

COMMITTED TO EMS: NOW & IN THE FUTURE

NATIONAL REGISTRY
OF EMERGENCY
MEDICAL TECHNICIANS



The Nation's EMS Certification™

2010 ANNUAL REPORT

2010: THE YEAR OF "THANKS"

BY WILLIAM E. BROWN, JR., NREMT EXECUTIVE DIRECTOR

The year 2010 could be considered the year of "thanks" to the hundreds of people in the national EMS community who played a role in the NREMT's decision-making process as we moved through our Strategic Plan.

We hosted many meetings at the NREMT, and invited many experts and stakeholders to help us accomplish our expected outcomes. The efforts, coupled with the work of the Board of Directors and staff, demonstrate that our decision-making process includes methods for obtaining input that helps us validate our work.

Seven item writing meetings were held in 2010, with approximately ten EMS experts in content subject matter drafting items and attending each two-and-a-half day meeting. Over the course of the year, a total of 70 content and education experts from all over the United States participated in these item writing meetings. These experts included educators, providers, state officials and physicians who intensely review each item, validate its content, assure answers are correct according to the effective patient care, match the items to test plan content, and argue via a consensus process until agreement is reached. Without their work, no test questions would ever appear in NREMT test banks; however, this initial process only permits us to pilot test an item. Approximately 80% of the 220 items they review survive to reach the pilot phase and then only 70% of those items actually make it into the test bank for later use in a test pool. We send our "thanks" for their work—an outcome that produces about 120 items per meeting that future candidates may see during a computer adaptive testing experience.

We say "thanks" to the eight Paramedic education programs; the program directors and their students; and their approximately 205 students who progressed through the newly-envisioned Paramedic Psychomotor Competency Portfolio project. This yearlong process resulted in development of more than 30 formative instruments, a scenario-based practical measurement instrument, and both clinical and field internship measurement instruments that cover the psychomotor domain of Paramedic education. When all of the data from this effort was analyzed we discovered the cognitive examination scores rose significantly when compared to last year's classes and that scores on the practical examination increased. A fall summit on the Portfolio project with more than 20 experts

attending indicated much work needed to be accomplished before the NREMT and the national EMS community can move forward with implementation of the portfolio project. This work has been scheduled for 2011. We are grateful for these Paramedic program directors and their students who are pioneers in a process that can lead to a reduction in the number of stations needed on the NREMT Paramedic practical examination, while at the same time yield more valid evidence that Paramedic students are competent in the psychomotor domain.

A big "thanks" also is due to the experts who helped develop the new skill sheets reflecting the skills outlined in the National EMS Education Standards. These were incorporated into new EMR, EMT and AEMT practical examinations which will be released in the fall of 2011. Their work was reviewed by the Standards and Examination Committee and adopted by the Board in November of 2010.

Representatives from State EMS Offices, AAA, IAFC, IAFF, and rural and urban areas deserve a "thanks" for helping draft questions that were posed to the public to elicit their input on EMS. A national Public Opinion Survey of EMS was accomplished in 2010 as a result of their work. Manuscripts are being written and policy makers in EMS will soon know what the public thinks and wants regarding EMS. We will all be excited to see the publication.

"Thanks" to the AAA, IAFC, Third Service EMS providers, State Officials, EMS Physicians, Workforce Researchers and Survey Research members who designed a new process to continue the Longitudinal EMT Attribute and Demographic Study (LEADS) research project which will continue through 2020. The first LEADS study, taking place from 1999 to 2009, has been completed and a final analysis report of the results will be released in 2011. Many "thanks" to the over 17,000 EMS providers who participated in the first LEADS project, and the EMS Office of the National Highway Traffic Safety Administration, that iointly sponsored the LEADS project.

The NREMT started on a new path to revise our recertification standards with a committee that provided input, comprised of State EMS Officials; members of the IAFC, IAFF, and AAA; and EMS Physicians. The committee deserves "thanks" for drafting a planned "continued competency" program that we will research, obtain further input regarding its feasibility, and strive to develop over the next four years for implementation. The draft contains national, local and individual requirements centered on evidence-based medicine; changes in scopes of practice; low frequency/high criticality tasks; local EMS system OA and run data; and an individual assessment. If feasible, we will move forward with this program once EMS providers complete transitions to the new EMS provider levels outlined in the National EMS Scope of Practice Model.

Another "thanks" goes out to the National Association of State EMS Officials (NASEMSO), National EMS Education Agenda for the Future: A Systems Approach, Implementation Team. The NREMT Board's Standards and Examination Committee was able to meet with this group regarding dates to implement examinations that reflect the National EMS Education Standards and the 2010 American Heart Association Guidelines. Also covered in that meeting were dates and timelines for EMS providers to transition to the new provider levels. Finally, in October at the annual NASEMSO meeting, a resolution was passed regarding test and transition implementation dates, as well as a resolution that confirmed the NREMT implementation date for Paramedic Program accreditation on January 1, 2013. The NREMT Board reviewed these dates and will confirm them at the June, 2011 Board meeting.

In summary, the NREMT held more than twenty meetings with Board members, stakeholders, and subject matter experts during 2010. We could not accomplish our mission without the input of these valued providers. As we move forward as an EMS community, resolution of issues and changes that result in progress require such input. 2010 can be summed up as the year of "THANKS!"



SENIOR LEADERSHIP

BOARD OF DIRECTORS

As of January 1, 2011

CHAIRMAN

Peter Glaeser, MD, FAAP Medical Director of Emergency Medicine, Children's Hospital of Alabama Professor and Vice-Chair of Pediatrics, University of Alabama Birmingham, AL

VICE CHAIRMAN Tommy Loyacono, MPA, NREMT-P Chief EMS Operations Officer for metropolitan Baton Rouge Baton Rouge, LA

TREASURER
David Persse, MD, FACEP
Physician Director of EMS
City of Houston Fire Dept.

Houston, TX

IMMEDIATE PAST CHAIRMAN Jimm Murray, NREMT-B Air Methods Corporation Papillion, NE

PAST CHAIRMAN
Sandy Bogucki, MD, PhD, FACEP
Associate Professor, Emergency
Medicine, Yale University
Associate EMS Medical Director and Fire
Surgeon, Branford Fire Department
New Haven, CT

MEMBERS

Renee C. Barrett, PhD Adjunct Professor, Child Development Palomar Community College San Marcos, CA

Edward A. Bartkus, EMT-P, MD, FACEP EMS Director Assistant Professor of Clinical Emergency Medicine Indiana University School of Medicine Indianapolis, IN

Kevin S. Bersche Deputy Fire Chief-Operations Farmington Hills Fire Rescue Farmington Hills, MI

Debra Cason, RN, MS, EMT-P Program Director and Assoc. Professor of Emergency Medicine Education University of Texas Southwestern Medical Center Dallas, TX

John R. Clark, JD, NREMT-P, FP-C Program Manager Critical Care Transport St. Vincent Health Indianapolis, IN

Heather Davis, MS, NREMT-P Program Director UCLA Daniel Freeman Paramedic Education Program Los Angeles, CA Joe Ferrell, MS, NREMT-P Education Coordinator Iowa Department of Public Health Bureau of EMS Des Moines, IA

Brian Litza Section Chief Bureau of Local Public Health Practice Wisconsin EMS Section Madison, WI

Dan Manz, BS, EMT-B Director, Vermont Office of EMS Burlington, VT

Severo Rodriquez, MS, AEMCA, NREMT-P Program Manager Southwest Ontario Regional Base Hospital Program, London Health Sciences Centre London, Ontario, Canada

Ritu Sahni, MD, MPH, FACEP Oregon State Medical Director Associate Professor of Emergency Medicine Oregon Health & Science University Portland, OR

Jeffrey P. Salomone, MD Associate Professor of Surgery, Emory University School of Medicine Deputy Chief of Surgery, Grady Memorial Hospital Atlanta. GA Jullette M. Saussy, MD, FACEP Assistant Clinical Professor LSU School of Medicine Section of Emergency Medicine New Orleans, LA

Robert Swor, DO, FACEP Emergency Physician and Director of EMS Programs, William Beaumont Hospital Clinical Professor of Emergency Medicine, Wayne State University School of Medicine Royal Oak, MI

Mark Terry, MPA, NREMT-P Deputy Chief Johnson County Med-Act Olathe, KS

EXECUTIVE DIRECTOR EMERITUS
Rocco V. Morando

DIRECTORS EMERITI

Ray A. Bias Marilyn Gifford, MD Norman E. McSwain, Jr., MD Roger White, MD

Changes in EMS Bring Both Challenges and Opportunity

BY PETER GLAESER, MD, FAAP, CHAIRMAN OF THE BOARD

I will begin with some familiar concepts: Change is constant. Change is opportunity. As elements of the EMS Agenda for the Future: A Systems Approach are implemented, the changes (some more dramatic than others) represent challenges and opportunity for the NREMT and EMS in general. For example, implementation of the National Scope of Practice Model requires that the NREMT provide valid and reliable certification exams that mirror each provider category. This means that every item in our test banks needs review and confirmation to ensure it remains current and appropriately calibrated for each category. It also means that thousands of new items need to be created and piloted, in order to demonstrate validity and reliability in the assessment of entry level competency. The NREMT will be holding ten item writing meetings in 2011 to meet this challenge. Concurrently the NREMT is responding to and revising test items to reflect recent dramatic changes in the American Heart Association's guidelines.

Continuing with the familiar concept theme I first mentioned: Decisions should be data driven. The EMS community may know that the NREMT uses state-of-the-art psychometric methods and experts to demonstrate with data that our National Certification examinations are valid and reliable. However, the EMS community may not know that the NREMT also has a Research Department directed by Greg Gibson, a full-time PhD researcher, and sponsors an EMS Research Fellowship that supports NREMT-Paramedics pursuing a doctoral degree while benefiting

from mentoring and hands-on research skill development. While the primary focus of their research is initial and continued competency, along with analysis of NREMT quality and customer service, many of their projects address more general EMS issues. These Research Fellows go on to secure important EMS research positions and have positive influence on the growth of EMS as a profession.

To better serve our customers, the NREMT continues to update our Information Technology. Our hard-working certification staff answered 547,413 phone calls in 2010. On-line recertification is quickly becoming the preferred method with 22,500 NREMTs choosing on-line certification versus the traditional paper method in 2010. These statistics support the need to implement these changes for the sake of our customers. Possessing the most comprehensive EMS database, the NREMT is also refining and investing in a robust disaster preparedness plan to assure continuity and "business recovery" in the event of a local disaster at our headquarters in Columbus, Ohio.

The NREMT has embraced the opportunity for change, recognized the need for continual change, and has allowed its decisions to be data driven; thus, the NREMT's contributions to the EMS community provide great pride for me as Chairman of the Board. To that end, I would like to thank the NREMT management and staff for all their hard work as well as the many volunteers and Board members who contribute their time because they care about EMS.



The NREMT has embraced the opportunity for change, recognized the need for continual change, and has allowed its decisions to be data driven; thus, the NREMT's contributions to the EMS community provide great pride for me as Chairman of the Board.





NREMT Executive
Director William E.
Brown, Jr. (left) with
founding NREMT
Executive Director
Rocco V. Morando.

"Here we are in 2010 celebrating our 40th anniversary and I am proud to say that over the past number of years there have been 1,441,000 Nationally Registered EMTs in the United States, a significant contribution to America's health and safety. All of this did not happen by accident – it involved hard work; long hours; many, many meetings; developing consensus; and leadership to produce action. It involved change that came about based on the ability to recognize the need for the change and to gather the intellectual capital to guide us through the process to test the change."—William E. Brown, Jr., Executive Director, NREMT

Summer Celebration Marks NREMT 40th Anniversary

The 40th anniversary of the NREMT was celebrated in Columbus, Ohio, June 4-5, 2010, beginning with the June Board meeting, then a panel discussion, and culminating with a banquet attended by representatives and friends of the EMS community.

The panel discussion consisted of some of the most influential EMS experts in the field who spoke about the most challenging issues facing EMS today, the role National EMS Certification plays on the safety and well-being of the American public, and how National Certification can contribute to the future of EMS.

The event marked the inception of the oldest non-governmental, non-profit EMS organization in the United States. Panelists were Ray Bias, head of Governmental



Past NREMT Chairs with Former and Current Executive Directors at the 40th Anniversary Celebration, June 2010, Columbus, Ohio. Left to right: Roger White, MD; Drew Dawson; Mary Beth Michos; Norman McSwain, Jr., MD; William E. Brown, Jr.; Jimm Murray; Rocco V. Morando; Peter Glaeser, MD; Marilyn Gifford, MD; Ray Bias; and Sandy Bogucki, MD. Other Past Chairs not pictured: Roddy Brandes; J.D. 'Deke' Farrington, MD; James Finison; David Hill, Jr.; Kenneth Kimball, MD; Joseph McCracken; and Howard Werman, MD.

Relations for Acadian Ambulance of New Orleans; Drew Dawson, Director of the Office of EMS for the National Highway Traffic Safety Administration (NHTSA); Dr. Marilyn Gifford, a leading expert in prehospital emergency care; Dr. Norman McSwain, one of the country's foremost experts on trauma care and inventor of the McSwain Dart—a patented device that enables Paramedics to relieve pressure in the chest; Mary Beth Michos, Deputy Executive Director and Chief of Operations for the International Association of Fire Chiefs (IAFC); Rocco Morando, founding Executive Director of the NREMT; and Dr. Roger White, Professor of Anesthesiology/Cardiology at the Mayo Clinic College of Medicine and recognized for implementation of the Early Defibrillation Program—considered the first and most effective of its type in the world. Panelists shared their recollections and insights on topics including:

Where Should the NREMT be in Ten Years

- Anyone with an NREMT certification card could go anywhere in the world and have their level of EMS expertise recognized—Mary Beth Michos
- The NREMT should be able to demonstrate that 'what we do makes a measurable objective outcome effect' on patients—Roger White, MD
- The NREMT would expand into other countries—Norman McSwain, MD

The NREMT's Greatest Challenge

- Consider the new alternatives available so that good data can guide the decisions we make as a community—Drew Dawson
- Proving that National Certification makes a difference—Norman McSwain, MD
- Being recognized as a profession like nursing and other medical professions
 —Mary Beth Michos

Speakers at the banquet included Executive Director William E. Brown, Jr., Rocco V. Morando, Jimm Murray, Dr. Roger White, Terry Shorr, Jeff Clark, Dr. Norman McSwain, and Drew Dawson. As founding Executive Director, Rocco V. Morando reflected, "It has been a long time—40 years—going in this Registry, and it has been fantastic! It has just grown and grown and grown. It has not only grown in numbers but in stature; that's the important part of it. It is recognized throughout the world..."

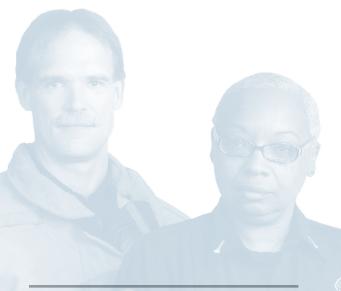
"I am proud of the association I have had over most of these 40 years with the National Registry and... on my own, decide to re-register [with the NREMT] and I am proud to be a Nationally Registered EMT Paramedic." —Terry Shorr, retired WV Office of EMS & Homeland Security, former NREMT staff member

"The National Registry of Emergency Medical Technicians is the only agency in the United States with national standardized mechanisms for assessing the knowledge and the performance capabilities of EMTs. Thus the designation Nationally Registered Emergency Medical Technician carries with it evidence of the best possible assurance of up to date knowledgeable and skillful patient care in emergency situations. I said that in 1980 and I hold to it now in 2010 and I will until the day I die."—Roger White, MD, two-term NREMT Chairman of the Board

"It is important to realize that EMS will be increasingly visible to the public in coming years. But it is also important to realize that we will be held increasingly accountable for good patient care; increasingly accountable for our actions; increasingly accountable for good entry level competency in the emergency medical services profession. I think the National Registry is uniquely poised to help assure that accountability [is present] in emergency medical services now and in the future." —Drew Dawson, Director of the Office of EMS for the National Highway Traffic Safety Administration (NHTSA), and former NREMT Chairman of the Board

"For the past 38 years, every two years, I have paid out of my own pocket to become re-registered because of my belief in what the National Registry is and stands for." —Jimm Murray, former NREMT Chairman of the Board

40 YEARS OF NREMT MILESTONES



The NREMT is declared "The National EMS Certification" as identified in the EMS Education Agenda for the Future.

- The NREMT's role in forming the National Association of EMTs (NAEMT), the National Council of State EMS Training Coordinators, and an original sponsor of the Committee on Accreditation for the EMS Professions (CoAEMSP).
- NREMT's submission of a brief in 1975 to the American Medical Association's Committee on Health Manpower to recognize the Paramedic as a bona fide Allied Health Occupation.
- Continuation of a DOD directive to improve EMS delivery in the US military, leading to the NREMT as the certification of competency for all US Army, US Air Force and select Navy personnel throughout the world.
- Leadership of the NREMT whereby over the past 40 years only two individuals have served as Executive Director: Rocco V. Morando and William E. Brown, Jr.
- Funding of a 10-year Longitudinal EMT Demographic Study Project (LEADS) and

- incorporation of a Research Department within the NREMT to study and report efforts to identify characteristics of continued competency of EMS providers.
- Fiscal responsibility, to a point that even after 40 years of certification, the fees that the NREMT receives for each applicant have remained modest.
- Declaration that the NREMT is "The National EMS Certification" as identified in the EMS Education Agenda for the Future. This is substantiated by the NREMT currently being part of the licensure process in 45 states and the U.S. Military.
- The implementation of Computer Adaptive Testing (CAT) for certification, which allows candidates for certification (138,221 in 2010) to receive next-day results, in most cases, via the internet.
- Since its inception, more than 1,441,000 EMS providers have been or currently are certified by the NREMT.



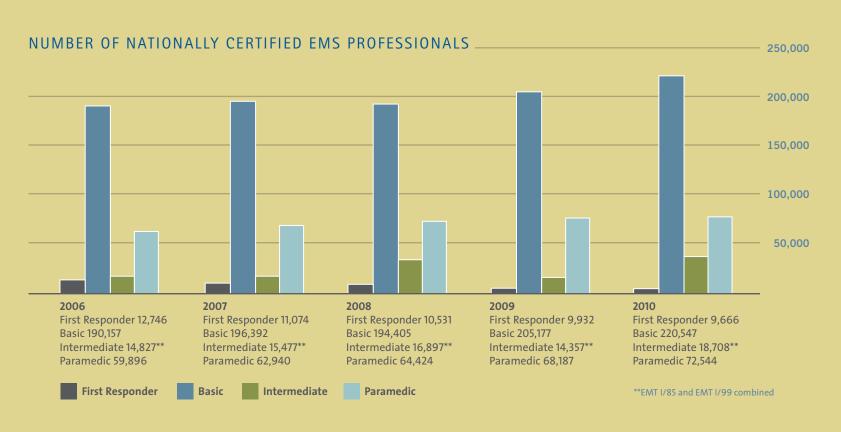








5 YEAR NATIONAL CERTIFICATION TRENDS



FIRST TIME PASS RATE

	2006	2007	2008	2009	2010
First Responder	65%	78%	76%	75%	73%
EMT Basic	71%	70%	68%	66%	67%
EMT-I 85	65%	70%	71%	69%	71%
EMT-I 99	59%	71%	72%	72%	75%
Paramedic	62%	63%	68%	71%	71%

EXAMS PER YEAR

	2006	2007	2008	2009	2010
First Responder	7,307	4,053	4,335	4,261	4,326
EMT Basic	94,616	83,709	91,323	103,447	106,556
EMT-I 85	5,518	5,341	5,523	5,826	6,326
EMT-I 99	1,704	1,537	1,623	1,382	1,340
Paramedic	17,380	17,001	18,424	18,080	19,673
Total	126,525	111,641	121,228	132,996	138,221

RESEARCH DEPARTMENT NOTES

"As the Director of Prehospital Research for a large academic hospital and urban EMS system, the education I received during my fellowship at the NREMT is put to use on a near daily basis. The EMS community needs Paramedics with a terminal degree and the educational experiences that come along with such a fellowship to help inform EMS stakeholders including medical directors, service directors and policy makers."

Jon Studnek, PhD
Director of Prehospital Research,
Carolinas Medical Center
The Center for Prehospital
Medicine, Charlotte, NC

2010 was an important year for the NREMT Research Department. The NREMT's second EMS Research Fellow, Dr. Antonio Fernandez, completed his fellowship with the NREMT and his doctoral studies with The Ohio State University (OSU), and now serves as Research Director at the EMS Performance Improvement Center for the Department of Emergency Medicine at the University of North Carolina, Chapel Hill. Additionally, NREMT Research Director, Dr. Greg Gibson completed his EMT-Basic training and is now an NREMT-B, in order to enhance his ability to understand the dayto-day workings of EMS. Dr. Gibson also secured an Adjunct Assistant Professor position at OSU in the School of Public Health. An array of EMS research was also disseminated in journals and at public EMS meetings. Additionally, a number of "first-ever" research projects were planned and initiated during the year:

 A joint continued competency research project sponsored by the NREMT and the Mecklenburg EMS Agency analyzed cognitive ability and performance on a simulated EMS response. An abstract of this research has been accepted for moderated poster presentation at the 2011 annual meeting of the Society for Academic Emergency Medicine, and a manuscript of this work is currently undergoing peer review.

- The NREMT conducted the first-ever, in-depth public opinion telephone survey designed by a committee of EMS experts. Public opinion was measured on topics including levels of comfort with EMS, expected ambulance arrival times, use of lights and siren, EMS funding questions, screening of EMS personnel, and perception of cardiac arrest survival rates. Dr. Ron Pirrallo, MD, MHSA, FACEP will assist in analysis and preparation of a manuscript.
- The first Research Round-up was convened, at which one of the guiding questions addressed was how an EMS system determines entrylevel and continued practice competency of EMS providers.
- The first generation of the decade-long Longitudinal EMT Attributes & Demographics Study (LEADS) has been completed, and the Research Committee is preparing the official report for publication.

The map illustrates the states that utilize National Registry certification to issue EMS licenses as of December 31, 2010.

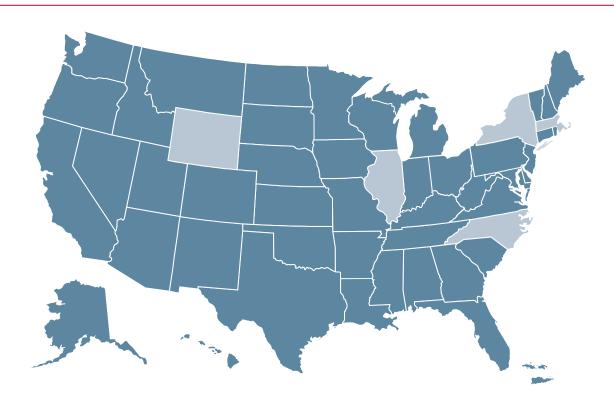
Utilize the Registry

Non-Registry

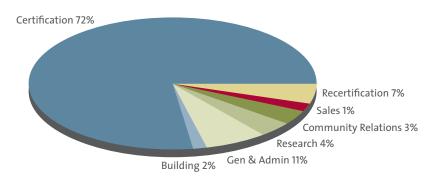
Notes:

Florida uses the National Registry for Basic certification only.

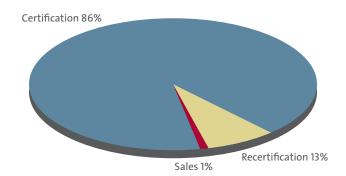
Alaska, Indiana, Maryland, New Jersey, New Mexico, Pennsylvania, and Virginia use the National Registry for Paramedic certification only.



OPERATING EXPENSES - \$11,652,188



OPERATING REVENUE - \$12,705,806



"Those working in EMS are good Samaritans. Some are providers of care who found and had been called to patients lying in the streets. Others are at today's inns—they call them hospitals—and they treat and nurse patients on the road to recovery; some are educators who teach others to provide care. Others are administrators, call center personnel, computer programmers, staff of the Registry who provide valuable services to improve EMS providers and make their jobs easier. Regardless of their specific nature or jobs, they are all good Samaritans. All...have contributed to making life better for Americans."

— William E. Brown, Jr., Executive Director, NREMT

NATIONAL REGISTRY
OF EMERGENCY
MEDICAL TECHNICIANS

ROCCO V. MORANDO BUILDING 6610 Busch Blvd. Columbus, OH 43229 (614) 888-4484 www.nremt.org

