148	385

2. National EMS Education Standards Related to Pediatrics: Matrix

The following chart represents the recommended pediatric content as presented in the [Education Standards](#) (pages 45-47).

TOPIC	EMR	EMT	AEMT	Paramedic
Neonatal Care	Simple depth, simple breadth <ul style="list-style-type: none"> • Newborn care • Neonatal resuscitation 	EMR Material Plus: Fundamental depth, foundational breadth Assessment and management <ul style="list-style-type: none"> • Newborn • Neonatal resuscitation 	Same as Previous Level	AEMT Material Plus: Complex depth, comprehensive breadth <ul style="list-style-type: none"> • Anatomy and physiology of neonatal circulation • Assessment of the newborn Presentation and management <ul style="list-style-type: none"> • Newborn • Neonatal resuscitation
Pediatrics	Simple depth, simple breadth Age-related assessment findings, and age-related assessment and treatment modifications for pediatric-specific major diseases and/or emergencies <ul style="list-style-type: none"> • Upper airway obstruction • Lower airway reactive disease • Respiratory distress/failure/arrest • Shock • Seizures 	EMR Material Plus: Fundamental depth, Foundational breadth Age-related assessment findings, age-related, and developmental stage related assessment and treatment modifications for pediatric specific major diseases and/or emergencies <ul style="list-style-type: none"> • Upper airway obstruction • Lower airway reactive disease • Respiratory distress/failure/arrest 	Same as Previous Level	AEMT Material Plus: Age-related assessment findings, age-related anatomic and physiologic variations, age-related and developmental stage related assessment and treatment modifications of the pediatric-specific major or common diseases and/or emergencies: Complex depth, comprehensive breadth <ul style="list-style-type: none"> • Foreign body (upper and lower) airway obstruction • Bacterial tracheitis • Asthma

TOPIC	EMR	EMT	AEMT	Paramedic
<p>Pediatrics con't</p>	<ul style="list-style-type: none"> • Sudden Infant Death Syndrome 	<ul style="list-style-type: none"> • Shock • Seizures • Sudden Infant Death Syndrome • Gastrointestinal disease 		<ul style="list-style-type: none"> • Bronchiolitis • Respiratory Syncytial Virus (RSV) • Pneumonia • Croup • Epiglottitis • Respiratory distress/failure/arrest • Shock • Seizures • Sudden Infant Death Syndrome • Hyperglycemia • Hypoglycemia <p>Fundamental depth, foundational breadth</p> <ul style="list-style-type: none"> • Pertussis • Cystic fibrosis • Bronchopulmonary dysplasia • Congenital heart diseases • Hydrocephalus and ventricular shunts

3. Review of Pediatric Content: Instructional Guidelines

The following list supports the NEMSES by identifying a focus for pediatric content and is extracted from the Instructional Guidelines at each responder level:

Emergency Medical Responder (EMR)

The EMR Instructional Guidelines can be found [here](#).

1. Preparatory: Medical/Legal and Ethics (*page 15*)
 - a. (I.C.) Consent, Implied
 - b. (I.E.) Pediatrics, Parental control
2. Anatomy and Physiology
 - a. (III.) Age-Related Variations (*page 20*)
3. Patient Assessment: History-Taking
 - a. (IV.A.) Age-Related Variations, Pediatric (*page 49*)
4. Medicine: Abdominal and Gastrointestinal Disorders
 - a. (VI.A.) Age-Related Variations, Pediatrics (*page 60*)
5. Medicine: Endocrine Disorders
 - a. (II.A.) Age-Related Variations, Pediatrics (*page 64*)
6. Special Patient Populations: Pediatrics
 - a. (I) General Considerations (*page 108*)
 - b. (II) Assessment Process (*pages 108-110*)
 - c. (III) Seizures (*page 111*)
 - d. (IV) Sudden Infant Death Syndrome (SIDS) (*page 111*)

Emergency Medical Technician (EMT)

The EMT Instructional Guidelines can be found [here](#), and incorporate objectives from all previous levels with additional content related to:

1. Anatomy and Physiology
 - a. (III.) Age-related Variations for Pediatrics (*page 28*)
2. Medicine: Neurology
 - a. (IV.A.) Age-Related Variations, Pediatrics (*page 85*)
3. Medicine: Abdominal and Gastrointestinal Disorders (*page 88*)
 - a. (VI.) Consider Age-Related Variations
 - b. (VII.) Pediatrics
4. Medicine: Hematology
 - a. (V.A.) Consider Age-Related Variations, Pediatrics (*page 109*)

5. Medicine: Gynecology
 - a. (V.A.) Age-Related Variations, Pediatrics (*page 112*)
6. Shock and Resuscitation
 - a. (VIII.J.1.) Age-Related Variations, Pediatrics (*page 120*)
7. Special Patient Populations, Pediatrics
 - a. (I.) Anatomy and Physiology (*page 178*)
 - b. (II.) Airway Compared to an Adult (*page 178*)
 - c. (III.) Chest and Lungs Compared to an Adult (*pages 178-179*)
 - d. (IV.) Abdominal Difference (*page 179*)
 - e. (V.) Extremities Compared to an Adult (*page 179*)
 - f. (VI.) Integumentary (*page 179*)
 - g. (VII.) Respiratory System Compared to an Adult (*page 179*)
 - h. (VIII.) Nervous System and Spinal Column Compared to an Adult (*pages 179-180*)
 - i. (IX.) Metabolic Differences Compared to an Adult (*page 180*)
 - j. (X.) Growth and Development (*pages 180-183*)
 - k. (XI.) Assessment (*pages 183-186*)
 - l. (XII.) Specific Pathophysiology, Assessment, and Management (*pages 186-188*)

Advanced EMT (AEMT)

The AEMT Instructional Guidelines can be found [here](#), and incorporate objectives from all previous levels with additional content related to:

1. Anatomy and Physiology
 - a. (III.) Age-Related Variations (*page 18*)
2. Pharmacology: Principles of Pharmacology
 - a. (II.F.2.b.) Medical Legislation, Development of Pharmaceuticals, Special Considerations, Pediatrics (*page 25*)
3. Pharmacology: Emergency Medications
 - a. (II.) Special Considerations in Pediatrics (*page 32*)
4. Airway Management, Respiration, and Artificial Ventilation: Airway Management
 - a. (IV.) Consider Age-Related Variations in Pediatric Patients (*page 35*)
5. Airway Management, Respiration, and Artificial Ventilation: Respiration
 - a. (VII.) Age-Related Variations in Pediatric Patients (*page 38*)
6. Airway Management, Respiration, and Artificial Ventilation: Artificial Ventilation

- a. (IV.) Consider Age-Related Variations in Pediatric Patients (*page 41*)
- 7. Patient Assessment: Secondary Assessment
 - a. (II.) Special considerations for Pediatric Patients (*page 46*)
- 8. Medicine: Neurology
 - a. (IV.A.) Age-Related Variations for Assessment & Management, Pediatrics (*page 54*)
- 9. Medicine: Abdominal and Gastrointestinal Disorders
 - a. (VI.) Consider Age-Related Variations for Pediatric Assessment & Management (*page 57*)
 - b. (VII.) Pediatrics (*page 57*)
- 10. Medicine: Immunology
 - a. (VI.) Age-Related Considerations (*page 59*)
- 11. Medicine: Infectious Disease
 - a. (IV.) Consider Age-Related Variations in Pediatric Patients as They Relate to Assessment & Management of Patients With a Gastrointestinal Condition or Emergency (*page 61*)
- 12. Medicine: Endocrine Disorders
 - a. (III.1.) Age-Related Considerations, Pediatric Patients (*page 64*)
- 13. Medicine: Psychiatric
 - a. (VII.A.) Consider Age-Related Variations for Pediatric Assessment & Management, Pediatric Behavioral Emergencies (*page 67*)
- 14. Toxicology
 - a. (XI.A.) Consider Age-Related Variations for Pediatric Assessment & Management, Pediatric (*page 76*)
- 15. Medicine: Respiratory
 - a. (III.C.1.) Assessment, Age-Related Considerations, Pediatrics (*page 79*)
- 16. Medicine: Hematology
 - a. (V.) Age-Related Considerations (*page 81*)
- 17. Shock and Resuscitation
 - a. (IX.A.) Age-Related Variations, Pediatrics (*page 92*)
- 18. Trauma: Bleeding
 - a. (II.C.) Special Considerations in Fluid Resuscitation, Pediatrics (*page 97*)
- 19. Trauma: Abdominal and Genitourinary Trauma
 - a. (VII.A.) Age-Related Variations for Pediatric Assessment & Management, Pediatric (*page 107*)

- 20. Trauma: Soft Tissue Trauma
 - a. (XIII.A.) Age-Related Variations, Pediatric (*page 114*)
- 21. Head, Facial, Neck, and Spine Trauma (*page 114*) age related variations
- 22. Trauma: Special Considerations in Trauma
 - a. (II.) Pediatric Trauma (*page 123*)

Instructional Guidelines: Paramedic

The Paramedic Instructional Guidelines can be found [here](#), and incorporate objectives from all previous levels with additional content related to:

- 1. Patient Assessment: Reassessment
 - a. (IV.A.) Age-Related Considerations, Pediatrics (*page 132*)
- 2. Medicine: Neurology
 - a. (VI.A.) Age-Related Variations, Pediatrics (*pages 139-140*)
- 3. Medicine: Abdominal and Gastrointestinal Disorders
 - a. (IV.A.) Consider Age-Related Variations, Pediatrics (*page 145*)
- 4. Medicine: Gynecology
 - a. (XIV.A.) Age-Related Variations, Pediatrics (*page 227*)
- 5. Shock and Resuscitation
 - a. (XII.L.A.) Shock, Age-Related Variations, Pediatrics (*pages 240-241*)
- 6. Abdominal and Genitourinary Trauma
 - a. (VIII.A.) Age-Related Variations, Pediatrics (*pages 265*)
- 7. Special Patient Population: Pediatrics
 - a. (I.) Pediatric Anatomical Variations and Assessment (*pages 326-330*)
 - b. (II.) Growth and development (*pages 330-336*)
 - c. (III.) Pediatrics: Specific Pathophysiology, Assessment, and Management (*pages 336-343*)
 - d. (IV.) Abuse and Neglect (*page 343*)
 - e. (V.) Sudden Infant Death Syndrome (*page 343*)
- 8. Special Patient Population: Patients with Special Challenges
 - a. (VIII.) Pediatrics Developmental Disabilities (*pages 364-365*)

4. New Course Considerations: Pediatrics

The following represents suggested topics intended to augment the learning objectives included in the *Education Standards*:

- Apparent Life-Threatening Events (ALTE)
- Pediatric pain management
- Safe transport in ambulances (newborns, infants and children)
- Safe removal from car seats
- Acute stress disorders in children
- Unique forms of trauma, recognition of shock (all forms) in children
- Mild head injury recognition and management in children (updated concussion guidelines)
- Response to children in multiple patient incidents;
- Jumpstart triage
- Greater emphasis on pediatric assessments
- Much more practice on pediatric cardiac arrest management
- Pediatric drug administration:
 - dose calculation and drawing up correct amount to deliver
 - vascular access
 - IM injections in children
- Recognition and management of severe allergic reaction
- Toxic exposures
- Children with special healthcare needs
- Autism and autism spectrum disorders
- Care of extremely premature newborns
- Identification of children at risk for sexual assault
- Identification of suspected victims of human trafficking

5. Measuring Instructor and Practitioner Competency

The Institute of Medicine (IOM), in its series on the *Future of Emergency Care* (2007), recommends “Every pediatric- and emergency care-related health professional credentialing and certification body should define pediatric emergency care competencies and require practitioners to receive the level of initial and continuing education necessary to achieve and maintain those competencies.”

In addition, the Education Agenda and the Emergency Medical Services Workforce Planning & Development Guidelines for State Adoption: Core Guidelines *for Strengthening our EMS Workforce* support “An EMS instructor credentialing process ‘will evolve in the future and be part of a national instructor credentialing process and the envisioned national accreditation process. A national instructor credentialing process will help pave the way for reciprocal credentialing in other states’.” While instructor competencies have not yet been identified, the Pediatric Working Group supports the need for continuing efforts in this regard. In the meanwhile, NASEMSO has previously offered [state guidelines for instructor credentialing](#). This document represents a template that can be used to assist states describe criteria, roles, education, and experience that may be required for various levels of EMS instructors.

The National Association of EMS Educators (NAEMSE), in partnership with the Commission on Accreditation of Allied Health Education Programs (CAAHEP) and the Committee on Accreditation of Educational Programs for the Emergency Medical Services Professions (CoAEMSP) offer a 2-day workshop is designed to assist instructors in appropriately evaluating students in all domains as well as complying with CAAHEP accreditation Standards related to student evaluation. This workshop has an online pre-course component that is approximately four hours in length. The following topics are addressed:

- Affective Evaluation
- Simulations & Scenario Oral Evaluation
- Clinical / Internship Evaluation
- Developing a Portfolio Competency Package
- General Item Analysis and Review of Acceptable Reporting
- Principles of Student Evaluation
- Constructing an Evaluation Strategy / Case Studies
- Written Evaluation Tools

- Item Analysis of Written Exams
- Cut Score Determination

More information is available at <http://www.naemse.org/CAAHEPworkshop/>.

6. Integration With Model Clinical Guidelines

The IOM Future of Emergency Care series encourages the use of evidence-based clinical guidelines to assist providers in decision-making regarding the appropriate care for specific clinical circumstances as their use has been shown to improve the quality of care. New evidence-based protocols and Model Clinical Guidelines for the pediatric patients are emerging as the practice of prehospital emergency medicine continues to evolve. Educational goals and objectives should incorporate the most current evidence-based pediatric protocols and guidelines or, where evidence is lacking, model pediatric guidelines developed by consensus of pediatric emergency medicine specialists, emergency physicians, and EMS field providers.

Monitor the progress of this important body of work at:

<http://www.nasemso.org/Projects/ModelEMSClinicalGuidelines/index.asp>.

7. Recommendations

Special consideration should be given to promote quality EMS education for pediatric populations:

- Individual states are encouraged to use the *National EMS Scope of Practice Model* as a foundation to establish state EMS practitioner levels.
- Individual states are encouraged to use the *Gap Analysis Template* to help define system processes that support the transition of EMS practitioners to the state-adopted scope of practice.
- Individual states are encouraged to use the *Gap Analysis Template, Pediatric Considerations* to help define system processes that support the transition of EMS practitioners to increased competence and proficiency in the care of pediatric populations.
- The *Education Standards* promotes increased flexibility, encourages creativity within each EMS education program and encourages alternative delivery methods. The *Education Standards* do not represent a prescriptive sequence or content grouping for a class presentation. States and/or educational programs will need to determine the sequence for teaching the materials.
- Course outcome evaluations should be based on student competency, not the time to course completion, as this may vary. Time estimates may be provided to guide the planning for presentation of course materials.
- States and/or education programs should re-evaluate student qualifications, co-requisites, or pre-requisites for all EMS practitioner levels.
- States and/or education programs should re-evaluate qualifications, co-requisites, or pre-requisites for EMS instructors.
- States and/or programs should consider co-requisites or pre-requisites for transition courses as well as continuing education offerings to help establish the depth and breadth of content related to the care of pediatric patients.
- Individual states are encouraged to add local or regional verification of pediatric readiness of emergency departments (based on national guidelines) as it relates to education of EMS practitioners and transport of pediatric patients to an appropriate destination.
- Individual states are encouraged to identify an EMS instructor credentialing process. NASEMSO's EMS Instructor Qualifications are available here:

<http://www.nasemso.org/EMSEducationImplementationPlanning/documents/EMSInstructorQualificationsFinal.pdf>.

- EMS agencies are encouraged to appoint a pediatric emergency coordinator to provide pediatric leadership for the organization, while ensuring that pediatric continuing education opportunities are available and well attended.
- EMS programs may be able to provide increased opportunities for students to practice live (“hands-on”) patient assessment techniques through agreements with local day care centers, schools, and health care facilities that serve pediatric populations.

When planning and conducting a new EMS course, the Program Director or Course Coordinator must consider the following related to the field of pediatrics:

- Instructional resources
- Instructor qualifications
- Medical director oversight
- Review and verify integration of the clinical behavior/judgment section of the Education Standards, particularly related to lab and clinical and field activities.
- Include affective evaluation and professional behavior in student assessment
- Program effectiveness evaluation

Appendix A: Writing Educational Goals and Objectives

NASEMSO sincerely thanks Connie Mattera, MS, RN, EMT-P, EMS Administrative Director, Northwest Community Healthcare for enormous contributions to this section.