# NIEHS WORKER EDUCATION AND TRAINING PROGRAM Spring 2004 Technical Workshop



# TRAINING PARTNERSHIPS FOR PREVENTION, PROTECTION AND PREPAREDNESS



Produced by The National Clearinghouse for Worker Safety and Health Training

#### **Executive Summary**

The Worker Education and Training Branch of the National Institute of Environmental Health Sciences (NIEHS) conducted a major national technical workshop in the spring of 2004 in Washington, D.C at the Loews L'Enfant Plaza. The conference was titled "Training Partnerships for Prevention, Protection and Preparedness" and was held on April 22nd and 23rd. NIEHS, in conjunction with the Office of Domestic Preparedness within the Department of Homeland Security (ODP/DHS) and the Occupational Safety and Health Administration (OSHA), sponsored the workshop to focus on building stronger relationships for the training of disaster responder populations most at risk of illness and injury, particularly fire fighters, health care workers, and the construction trades needed at disaster responses. NIEHS is one of 27 Institutes and Centers of the National Institutes of Health (NIH), which is a component of the Department of Health and Human Services (DHHS). The Director of the NIEHS is Dr. Kenneth Olden. NIEHS has been a leading force for training workers to safely respond to terrorist actions. A detailed workshop report is posted on the NIEHS National Clearinghouse website at http://www.wetp.org/wetp/1/04meeting/index.html.

The goal of this workshop was to strengthen the partnerships that NIEHS has created with other federal agencies to better protect workers and coordinate resources. Representatives from DHS, OSHA, EPA, and the National Response Team spoke at several plenary sessions. Each agency reviewed its respective role in homeland security and its relation to response training and preparedness. In addition, to provide an opportunity for interaction between speakers and participants, several breakout sessions focused on the lessons learned by current awardee partners and their potential contributions to WETP's emergency activation plan. Finally, keynote speakers highlighted policy, training, and preparedness issues for the chemical industry and for public health in response to terrorism.

The Technical Workshop began on Thursday with a Department of Homeland Security Plenary. The DHS plenary addressed two issues: 1) how the new National Response Plan, National Incident Management System and Incident Command System will deal with response training; and 2) how the Office for Domestic Preparedness views the relationship between homeland security and HAZMAT training and preparedness.

Speakers pointed out that response training is being addressed by incorporating FEMA into the new DHS. The Agency is tasked with preventing, responding to, and planning for disasters. In addition, the DHS developed a National Response Plan (NRP) and a National Incident Management System (NIMS). The need for a standard approach and common terminology across all disaster incidents, regardless of size and location was emphasized. The NRP is the Federal Government's "recipe book" for emergency planning and the NIMS is the structure of the command and control system. The DHS speakers addressed the importance of a credentialing system for responders, but noted that the strategy had not been worked out yet.

In addition, the Office for State and Local Government and Preparedness (OSLG), formerly the ODP, has been expanded and transitioned to the DHS from the Department of Justice. Its Training and Technical Assistance Division (TTAD) funds comprehensive training to prevent, deter, respond to and recover from threats and incidences of terrorism.

Individual states and localities have also coordinated emergency services and skilled trades so they can work together in case of an event. Seattle's First Response and the Skilled Trade (FIRST) program is one of the most active groups, as A.D. Vickery and Charles Soros, the group leaders, explained. FIRST has established a strong working relationship among all the key groups that will be needed in Seattle if there is a terrorist action or a natural disaster. Their focus has been on the first 24-36 hours of an event.

Keynote speaker, Dr. James Carafano, a Senior Fellow at the Heritage Foundation, then addressed some of the challenges of establishing national preparedness. One challenge is that neither DHS nor OSLG have the capacity to directly conduct training, so they must rely on other organizations, through contracts and agreements. Consequently, the ii

integration of training is a problem. In addition, there are no systems in place to identify the needs of individual communities or the effectiveness of programs. Carafano feared that federal money may be going towards building a national system that is not meeting the needs of communities.

Another panel addressed the successful development of the Disaster Site Worker course, a joint effort of OSHA and NIEHS and its grantees. Materials developed by NIEHS awardees were provided to OSHA, along with expertise from master instructors, to create a 16-hour course for the construction trades that addresses the key problems discovered at Ground Zero: misunderstandings of the Incident Command System and insufficient hands-on training with respirators. The join effort also created a 24-hour Train-the-Trainer program. OSHA and NIEHS officials are hopeful that the cards issued by the OSHA Training Institute under these courses will be recognized by DHS as part of the national credentialing program. OSHA has aggressively begun training teams of specialists in every region across the country to deal with the safety and health aspects of responses to terrorist actions. OSHA, NIEHS, and its grantees pledged to continue to work together protecting those who protect our homeland security.

Erich "Pete" Stafford, the Director of the Center to Protect Worker's Rights (CPWR), noted that his organization, which is the safety and health research arm of the Building and Construction Trades Department of the AFL-CIO, has developed an interactive DVD training program for skilled support personnel. As an OSHA Education Center, CPWR and its 4000 instructors in affiliated building trade unions will train thousands of their members and prepare them to support first responders; however, not enough skilled support personnel are currently receiving training.

The need for these training programs was highlighted in the EPA Keynote Speech given by Marianne Horinko, who at the time of her presentation was the Assistant Administrator for the EPA Office of Solid Waste and Emergency Response. She explained how, given the nature of terrorism, it is nearly impossible to fully prepare for the repercussions of an attack. The best ways to deal with these uncertainties is to prepare for many possible scenarios and to promote coordination among agencies.

Breakout sessions concluded Thursday's activities. The common theme that bridged these breakout sessions was "partnerships." Breakout session 1 focused on Federal and Tribal Partnerships and was highlighted by the success of the partnership between University of Alabama and the Poarch Band of Creek Indians. They have created a mutual aid agreement between their responders. John Kovach from the Operating Engineers National HAZMAT Program discussed the partnerships the program has been pursuing with other organizations concerned with preventing or mitigating biological or chemical attacks released inside buildings.

Speakers from breakout session 2 shared insights into current training at hospitals and other first receiver/emergency response organizations, focusing on WMD modules about working with contaminated patients and strengthening the ER capabilities of fire and other emergency response entities. In particular, the breakout examined the characteristics of four successful partnerships around hospital, WMD and emergency response training. These partnerships include:

- 1. Brookdale University Hospital and the Service Employees International Union, Local 1199 NY;
- 2. Lutheran Hospital (NY), the Federation of Nurses/United Federation of Teachers and the International Chemical Workers Union;
- 3. The Commonwealth of Kentucky and Office of Applied Innovation; and
- 4. The Chicago Fire Department, International Association of Fire Fighters, and the OAI.

Breakout session 3 focused on the partnerships between Industry and Trade Associations that have increased the number and quality of courses available for responding to WMD incidents and other emergencies. NIEHS awardees such as the Midwestern Consortium and the International Chemical Workers Union have built strong relationships with various organizations.

iii

Breakout session 4 concentrated on state, local and bi-national partnerships and closely examined the Massachusetts approach to preparing communities for a public health emergency as well as the Arizona effort to partner with several Mexican states to train emergency responders along their long border.

Friday began with the second OSHA plenary, which reviewed OSHA's newly emerging role in disaster response and homeland security and the actions the agency has taken to prepare for its new challenges. The focal point of the agency's efforts is the development of a National Emergency Management Plan (NEMP) and Regional Emergency Management Plans (REMPs). Part of these plans involve Specialized Response Teams (SRTs) which are made up of teams of toxic chemical, biological agent, ionizing radiation and structural collapse specialists. In addition, OSHA has drafted a Safety and Health annex to the National Response Plan that is currently being reviewed by the other federal partners.

Next, the EPA plenary panelists reviewed the role of the National Response Team (NRT), EPA's participation on the team and the changes anticipated under the NIMS. First, it was explained that response planning and coordination is accomplished at the federal level through the NRT, which is comprised of the Response, Preparedness and Science committees.

John Ferris, Special Assistant for Homeland Security to John Henshaw, the head of OSHA, highlighted the importance of linking training exercises to the National Contingency Plan (NCP). The NCPs contains regulations developed to ensure that federal resources and expertise are available immediately for hazardous material releases that are beyond the capabilities of local or state responders. John Ferris also noted that all emergency response programs should be consistent with each other and the EPA's Response Operations Center (OEPPR) has developed criteria to measure consistencies among programs.

Other successful programs include The NRT's Hazardous Materials Emergency Preparedness (HMEP) grant program and the collaboration between the EPA and inter-agency personnel. The HMEP provides financial and technical assistance as well as national direction and guidance to enhance State, Territorial, Tribal and Local hazardous materials emergency planning and training.

Friday concluded with more breakout sessions. For these sessions, participants were broken up into groups reflecting their sector of industry. These groups included: transportation, hospital and public health, chemical facilities and construction trades. The purpose of these sessions was to provide the WETP with enough information to develop an Emergency Support Activation Plan that will allow NIEHS to support OSHA with trainers, facilities, and specialists during an event of national significance. Information was gathered by questionnaire from all participants. The surveyed revealed that the WETP community has numerous professionals, including health physicists, industrial hygienists, and occupational physicians who could be activated for an emergency. There are thousands of instructors who could also train responders during an event in hundreds of facilities located throughout the country. All awardees offered HAZWOPER training, but also many specialty courses.

The consensus of respondents also believed that not only should each WETP-funded organization have one special person to contact in case of an incident (with a back-up person), but there needs to be one person that coordinates communication between organizations and agencies.

# **Table of Contents**

	Executive Summary			
	Table of Contents			
I.	Department of Homeland Security Plenary2			
II.	Keynote on Homeland Security Preparedness Training: Emerging Policy Issue5			
III.	OSHA Plenary: The New Disaster Worker Course7			
IV.	Keynote on EPA's Efforts in Homeland Security10			
V.	Keynote on Chemical Facilities Safety and Security: Training and Preparedness Issues11			
VI.	Thursday Breakout Sessions1			
	a.	Breakout One12		
	b.	Breakout Two		
	c.	Breakout Three14		
	d.	Breakout Four		
VII.	Second OSHA Plenary: Worker Protection and Homeland Security			
VIII.	EPA Plenary Panel21			
IX.	Friday Breakout Sessions			
	a.	Breakout Five		
	b.	Breakout Six25		
	c.	Breakout Seven		
	d.	Breakout Eight		
X.	Appendices			
	a.	Appendix A31		
	b.	Appendix B37		
	c.	Appendix C41		

#### I. Department of Homeland Security Plenary

#### Moderator: Chip Hughes

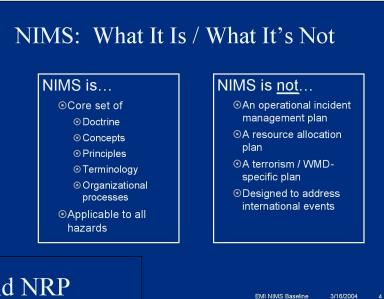
Chip Hughes began the Department of Homeland Security (DHS) Plenary, noting that the plenary would address two important concepts: (1) how the new National Response Plan, National Incident Management System, and Incident Command System will deal with HAZMAT training; and (2) how the Office for Domestic Preparedness views the relationship between homeland security and HAZMAT training and preparedness.

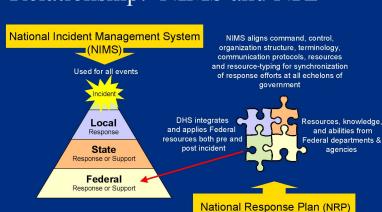
Marco Bourne, Deputy Director of the Emergency Preparedness and Response Division of the Federal Emergency Management Agency (FEMA), initiated his discussion with a background on FEMA. In March 2003, under the Emergency Preparedness and Response Directorate, FEMA was incorporated into the new Department of Homeland Security. The agency is tasked with preventing, responding to and planning for disasters.

Next, Mr. Bourne spoke about the 2003 Homeland Security Presidential Directive 5 that emphasizes the need to enhance the ability of the United States to manage domestic incidents by establishing a single, comprehensive national incident management system (NIMS). The directive recognized the need for common terminology across all disaster incidents, regardless of size and location. DHS was commissioned to develop and administer the NIMS and the National Response Plan (NRP).

Mr. Bourne differentiated between the NRP and NIMS. He described the NRP as the federal government's recipe book to emergency planning. It tells who does what and when and how. Mr. Bourne said NIMS, on the other hand, is the structure of the command and control system (not the plan) that allows state, local, and federal levels to operate. Its basic components include command and management, preparedness steps, resource

🖉 FEMA





Activated for

incidents of national significance

EMI NIMS Baseline

3/16/2004

management, communications and information management, supporting technologies, and ongoing management and maintenance. NIMS serves as a scaleable core set of doctrines, principles, concepts, and terminology. NRP and NIMS are related in the sense that they create an integrated federal, state, and local response plan that is scaleable and based on common standards and language.

Importantly, FY05 will be the first year

# Relationship: NIMS and NRP

that to receive federal preparedness assistance funding, state and local level agencies must adopt NIMS. These same parties will be involved in discussions with the Office for Domestic Preparedness to ensure compliance and that all entities understand what NIMS entails. You can access the full, official NIMS document text at: http://www.dhs.gov/interweb/assetlibrary/NIMS-90-web.pdf

To view the NIMS awareness web-based course offered through FEMA, please visit: http://training.fema.gov/emiweb/IS/crslist.asp

The next presenter was Darrell Darnell, Division Director of Local Programs for Domestic Preparedness in the Department of Homeland Security. He spoke about the history of the Office for Domestic Preparedness (ODP), now referred to as the Office for State and Local Government Coordination and Preparedness. Mr. Darnell then explained the expanded responsibilities of the Office and offered an overview on ODP training, support, courses, and resources.

Specifically, he discussed how in April 1998, ODP was established through the Department of Justice to improve state and local WMD incident response capabilities nationwide. In March 2003, ODP was transitioned to DHS and its mission expanded to incorporate the national strategy into planning guidance, support risk analysis, coordinate preparedness efforts, provide training, and other tasks. Moreover, Mr. Darnell discussed ODP's Training and Technical Assistance Division (TTAD), which provides comprehensive training to prevent, deter, respond to, and recover from threats and incidents of terrorism. ODP provides funding for such programs through formula grants to institutionalize terrorism training at the state and local levels. With the help of partners such as the National Domestic Preparedness

Consortium, TTAD trains emergency responders nationwide in over forty courses.

ODP Training courses cover three levels of training: awareness, operations and technician performance, and planning and management. These courses are administered via mobile, residential, and distance learning mechanisms and incorporate a comprehensive development and evaluation process based on instructional systems design, gap/needs assessment, pilot courses, subject matter experts and interagency review. For more information on training resources, Mr. Darnell directed the audience to call (800) 368-6498 or to visit www.ojp.usdoj/gov/odp.



The third presenter, A.D Vickery, Deputy Chief for Homeland Security of the Seattle Fire Department, spoke about the First Response and the Skilled Trades (FIRST) program. Mr. Vickery explained that FIRST is set up to ensure the safe and successful coordination of emergency services and the skilled trade. Those involved with the Program strive to meet this mission by supporting two core objectives: (1) improving the safety and effectiveness of specific trained assets from labor and industry, and (2) developing a strategic plan to formalize the integration of resources.

He also mentioned that in November 2003, the FIRST Program Stakeholder Summit was held and several operational and training recommendations were agreed upon. Operational recommendations included integrating the skilled trade community into local, state, regional, and national response plans and exercises; establishing procedures for skilled trades notification, activation, and involvement; developing a set of coordinated safety operating rules; identifying local

"construction liaison superintendents" and integrating them into command staff; collaborating with local emergency planning committees; formalizing coordination between construction liaison superintendents and safety officers in the fire service; developing MOUs between the construction industry, skilled trades, and the emergency response agencies; and sustaining existing employee-employer relationships for the skilled trades.

Mr. Vickery continued with a discussion of some of the training program recommendations. These included providing training in four content areas such as hazard recognition, decontamination, incident command, and personal protective equipment; issuing identification/skill cards that verify completion of training; and ensuring that continuing education credentials are current. He concluded his presentation by restating the importance of first responders and skilled trades working together.

The final presenter, Chuck Soros, Chief of Special Operations of the Fire Department Safety Officers Association, further discussed the Seattle experience and the vision for first responders and skilled trades to work together to prevent chaos and minimize risks at disaster sites. To reach this vision, Mr. Soros explained that planners needed to find a focal point that could be used to increase emergency response awareness – and the strategy to do so was through collaboration with the Seattle Associated General Contractors (AGC).

This collaboration helped to advance two goals: meeting emergency response planning objectives and establishing an emergency incident response process. The first goal, meeting planning objectives, includes using incident command systems (ICS) effectively, incorporating training modules, establishing liaisons with superintendents, addressing credentialing needs, and identifying minimally acceptable training. The second goal, establishing a planning approach, determines the main concerns of a terrorist incident, who is responsible for what, who is needed to help, and how to get the resources to do the aforementioned.

Focusing on the first 24-36 hours of an incident, seventeen training modules were agreed upon and developed for the construction trade. These module topics included SCBA, first aid, blood-borne pathogens, fire behavior, trench rescue, personal protective equipment, confined space, hazardous materials, asbestos warning, and fall protection. Furthermore, module requirements should included prerequisite courses, general knowledge, site operational knowledge, and experi-

# **17 Modules developed**

- 1. ICS
- 2. Decon
- 3. PPE
- 4. SCBA
- 5. First Aid
- 6. Bloodborne
- pathogens 7. Fire behavior
- 8. Trench rescue

- - 9. Confined space 10. Hazardous materials
  - 11. Crime scene
  - preservation
  - 12. Fall protection
  - 13. Asbestos awareness
    - 14. Demolition safety
    - 15. Hoisting and rigging
    - 16. Site safety plans
    - 17. Hazard Analysis

ence working in the hazard zone. Mr. Soros emphasized that from this, basic skilled support personnel training programs should be developed and supported to help prevent chaos and minimize risks at disaster sites.

Following the plenary, were questions from the audience. Some participants asked for more information on credentialing, the NIMS framework, workers compensation, and how unified command is being incorporated into recent decisions. Others asked specific questions regarding training for public work employees, ERTs in the building trade, transportation workers, and community residents.

## II. Keynote on Homeland Security Preparedness Training: Emerging Policy Issues.

#### Dr. James Jay Carafano, Senior Fellow, The Heritage Foundation

Dr. Carafano is a Senior Fellow at the Heritage Foundation, and a national authority on the policy issues of appropriate training for emergency response. He presented a policy overview of the national effort to train and credential emergency responders. He also gave his own perspective on Homeland Security Presidential Directive # 8.



Dr. Carafano began his talk by explaining that emergency response and preparedness is one of the five strategies the government outlined to improve homeland security. It includes training for firefighters, police and EMTs, but it neglected to include the skilled support personnel. The 2002 Act definition addresses emergency responders not just first responders. It also created the Homeland Security Council, which creates policy. The Council staff does the work every day, getting the job done without a lot of publicity.

Dr. Carafano stressed that we must have security (offense and defense) and economic growth, while at the same time protecting civil liberties and privacy. We

need to pay attention to how we're setting the system up, as we will have to live with it for 30 years.

He then explained the Homeland Security Presidential Directive #8: It is not a law, but the President tasking the federal government with a job to do.

("This directive establishes policies to strengthen the preparedness of the United States to prevent and respond to threatened or actual domestic terrorist attacks, major disasters, and other emergencies by requiring a national domestic all-hazards preparedness goal, establishing mechanisms for improved delivery of Federal preparedness assistance to State and local governments, and outlining actions to strengthen preparedness capabilities of Federal, State, and local entities." – from Whitehouse website)

Some aspects of the directive are: First responder/emergency responder become synonymous; Establishes a requirement for national preparedness goals (mandates completion by September); Requires the government to establish objectives and focus resources; Requires federal agencies to establish a single contact for state and local governments (by September 2005); Requires a national training program, bringing all the programs together holistically; Assess national preparedness. Federal agencies must identify equipment needs of responders at state and local level, and ODP moved to Office of State and Local Governments, which will ultimately benefit communities.

Dr. Carafano then commented about the directive, noting:

- Neither the DHS nor the OSLG have the capacity for training; therefore, the integration of training is a key problem;
- The program evaluates level of preparedness but not its effectiveness, thus, there is no system to evaluate if we're gaining progress for the funds being spent.
- There is no committee that exists to identify the equipment needs of a community.
- If there is a new president in January, the HSPD does not have to survive the presidency; Authorization Oversight Select Committee for DHS only exists in the House, not The Senate and is not a permanent committee; HSPD says we have to prioritize, federal money is going towards building a national system that is not meeting the needs of communities.

After Dr. Carafano finished speaking, the floor was opened for questions and comments. Don Elisburg noted that policies set by White House advisors are not getting to the budget line thus there is a disconnect. Dr. Carafono replied that the OMB has made strides in improving what each department is spending on homeland security and that new measurements in place are helping.

Tom McQuiston then asked: "Our concerns are centered around potential disasters around chemical facilities, how do we ratchet up concerns for tens of thousands who might be harmed in that event?" Dr. Carafano replied that DHS is identifying that the biggest bang for the buck is prevention rather than mitigating/response. The National Guard is not structured to support this type of response however. Thus, there is work to be done at that level. There is enormous capacity of the military to help reduce our requirements to ramp up on the response side.

#### III. OSHA Plenary: The New Disaster Worker Course

#### Moderator: Dr. Bruce Lippy

Dr. Bruce Lippy, Director of the National Clearinghouse, opened the Occupational Safety and Health Administration (OSHA) Plenary by stating the theme of the session, which was to review the status of the disaster site worker course being developed jointly with NIEHS and its grantees.

Dr. Henry Payne, Director of OSHA Office of Training and Education (OTI) began the plenary with a brief discussion on OSHA and its objective to set and to implement national safety and health standards for emergency responders. He then talked about what OSHA is currently doing in emergency preparedness training. Dr. Payne explained that following September 11<sup>th</sup>, OSHA sought to better serve its employees and recognized the need to internally train its employees in the case of emergency situations. Thus, in July 2003, OSHA put together an awarenesstraining program that served the aforementioned purpose.



Dr. Payne further noted that when responding to an emergency situation, the best knowledge that responders should receive is that about worker safety and

health. Thus, responders should be advised to complete emergency preparedness training for which they can receive a certification card for the 16-hour Disaster Site Worker course and OSHA 10-hour construction course. Dr. Payne concluded his talk by proposing to Chip Hughes of NIEHS that both agencies have semi-annual meetings to look at disaster and training issues and to see where both agencies can cooperate to make better use of the materials that the grantees develop. More information on OSHA's OTI can be found at http://www.osha.gov/fso/ote/training/training\_resources.html



Pete Stafford, Director of the Center to Protect Workers' Rights (CPWR), was the next panelist to address the audience. He described aspects of his organization including its background in disaster response training and the training structure within the Building Trades. The program is structured to deliver training to skilled support personnel, including 2,500 training centers nationally that annually train over 500,000 construction workers. Mr. Stafford emphasized the importance of the on-site training of approximately 1,300 construction workers at Ground Zero immediately following September 11, 2001. The focus of this immediate training was

personal protective equipment (specifically for respiratory protection), hazard identification and decontamination, and incident command.

The lessons learned resulted in the development of CPWR's DVD training program for skilled support personnel. Over 4,000 instructors will be trained to deliver the program, with over 700 trained to date. The model, in collaboration with OSHA as a regional training institute, will allow CPWR and its affiliated building trades unions to train thousands of their members and prepare them to support first responders when called upon in their role as skilled support personnel. Mr. Stafford concluded his talk by stating that CPWR has worked with OSHA to assist them with the agency's training programs. More information can be found at http://www.cpwr.com/Training.htm

The third panelist, Cathy Cronin, Coordinator of the OSHA Construction Outreach Program, commented that not enough skilled support personnel are received training even though the available HAZWOPER training programs are excellent. Furthermore, Ms. Cronin stated that OSHA has decided to focus their training programs as all hazard courses - not just ones created for weapons of mass destruction training only.

She also explained that through lessons learned, OSHA has established hands-on, skills-training components, which have been included in new curriculum. Also, OSHA has recognized the need for advanced respiratory protection training and has used a CPWR DVD to create a 16-hour curriculum program.

More so, Ms. Cronin noted that OSHA has been encouraging workers to obtain HAZWOPER training. In doing do, the agency has issued a Program Card, which verifies that workers have successfully completed the necessary levels of accredited training programs and any other additional programs that individual workers choose to take. Additionally, OSHA is expecting to give out a second card for



trainers who complete a four-day course. This training is expected to be available by July. Ms. Cronin said that trainers must be authorized in outreach construction, have completed the HAZWOPER 40-hour course, and have three years of experience as a safety and health trainer. More information about OSHA's training programs can be found at http://www.osha.gov/fso/ote/training\_training\_resources.html

In closing, Ms. Cronin directed the audience to read OSHA's "Inside the Green Line" report available at the following website: http://www.osha.gov/Publications/osha3189.pdf.



Doug Feil, Director of Environmental Programs at Kirkwood Community College (KCC) was the forth presenter during the OSHA Plenary. Mr. Feil explained how KCC, as part of an OSHA pilot program, used OSHA's education centers to offer a six-day train-the-trainer (TTT) class. These TTT classes are targeted at responders other than skilled support personal who would appear at the incident site during the latter portions of an emergency such as the consequence management or recovery phase stage. Amongst other groups, public health representatives were invited, as were veterinarians.

Mr. Feil explained that the first three days of the TTT classes related to the programs OSHA offered while the last three days focused on different topics. The KCC classes trained the trainers on how to analyze incidents and how to develop training for the hazards specific that site. Mr. Feil noted that trainers who participated were asked to bring maps and information specific to their communities. The trainers then looked at site safety plans and practiced developing efficient on-site training programs. More information can be found at: http://www.hmtri.org/moec/moec\_index.htm

The final panelist was Stew Burkhammer, the Director of OSHA Office of Construction Services. Mr. Burkhammer challenged the audience to think about the purpose of developing the training programs and to really think about why responders need the training to begin with. Understanding what training is about can help with compliance of regulations and response to unexpected incidences on-site. He then compared his experiences with health and safety training at the Kuwait oil fields and at Ground Zero in New York to elucidate this point.



Mr. Burkhammer explained how the challenge in Kuwait centered on first explaining safety and health and then developing a safety and health program for twenty-three nationalities. At Ground Zero, he and his team were challenged with two things: (1) getting all the involved agencies, twenty-six in total, to approve the response plan before it could be implemented; and (2) training over ten thousand people with different skills and occupations.

These two experiences shed light on an important lesson, which is to proactively plan for emergency incidents in a manner that is collective and cooperative. The way to achieve this objective, Mr. Burkhammer alluded to, is via

effective training - training that addresses roles, responsibilities and capabilities. More information can be found at http://www.osha.gov/doc/mission.html

The OSHA Plenary ended with a question and answer period. Participants asked questions about enforcement in emergency situations, the need to train chemical plant employees, and the adequacy of the level of protection implemented at Ground zero. One participant asked how to define a disaster site compared to a HAZWOPER site to which Donald Elisburg replied that "Current statue does not speak to the Superfund, it never has. The issue as to which regulations apply is based on whether or not the site is an uncontrolled hazardous waste site."



#### IV. Keynote on EPA's Efforts in Homeland Security

Marianne Horinko, Assistant Administrator for the EPA Office of Solid Waste and Emergency Response (OSWER).



Ms. Horinko began by noting that it was the Anniversary of EPA and Earth Day. In the early days of the EPA, things like cleaning up streams and car exhaust was considered the EPA's most important goals. This is not true today.

Global terrorism has added new uncertainties and demands to the EPA. The Exxon Valdez incident, 9/11 and the anthrax cleanup are all new examples of what new things the EPA has to deal with. Each of these events has made the EPA re-evaluate its priorities. Given the nature of terrorism, the future of what is needed to deal with an attack is uncertain. The EPA must assume that its assumptions are incomplete and that future attacks will be different from

previous attacks. There are hundreds of prospective targets and a number of different weapons; therefore it is nearly impossible to predict what may happen in the event of an attack. She noted that the best way to deal with these uncertainties is to prepare for many possible scenarios. In addition, coordination on site and across agencies is a must. The EPA is committed to this.

Frank Meyerer then asked if the resulting health of residents of lower Manhattan due to 9/11 made EPA reassess air standards? Ms. Horinko answered that while the general answer is 'Yes,' the EPA had put out a report that stated there were no health effects found in <u>residents</u> (not true for responders).

#### V. Keynote on Chemical Facilities Safety and Security: Training and Preparedness Issues.

#### Rixio Medina, Member, U.S. Chemical Safety and Hazard Investigation Board.

Rixio Medina, a recent Bush appointee and former chemical company executive shared his perspective on the complicated issue of chemical security. He related his experience in the private sector and his new role as a member of the Chemical Safety Board.

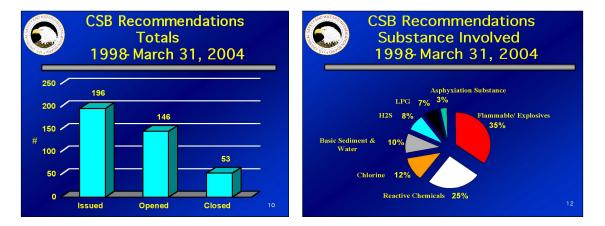
The CSB was conceived by congress following a series of catastrophic industrial accidents in mid to late 1980. It was authorized under the 1990 clean air act amendments 42 USC-7412 (r)(6) and funded in 1998. It independently investigates chemical accidents or potential chemical accidents at fixed industrial facilities that result in or had the potential to result in fatality, serious injury or substantial property damage such as the one caused by fires and



explosions, that can harm the public, employees or the environment. The board is required to determine the root causes and contributing causes in their investigation and not blame or determine who is liable as a result of an accident. The board is required to report to the public the facts of the accident including the conditions, circumstances and probable causes of the accidental chemical releases in addition to the hazards or potential hazards the accident might cause. The board holds public meetings in the area where the accident happened, and it shares the information though its publications and website.

The Board is authorized to issue recommendations aimed to reduce the risk and consequences of accidental releases or potential hazards and to propose corrective measures to improve the safety of industrial facilities producing, processing, handling and storing chemicals.

Since the CSB started operations through the end of March of 2004, it has completed 20 accident investigations and is engaged in eight current investigations of accidents that occurred in 2003. It has completed five hazard studies and has two in progress during the same timeframe. The CSB has issued a total of 198 recommendations, 53 of which have been fully implemented and 145 are still opened. 14% of the recommendations were issued to specialty chemical companies, 13 % to oil and gas and petroleum refining, 12 % to chlorine repackaging facilities 8 % to the wood & pulp industry, 7% to users of petroleum products such as oil blending and lubricant operations, 5% to waste treatment and disposal facilities, 3 % to petrochemical companies and the remaining 25% of the recommendations were issued to a variety of industries. 30% of the recommendations have been issued to professional and trade associations, mainly requesting that the report, lessons learned and recommendations be shared with their constituents. 25% were issued to industrial facilities involved in the accident, 20% to the corporate offices of those industrial facilities, 25% to governmental agencies including OSH and EPA, 8 % to Union and ½ a percent to trade associations and academia. More information can be found at: http://www.csb.gov



#### **VI. Thursday Breakout Sessions**

#### a. Breakout #1

#### Federal and Tribal Partnerships Moderator - Alan Veasey, Program Director, Workplace Safety Training, University of Alabama Birminham (UAB)

The purpose of this breakout session was to share federal and tribal partnerships that have successfully provided health and safety training to underrepresented populations. The training topics included hazardous materials, incident management, and WMD response. Effective outreach materials were reviewed.

April Sells, Wellness and Activities Director from the Poarch Band of Creek Indians, explained her partnership with UAB and how it benefits counties in Alabama that surround her reservation. UAB uses NIEHS grant funding to provide training to the Poarch Creeks, who then used either there own tribal funds or federal funds routed through the State of Alabama.

Her tribal community has a lot to offer the surrounding communities. They have a large fire department, very well trained individuals, and equipment counties may not have. The Poarch Band of Creek Indians consolidates and shares resources with the nearby counties. They also train personnel in nearby counties thanks to the funding from UAB. She emphasized that communities should look into partnering with nearby tribal communities. The best way to do so is to contact the "Chief or Tribal Chair."

John Kovach discussed the partnerships the Operating Engineers National HAZMAT Program (OENHP)has with the DHS, the chemical industry, MSHA, Energy Assurance Technical Training and Awareness Program, Human Factors Assessment Program, Orange County Florida Sheriff's Association, OSHA, NIOSH, West Virginia Army National Guard and the West Virginia Department of Health and Human Resources.

In response to a question, it was noted that one way to get tribes to understand the value of training or to get imbedded into a tribal council is to contact the EPA office of tribal affairs or the ATSDR office of Tribal Affairs. It was also noted that there are more than 300 tribes in the U.S. It is therefore important to be patient of their traditions that may make an impact on their interactions. You must develop a relationship with tribal leaders and get to know the leaders before you start talking business.

#### b. Breakout #2 Hospital, WMD, and Emergency Response Training Moderator: Mark Catlin

Moderated by Mark Catlin from SEIU Education and Support Fund, this breakout session focused on current training at hospitals and other first receiver/emergency response organizations. In particular, the breakout examined the characteristics of four successful NIEHS partnerships around hospital, WMD, and emergency response training.

Michael Vatch of Brookdale University Hospital and Steve Schrag of SEIU Local 1199 NY, began the breakout by discussing the training partnership with the Brookdale University Hospital and Medical Center. With approximately 100,000 visits a year, Brookdale has one of the busiest Emergency Departments in New York City's five boroughs. A recently remodeled emergency room facility now includes a decontamination area and is prepared to serve wounded in case of a terrorist attack. Worker trainers at SEIU Education and Support Fund provide two levels of training. The first level, the 8-hour emergency response awareness training, is intended for employees from across hospital departments and uses the small group activity method. The second level, the 24-hour emergency response operations level training, with Paul Penn of EnMagine, is intended for emerging health threats, including WMD, for pre-hospital, emergency department, safety and security staff.

The second group of speakers highlighted the partnership between Lutheran Hospital (NY) and the Federation of Nurses/United Federation of Teachers (UFT). Renee Gestone-Setteducat and Jihad Hamad discussed how the Federation of Nurses/UFT collaborated with Lutheran Hospital on an 8-hour emergency preparedness/disaster response training for emergency room nurses to improve the hospital's emergency response capabilities.

Building on this successful collaboration, the next step involved providing more-in depth training to nurses, including those in the intensive care and recovery rooms. The International Chemical Workers Union (ICWU) in conjunction with the Federation of Nurses/UFT and the American Federation of Teachers conducted a four-day course "Protection of Hospital Personnel and Patients in Response to a Weapons of Mass Destruction Attack" at the UFT headquarters in March 2004. Having both the employer and the UFT collaborating together in this training was eye-opening and very well received. An immediate outcome of the March 2004 course is that ICWU will conduct a 4-day course at Lutheran Hospital for staff nurses and supervisors.

The third discussion, led by Dennis Decker and Tipawan Reed, focused on the partnership between the Commonwealth of Kentucky and OAI (of the Puerto Rican Forum), their respective organizations. Building upon the ongoing relationship with the State Fire Marshal's office, OAI served as a catalyst in bringing together, for the first time, all key state agencies to develop and implement: (1) a statewide training plan for first responders; and (2) a needs assessment to determine WMD preparedness. Effective collaboration at the statewide level is more critical now than ever before and learning from this experience and replicating it elsewhere would be a worthwhile endeavor.

The final discussion, led by Scott Solomon and Tipawan Reed, offered information on the partnership between the Chicago Fire Department, IAFF and OAI. The attacks on 9-11 caused us all to realize that we must learn to work together and that first responders must be provided with as much knowledge, skills and tools as possible to ensure that the 9-11 experience will never repeat itself. This two-phase initiative between IAFF and OAI strives to do just that. The goal of the partnership, to provide HAZMAT technical level training to Chicago Fire Department personnel, consists of a five-day train-the-trainers course, attended by 28 selected Chicago fire fighters. These trainers will, in turn, conduct technician-level HAZWOPER training for 250-300 individuals during the current program year.

Mark Catlin concluded the session by dividing the participants into four separate groups and asked them to list what successes, obstacles, and unexpected benefits can arise from partnerships. From these lists, the breakout session as a whole defined what they felt were the four key factors for success – quality programs, adequate funding, mutual respect, and champions for the idea/partnership.

#### c. Breakout #3

#### Industry and Trade Associations

Moderator: John Morawetz, Director, Center for Worker Health and Safety, International Chemical Worker's Union

This breakout provided information on the industry and trade association partnerships that have increased the number and quality of courses available for responding to WMD incidents and other emergencies at fixed sites and other public facilities.

This breakout examined the partnerships between industry and the NIEHS awardees that have increased the number and quality of courses available for responding to WMD incidents and other emergencies. Dr. Carol Rice, a Professor from the University of Cincinnati and the Principal Investigator for the NIEHS-funded Midwest Consortium, provided a PowerPoint overview of the work the Midwest Consortium has done to build strong links to industries through training. She pointed out those even seemingly nonhazardous industries like American Dairy Brands still deal with industrial chemicals – in this case, ammonia – as a standard business practice. Lake Shore Community College, part of the Midwest Consortium, provides annual hazardous waste worker refresher training for this firm, along with chemical storage security training. The consortium also trains the Port Huron Hazmat team at a technician level to deal with hazardous materials transportation.

Dr. Rice's PowerPoint included testimonials about the value of training from managers at Neilson and Bainbridge, a Tennessee-based electroplating firm that experienced a fire in one of their production facilities. The consortium training had actually included tabletop scenarios about how they would handle potential loss of acid tanks if there were a fire or other disaster. Consequently, they were prepared. They kept workers who did not need to be involved away from the response and provided outside emergency responders with timely and correct information about the chemicals potentially involved. The result: limited damage and no injuries. The consortium also regularly provides hazardous waste training for U.S. Oil Co, Inc., Ford Motor Company, and Technical Plating and Rubber, Inc.

Don Ritter, a member of the International Chemical Workers Union who works at the Cabot Corporation and the Security Manager from that firm, Matt Zimmerman, discussed the partnership at the firm between labor and management that has been so successful at protecting workers and the community. Mr. Ritter described an incident where the firm experienced a leak of sodium that local volunteer fire fighters responding to the emergency call were about to spray with water, which would have produced a potentially deadly reaction. Workers had been trained sufficiently to prevent the fire fighters from taking this action. The partnership now extends to local emergency responders and the plant does a full evacuation every 6 months and they stage a major event at least yearly.

The breakout session then conducted an exercise called "Industrial Disaster Preparedness" which built on the small group activity approach that has been a core approach of the ICWU training programs. The attendees were broken into groups and asked to discuss four questions and then designate one person to report back to the rest of participants at the end of the session. The four questions and the various responses from the groups are provided below.

#### Question 1: Why was the training partnership started?

Quite a few of the partnership were identified as being formed to protect responders to emergencies at the facilities. The partnerships also came into being to provide more support and information to stakeholders outside the plant. In at least one case, it was a deliberate effort to involve labor in the development of an emergency response plan. More than one partnership formed after an incident occurred, causing a strong desire to prevent further incidents and to establish a procedure for getting to root causes afterwards. These partnerships were seen as natural ways to share expertise and therefore were mutually agreed upon. One participant noted that training under grants like NIEHS naturally leads to lasting partnerships through repeated contacts with key individuals. Being able to customize training enabled more organizations to justify partnering. Finally, the enabled and mobilized workforce that results from meaningful safety and health training makes partnership easier to form.

Question 2: Why do you think this partnership has been successful? What are some of the benefits?

Participants opined that the partnerships were successful because they involved all parties, shared resources, built trust, involved partners with complimentary backgrounds, established a level playing field, shifted the safety culture, allowed examination of root causes of incidents, and permitted nurturing of safety and health issues.

The benefits that came out of that success included more efficiency in operations, improved outreach to the community, better and quicker response capabilities, and better buy-in from all parties.

**Question 3:** What are some of the problems encountered during the development of the partnership?

Some in the discussion group indicated that management's tendency to assign individual blame for problems was counter-productive. Several found that outside help may be needed to resolve conflicts that arise in the partnership. Traditional rolls were also seen as obstruction and new partnership required new ways for labor and management to view their relationship and their combined efforts with outside responders. Jargon was seen as an obstruction, too, and participants agreed that information about worker safety and health needed to be clear. One participant indicated that when problems developed, a fortress mentality often resulted at facilities, which would invariably lead to more difficulties.

**Question 4:** What are some examples of catastrophic events you have planned for (both intentional and unintentional)?

The following list was generated by the participants of events that occurred at their facilities:

Hydrogen fluoride vapor suppression failure Collapse of a building Hazardous materials transportation problem Ammonia release Sodium metal release Security problems Heat stress incidents

#### d. Breakout #4

## State, Local, and Bi-National Partnerships: Public Health and Emergency Response Moderator: Eric Lamar, Principal Investigator, IAFF

This breakout closely examined the Massachusetts approach to preparing communities for a public health emergency as well as the Arizona effort to partner with several Mexican states to train emergency responders. Issues to be considered include: serving large and small communities, reconciling local government operations with regional needs, challenges confronting trainers in a bi-national preparedness program, as well identifying and planning for future challenges.

Emphasis was placed on the Border 2012 goal relating to releases of chemical and biological warfare agents and acts of terrorism along the Mexican Border. They are working in liaison with: "Bi-National Prevention and Emergency Response Plan between Nogales, Sonora and Nogales, Arizona"; "Sonora Proteccion Civil"; "Border 2012 Arizona/Sonora Chemical Emergency Preparedness and Response Task Force"; and "Arizona Governors Office of Homeland Security".

#### Chemical Emergency Preparedness and Emergency Response at the Arizona/Sonora Mexican Border



Themes: Partnerships – State and Local – Bi-National, serving a wide variety of communities.

The main areas of concern are:

- The fixed facilities on the Mexican side of the border (3000) all have hazardous chemicals of different sorts
- Truck and rail traffic with hazardous chemicals which cross the border

The challenges involved in this area are:

- Incorporating modifications related to anti-terrorism efforts into the curriculum
- Identification of risks
- Preparation of joint contingency plans
- Include plans for counter-terrorism in curriculum

Over 400,000,000 people travel to the US via land borders.

Logistical challenges in a bi-national training:

- Bi-lingual transmission of curriculum and emergency responder information flow is one key component to coordination of efforts
- The disparity of the quality of equipment available on each side of the border
- The issue of radio interoperability across the border is a challenge
- The Mexican side of the border is mostly all-volunteer fire fighters
- Implementation, training and availability of PPEs on the Mexican side of the border
- Our training focus is prevention of a catastrophic event on each side of the border, not necessarily to encourage bi-national response teams (although when needed, the teams have responded across the border)

#### New England Consortium All Hazards Training Project

Agents for change as well as deliver training.

The Project has evolved and has expanded the training to include:

- Involving public health workers in training
- Offering the 8-hour emergency response training
- Offering the 24 hour basic health and safety course
- Expanding the training programs to include Introduction to Levels A, B & C equipment, introduction to chemical and biological weapons and introduction to decontamination equipment, training from the DOT manual

The success of the training program has led to requests for additional training. We also work on identifying who needs training.

- The volunteer fire departments serving much of the region
- EMS workers who have medical training, need emergency response training
- Hospital staff need training for Level C hot zones and proper use of PPEs and equipment
- Health department staff
- Police department

Our effort has been focused on hands-on training, familiarizing trainees with equipment, and team building with local, state and private responders. We have trained them on OSHA regulations for emergencies, working while wearing protective suits with respirators and radio communication equipment, identification of emergency situations, and identification of biological hazards, including mass vaccination clinics.

#### **Emergency Management**

All emergencies are local.

- Actions taken by the first arriving agency are key to success
- Public/private training (Kodak, Xerox) where large employees in the private sector tailor their curriculum to mirror that offered to the public sector
- Working with trade unions, trainers, training sites to make training more accessible
- Public sector workers need to know what to do at their sites (i.e., training for fire wardens at office buildings)
- Improve emergency command and control for inter-agency communication (NIMS)
- Curriculum across all agencies adopted, public and private sector included
- Partnering with other agencies to increase awareness of WMD, and give background incident command training
- Share the curriculum
- Involve other agencies

#### VII. Second OSHA Plenary: Worker Protection and Homeland Security

#### Moderator: Chip Hughes, Director, WETP

This plenary was a review of OSHA's newly emerging role in disaster response and homeland security and the actions the agency has taken to prepare for its new challenges.



Ruth McCully, Director, Directorate of Science, Technology and Medicine spoke first. She explained why OSHA developed a National Emergency Management Plan (NEMP). She explained that during the WTC response over 1000 OSHA staff members were deployed to the WTC over 10 months. During this time there were 15,000 shifts worked, 131,000 respirators distributed and more than 6,500 air samples taken. OSHA also fielded specialized expertise teams (e.g. crane team), provided 24/7 safety monitoring and created successful partnerships with FEMA, EPA, Army Corp and Coast Guard. They were also the lead agency for worker health and safety during the Anthrax decontamination.

She explained they learned lessons from these incidents. In order to improve preparedness for the future it was clear that they would need Regional Plans (REMPS) supported by a National Plan (NEMP). The NEMP is the agency's first homeland security directive. It is OSHA's emergency management plan during nationally significant incidents. It is a living document.

Part of the plan includes specialized response teams (SRTs). SRTs are made up of Four Teams: Toxic Chemicals, Biological Agents, Ionizing Radiation, and Structural Collapse. They enhance existing regional WMD capabilities. The teams contain an average of seven subject matter experts and are

# Regional Emergency Management Plans (REMPs)

- Necessary to account for the NIMs mandated ICS based multi-jurisdictional responses
- Scalable, Modular and Supports the ICS structure and therefore the NIMS
- Each Region to Develop its own REMP modeled after Appendix D
- Useable for more than just a Nationally Significant Event

dispersed throughout agency and regions. OSHA is also implementing many training initiatives. More information can be found at: http://www.osha.gov/OshDoc/Directive\_pdf/HSO\_01-00-001.pdf



John Ferris, Special Assistant for Homeland Security then discussed OSHA's involvement in NIMS/NRP. The National Incident Management System (NIMS) establishes the national standard for incident management response structures. It is based on the National Interagency Incident Management System (NIIMS) Incident Command System (ICS). It calls for interoperability of response structure, equipment, communications, qualifications, and certifications. It employs a continuous cycle of planning, training, equipping, exercising, evaluating and taking corrective action. It utilizes safety officers. NIMS requires and oversees the implementation of the ICS system nationwide. It also oversees the allocation of funds to State and Local

Government. It specifically addresses the role of the Safety Officer in multi-agency responses.

The National Integration Center (NIC) coordinates and oversees the (NIMS). The NIC educates the Nation on the NIMS/ICS, promotes interoperability, promotes minimal training requirements & course curricula for EP&R personnel, establishes national standards for incident management exercises and establishes national standards, guides and protocols for qualifications and certifications of responders and incident managers.

This creates an opportunity for OSHA. OSHA supported the ICS in 1910.120 before there was a NIMS or a NIC. The NIC is a grass roots opportunity, similar to the Coast Guard/EPA/OSHA collaboration that took place back in 1989 to create HAZWOPER. It influences the emerging processes to integrate responder/recovery worker safety & health. More information can be found at: http://www.dhs.gov/dhspublic/display?theme=43&content=3421

Following the speakers' presentations, there was a question/comment and answer session.

- **Q:** This national plan should be explicit about Federal OSHA and FEMA and their role with states that have state plans.
- A: 1. In HSPD 5 that issue is addressed it does talk about in what circumstances national intervention is needed.
  - 2. State evaluations showed where states' weaknesses are and when they will need help.
  - 3. The Annex outlines role of locals, states, and national organizations.
- **Q:** As the Bush Administration tries to privatize government, we see DOD etc. being outsourced. Do OSHA standards apply to these private outsourcing companies (since it is not usually involved in the military)?
- A: OSHA does not get involved in uniquely military operations.

#### VIII. EPA Plenary Panel

#### Moderator: Chip Hughes

Chip Hughes from NIEHS was the moderator for the EPA Plenary and began the session by briefly outlining the topics to be presented. Specifically, he said that the panelists would review the role of the National Response Team (NRT), EPA's participation on the team, and the changes anticipated under the National Incident Management System (NIMS).

John Gustafson, Executive Director of the NRT, gave an overview of the NRT and its role in the National Response System (NRS). He first explained that response planning and coordination is accomplished at the federal level through NRT, which is comprised of the Response, Preparedness, and Science and Technology committees. More specifically, the NRT does not respond directly to incidents, rather, it is responsible for three major activities related to managing responses: (1) distributing information; (2) planning for emergencies; and (3) training for emergencies.



Following major incidents, the NRT assesses the effectiveness of the response. The NRT may use information gathered from the assessment to make recommendations for improving the National Contingency Plan and the National Response System (NRS), which is comprised of the NRT, regional response teams, federal on-scene coordinators, and state and local governments. Mr. Gustafson then detailed the NRS response process and the plans supporting it

Mr. Gustafson continued with a discussion of the NRT recommended priorities for 2004. These priorities include: implementation of Homeland Security Initiatives; improvements in worker health and safety protection; information management; the advance of environmental missions; law enforcement; and awareness of NRT structure and roles. He then provided a more detailed description of the worker health and safety priority. This recommendation calls for support of the NRP health and safety annex; continued clarification of OSHA's role in response; improved worker health and safety protection; consideration of next step reports on worker safety and health; and improved protective action decision-making information. Mr. Gustafson concluded his presentation with a description of the NRT's training subcommittee that helps with interagency training coordination and hospital hazmat training. For more information on NRT please visit: www.nrt.org.



The second presenter, Mark Mjonness, Director of the EPA Response Operations Center (OEPPR), highlighted the importance of linking training exercises and national contingency plans (NCP). He first explained that NCPs are regulations developed to ensure that the resources and expertise of the federal government are available immediately for oil or hazardous substance releases that are beyond the capabilities of local and state responders. Mr. Mjonness then emphasized that all emergency response programs should be consistent with one another. OEPPR developed 10 elements/criteria to measure the consistencies

amongst programs, with two of these criteria addressing worker training and safety and health. Another item that the OEPPR recognized was the need for the EPA to branch out to muster agency resources and to be ready for simultaneous disasters. Nine priority areas were established to meet this objective.

To enhance EPA's involvement with worker health and safety, and to become more integrated in the incident command system (ICS), Mr. Mjonness noted recommendations for the EPA to develop a manual with guidance on new threats, to implement critical management teams and on-site coordinators, and to track health and safety training requirements. This would help the EPA to become more of a streamlined, melded player in the ICS. More information can be found at: http://www.epa.gov/ceppo/



Charles Rogoff, co-chair of the NRT Training Committee and Director of DOT Hazardous Materials Emergency Preparedness (HMEP) grant program, spoke about the HMEP grant program. Mr. Rogoff explained that the HMEP grant program is intended to provide financial and technical assistance as well as national direction and guidance to enhance State, Territorial, Tribal, and local hazardous materials emergency planning and training. The HMEP Grant Program distributes fees collected from shippers and carriers of hazardous materials to emergency responders for HAZMAT training and to Local Emergency Planning Committees (LEPCs) for HAZMAT planning. He also noted that the Training and

Curriculum subcommittee of the National Response Team's Preparedness Committee, co-chaired by DOT and FEMA USFA, provides coordination for the HMEP grant program at the Federal level.

Mr. Rogoff discussed the progress the HMEP grant has made over the years. In particular, he emphasized that since the program's inception, approximately \$99 million has been awarded in HMEP grants, and over 1,512,000 responders and others have been trained in part thus far with these funds. The HMEP Curriculum guidelines have been distributed to grantees, LEPCs/State Emergency Response Commissions and local fire departments on a request basis (telephone (301) 447-1009 for a copy). Grantees use these guidelines to qualify courses for the list of courses mandated by Congress. Assistance is being provided to grantees in using the guidelines to qualify their courses.

He concluded with a discussion of the IAFF train-the-trainer course developed with HEMP grant money. For the past twelve years, this TTT program has successfully trained workers in the fire, police, and EMS services. The NRT was an integral component of this training. More information can be found at: http://hazmat.dot.gov/hmep.htm

Rod Turpin, Chief National Health and Safety Advisor of the Environmental Response Team, was the final speaker during the EPA Plenary. Mr. Turpin used a slide show of vivid pictures to guide the audience through his presentation. He discussed the EPA's approach to collaborate with IPA during emergency situations; the EPA's partnership with the Coast Guard to set up a training and response partnership; and the lessons learned from the Missouri dioxin incident where workers learned later on in the clean up process that they could have been using a lower level of personal protective equipment. Mr. Turpin concluded his talk by noting that if training programs are not integrating the www.wetp.org sites into their programs, they are doing something wrong. More information can be found at: http://www.epa.gov/superfund/programs/er/

#### **IX. Friday Breakout Sessions**

#### a. Breakout #5

# Transportation Moderator: – Brenda Cantrell, George Meany Center-National Labor College

The purpose of this group was to help identify key Transportation emergency response resources throughout the WETP community and to give information that will help establish a protocol for making these resources available quickly and efficiently to local, state, and key federal partners.

The group began with candid comments about transportation and emergency response plans. They discussed what resources, as grantees, they would have immediately accessible to help with transportation needs during an emergency. There was an overall consensus that stress management training would be a valuable addition to an emergency support activation plan.

The group went on to discuss the thought stimulators and breakout discussion guidelines. Group answers follow.

#### **Questions:**

I. Should there be a single contact point within a grantee organization that the WETP should contact to activate the response Plan?

Yes, but there should be at least one alternate in case the initial contact is absent.

II. What types of training have been provided within your organization that could be useful in response to a WMD incident in the hospital/public health sector?

There were a variety of combinations amongst the participants. Each type of training was represented by some of the participants. However, some topics were taught only on the awareness level (e.g. lead and asbestos). Additional training topics not listed included first responders, stress management, technicians, EMS, adult education, incident command, pesticides, DOT, and infectious diseases.

III. What training specific to hospitals and public health is appropriate for responses to the following WMD threats? (Use the numbers above, or add additional specific topics).

The group agreed that HAZWOPER, OSHA 10, confined spaces, SSP, and WMD preparedness were the topic training priorities across all four WMD threats. The group also made the distinction that depending on an individual's previous training, these courses can either be developed as awareness or refresher courses.

IV. Do you have instructional staff that would be available to assist in a response either in developing specific incident-targeted training or in on-site training activities?

All participants answered yes to this question.

A. If so, would their temporary reassignment have an impact on your ongoing instructional program?

Some participants said yes as it would impede normal training operations. However, they agreed that other projects that were less of a priority could be put on hold or that the temporary reassignment would not pose a significant problem to their organizations.

B. In what training programs listed in II above is instructional staff most limited? Most extensive?

There were a variety of answers for this question...

Professional staff, such as industrial hygienists, safety experts, and health physicists are employed by some of the grantees to support their programs. What professionals are on staff with your organization?

The groups' answers included certified industrial hygienists, heath physicists, industrial engineers, and health and safety experts. All but one participant responded that these people would be able to respond to an incident.

VI. If the individual grantee has training facilities in the proximity of the response scene, would those facilities be available to aid in the response should such be needed, particularly to support a long-term response action such as the WTC or the anthrax contaminations?

The group was split with half saying yes and half saying no.

VII. Assuming financial support would be required in such an instance, how long would it take the grantee to develop a cost estimate for WETP? Are their barriers to the utilization of such facilities?

The group mentioned that a barrier could be that fire stations are too small to handle a large incident and that it would take about 1-2 days to develop a cost estimate.

VIII. What issues or constraints arise for a grantee when considering whether to participate in a response that WETP should be aware of in preparing the ESAP?

Some participants mentioned that they would not face any constraints while others listed availability of instructors, location, cost, arranging military assistance, using local unions, lag time, and safety of personnel if involved as issues to be addressed.

IX. What would the participants suggest with respect to an approach within WETP for assuring coordination among those grantees who might be engaged in a response action?

The group made the following comments:

- One coordinator should be assigned to represent unions, schools, and agencies
- There should be a financial MOU for reimbursement for major expenses
- There should be a pool of funds available for immediate costs
- Current programs should have automatic extensions
- Participants should be allowed to provide input throughout the development process.
- X. Are their additional training programs that are needed in order to more effectively support a response action in this sector?

The group made the following comments:

- We need to practice what we preach (e.g. cooperation between organizations)
- Plans should include courses for stress management
- Classes should cover first aid, CPR, EMT, and hazmat security
- Awareness training should be mandated
- There should be more worker training to promote recognition.

#### b. Breakout #6

# Hospital and Public Health Moderators – Mitch Rosen, UMDNJ and Mark Catlin, SEIU Education and Support Fund.

The purpose of this group was to help identify key Public Health emergency response resources throughout the WETP community and to give information that will help establish a protocol for making these resources available quickly and efficiently to local, state and key federal partners.

The group discussed what they thought of when they thought of Public Health. They discussed that Public Health is broad. Not only must you include Health Departments within the purview of Public Health but you must also include 'blue collar' trade workers in health care settings. When there is a public health emergency, it is important to think of the safety of workers as well as the safety of patients. Mitch Rosen explained how the UMDNJ received a grant from the CDC to train these public health trade workers. He strongly recommended that local agencies try to tap into this CDC money as well as HRSA money in order to set up these training programs. A good way to go about this is to contact their individual state departments to find out where you can fit into grants that they may already have received.

The group went on to discuss the thought stimulators and breakout discussion guidelines.

#### **Questions:**

I. Should there be a single contact point within a grantee organization that the WETP should contact to activate the response Plan?

Yes, But there should be at least one (better if 2) alternates in case the initial contact is absent.

II. What types of training have been provided within your organization that could be useful in response to a WMD incident in the hospital/public health sector?

#### HAZWOPER

III. What training specific to hospitals and public health is appropriate for responses to the following WMD threats? (Use the numbers above, or add additional specific topics).

(The group noted that it depends on what you are going to do)

The group notes that PPE, DECON, HAZCON may be the top priorities for training.

The group also noted that if you give a type of specific training (HAZMAT for example), to healthcare workers, you must put the training into a healthcare context.

(The group also suggested that it might be worth it to divide the above question into 2 columns, one column for public health, the other for hospital workers (because for example, hospital workers are not dealing with explosives.)

VIII. What issues or constraints arise for a grantee when considering whether to participate in a response that WETP should be aware of in preparing the ESAP?

Individual organization constraints

Liability

Some universities are part of state agencies - so who would deploy, the state or university?

See Appendix D

#### c. Breakout #7 Chemical facilities

I. Should there be a single contact point within a grantee organization that the WETP should contact to activate the response plan?

There definitely needs to be one or more alternatives in case the prime is out of the country.

There must be a mechanism for reaching the individuals.

There is an emergency response team in the PACE union that responds to fatalities and emergencies.

II. What types of training have been provided within your organization that could be useful in response to a WMD incident in the chemical facilities sector?

We should be teaching more on emergency planning. Tom

There should be a list of trained individuals within a plant who can help with an emergency.

There are members who work in pharmaceutical plants.

There is a need for NIEHS grantees to do training of local incident commanders, particularly about radiation. Don't plan on high exposure levels.

III. What issues or constraints arise?

There is legal liability.

A. What is the residual risk?

We need to assess it.

B. Would it be voluntary?

Scott: if it were a staff assignment, there wouldn't be a problem, but if we are reaching out to worker-trainers to do instruction, away from their normal worksite, we would need to look to NIEHS to protect them.

For USAR teams, they have specific language about liability. We need to check the FEMA website for this language.

IV. Coordination among grantees

Need to develop an algorithm for decision-making.

Need to look at existing UCS, NIMS models to see how to coordinate our efforts.

V. Other training programs?

We need to run through pilot programs to see how this training would work.

We need to address chemicals being brought on site as terrorist attacks.

Need to focus more on catastrophic events on sites.

Two issues: do we need to offer other training? How do we get bodies to the sites?

Another issue: how do we evaluate the emergency plans?

Training at chemical plants needs to address the "worst case scenarios" for the facility.

Need to focus on looking at probability. Hal Berkowitz from Louisiana pointed out that he worried at night about a plane hitting the largest chlorine tank, but then focused on the smaller tanks where they worked more often.

VI. Additional matters that the WETP should consider in preparing the draft ESAP

We should be focused on prevention. Need to emphasize inherently safer processes.

#### *d. Breakout* # 8:

#### Construction Trades Moderators – Don Ellenberger, Center to Protect Workers Rights; Gary Gustafson, Laborers-AGC

Skilled construction trades have proven to be absolutely indispensable for responding to disasters caused by terrorist and by nature. This breakout group focused on the resources that the WETP community could provide construction workers at a major disaster. This breakout group, more than the others, represented organization that had direct experience responding to national disasters. Several of the WETP awardees were involved in the rescue and recovery at the World Trade Center and Pentagon, as well as at the anthrax cleanup at the post office and other federal buildings. These responses were impressive, but not closely coordinated. The thrust of this breakout was to identify the full-range of resources available and determine how to apply them more efficiently, quickly, and systematically after future events. The group's discussions were guided by the same thought stimulators that were used by the other groups to allow a consistent inventory of training resources and staff skills. Fourteen participants filled out the "thought stimulator questionnaire." Their answers to the questions follow.

I. Should there be a single contact point within a grantee organization that the WETP should contact to activate the response Plan? Is there an obvious contact person within your organization now and, if so, who?

The group generally felt that there should be a primary contact within the organization, but also a secondary given the possibility that the primary person may not be available. Several individuals felt that there should be more of a phone "tree" or "snowday" approach so that everyone who needs to know would get systematically contacted. Slightly under half indicated that their principal investigator or head technical person should be the first individual contacted. Several did not provide an answer to who should be contacted, which may reflect real uncertainty.

II. What types of training have been provided within your organization that could be useful in response to a WMD incident in the hospital/public health sector?

This table indicates the responses received. The results may have been lower than expected because three of the participants were curriculum developers rather than training providers.

Course	Number providing training	Percentage (N=14)
HAZWOPER (b)-(o)	8	57%
HAZWOPER (p)	7	50%
HAZWOPER (q)	8	57%
OSHA 10	8	57%
Lead	6	42%
Confined space	10	71%
Asbestos	6	42%
HAZCOM	9	64%
SSP	6	42%
Radworker I/II	4	29%
WMD preparedness	8	57%

As expected, the highest percentages were reported in training all three populations of HAZWOPER workers: general site workers, (b)-(o); workers at Treatment, Storage, and Disposal facilities, (p), and emergency responder (q). The lowest responses were received for lead, asbestos, skilled support personnel, and particularly

radiation worker training. It is noteworthy that over half of the participants presently provide some type of WMD preparedness training. When asked to identify other relevant courses, participants mentioned fire fighter/EMT training, DOT HAZMAT training, lockout-tag out, multi-lingual hazardous waste courses, and on-line training.

III. What training specific to the construction sector is appropriate for responses to the following WMD threats? (Use the numbers above, or add additional specific topics).

There was broad range of responses to this question, but all indicated the importance of HAZWOPER training to enable construction workers to safely respond to all possible WMD threats. There also appeared to be general agreement that OSHA-10 and SSP training were important for WMD preparedness. Several wrote that ICS training and PPE were important for all WMD threats. Several also noted crime scene preservation. One individual suggested that there should be two levels of training provided: one for site workers and more in-depth training for construction liaison officers in the ICS system. The specific responses:

#### Chemical agents

There were more courses cited as appropriate for these WMD agents than any other. HAZCOM, logically, was cited often, but so was asbestos and confined space.

#### Biological agents

HAZCOM was cited as important. Several noted that training for biological agents had to focus on specific agents to be effective.

#### Radiological agents

Along with the obvious choice of Radworker I/II, participants also indicated HAZCOM and confined spaces were important, the latter presumably because of the greater risks from physical proximity to radiation sources. Training in radiological work permits (RWPs) and Rad monitoring principles were mentioned, as were DOE and NRC requirements.

#### Explosive/energetic agents

Most participants cited asbestos as important training for responding to these agents, possibly because of the experience at WTC. Several wrote in that training on secondary devices would be critical for responders.

IV. Do you have instructional staff that would be available to assist in a response either in developing specific incident-targeted training or in on-site training activities?

Nearly all participants, except those from curriculum development firms, answered yes to this question.

A. If so, would their temporary reassignment have an impact on your ongoing instructional program?

Of the eleven members of the group who answered this, five indicated it would impact their program, four said it wouldn't, and two weren't sure. One individual commented that their organization had thousands of trainers in the field and would adjust schedules to compensate.

B. In what training programs listed in II above is instructional staff most limited? Most extensive?

Although there appeared to be significant misunderstanding of this question, one generalization that could be made was that radiological training was the greatest limitation and HAZWOPER was the greatest strength. Several respondents indicated that there organizations could handle all of the training indicated.

V. Professional staff, such as industrial hygienist, safety experts, and health physicists are employed by some of the grantees to support their programs. What professionals are on staff with your organization?

There was clearly a wealth of professional support personnel within their organizations, including not just certified industrial hygienists, heath physicists, industrial engineers, and health and safety experts, but also epidemiologists, physicians, and hazmat experts. Eight of the 14 participants indicated that these individuals would be able to respond.

VI. If the individual grantee has training facilities in the proximity of the response scene, would those facilities be available to aid in the response should such be needed, particularly to support a long-term response action such as the WTC or the anthrax contaminations?

Of the ten who answered this question, nine said yes and one said no.

VII. Assuming financial support would be required in such an instance, how long would it take the grantee to develop a cost estimate for WETP? Are their barriers to the utilization of such facilities?

The responses were positive. Most indicated very limited barriers and the ability to produce an estimate within hours or days. The longest was 2 weeks. One respondent noted that on-line course could be delivered at local libraries, schools, and offices, which would greatly facilitate delivery.

VIII. What issues or constraints arise for a grantee when considering whether to participate in a response that WETP should be aware of in preparing the ESAP?

Some constraints raised included staffing, political blessings, background and technical expertise of staff, communication, cooperation to avoid duplication, availability of equipment, access to PPE, geographically dispersed staff and equipment in larger states, coordination of resources by NIEHS, workers compensation, and liability insurance.

IX. What would the participants suggest with respect to an approach within WETP for assuring coordination among those grantees who might be engaged in a response action?

The group made the following comments:

- Focus on communications
- Establish an ICS hierarchy
- Continue working on this ESAP, which is a good start
- Establish a phone tree
- Establish points of contact, horizontal and vertical
- X. Are their additional training programs that are needed in order to more effectively support a response action in this sector?

Several participants mentioned site-specific training, incident command training, disaster site worker training, and evidence collection.

XI. Additional matters that the WETP should consider in preparing the draft ESAP.

The following items were mentioned:

- Central database of trained workers
- On-site training w/Disaster Response Refresher should conform to a response plan
- Think locally, not nationally. All incidents begin and finish locally.
- Need ER awareness training for security guards in certain places that could be terrorist targets like transit centers, industrial plants, and communications centers.

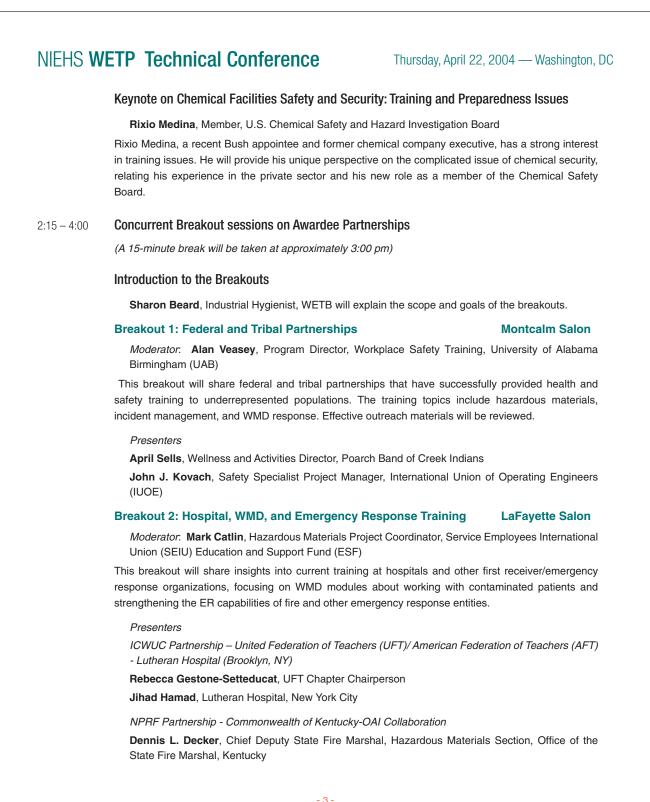
X. Appendices

Appendix A

Loews L'Ent	fant Plaza Hotel • 480 L'Enfant Plaza, SW • Washin	gton, DC 20024 • 202-484-1000 • 1-800-635-5065
	Agenda	L
Trainin	g Partnerships for Prevention,	
	ference to Build Stronger Partnershi	-
	Thursday, April	22, 2004
8:00 - 8:30	Continental breakfast	Foyer outside Ballrooms C&I
	Morning presentations	Ballrooms C&I
8:30 - 8:45	Introductions	
	Joseph "Chip" Hughes, Director, Worker Educ Environmental Health Sciences (NIEHS)	ation and Training Branch, National Institute of
8:45 – 10:30	Department of Homeland Security Plenary	
	60 minutes of presentations followed by a 45-minut	e facilitated discussion
	Moderated by Joseph "Chip" Hughes, Director	r, WETP
		eparedness and Response Division (EPR), FEMA
	Darrell Darnell, Division Director, Local Prog Homeland Security	rams for Domestic Preparedness, Department of
	A.D. Vickery, Deputy Chief for Homeland Secur	ity, Seattle Fire Department
	Chuck Soros, Chief of Special Operations, Fire	Department Safety Officers Assn.
	and Incident Command System will deal with h Preparedness (ODP) views the relationship betw	ponse Plan, National Incident Management System, azmat training and how the Office for Domestic reen homeland security and hazmat training and e on the FIRST Seattle Summit report on integrating rs.
10:30 – 10:45	Break	

NIEHS W	ETP Technical Conference	Thursday, April 22, 2004 — Washington, D
10:45 – 11:15	Keynote on Homeland Security Preparedness	Training: Emerging Policy Issues
	20-minute presentation with 10 minutes of que	stions
	Dr. James Jay Carafano, Senior Fellow, The He	eritage Foundation
	Dr. Carafano is a national authority on the policy issu He will present a policy overview of the national effo will give his own perspective on Homeland Security	rt to train and credential emergency responders. He
11:15 - 12:30	OSHA Plenary: The New Disaster Site Worker	Course
	50 minutes of presentations followed by 25 minutes	of facilitated discussion
	Moderated by Dr. Bruce Lippy, Director, Nation	al Clearinghouse
	Stew Burkhammer, Director, OSHA Office of Co	onstruction Services
	Dr. Henry Payne, Director, OSHA Office of Train	ing and Education (OTI)
	Cathy Cronin, Construction Outreach Program	Coordinator, OSHA OTI
	Doug Feil, Director, Environmental Programs, Kirkwood Community College	
	Pete Stafford, Director, Center to Protect Workers Rights	
	This panel will review the status of the disaster site and its grantees. The course has already undergor and two pilots of the 4-day train-the-trainer course for	he two pilot tests of the 16-hour course for workers
12:30 - 1:30	Lunch	Solariur
	Luncheon presentation	
	David Von Drehle, author of the book: "Triangle	: The Fire That Changed America"
	David Von Drehle is a senior writer on the staff of previously as New York Bureau Chief, political writ renowned Style section. His latest book, "Triangle: T of the best books of 2003 by The New York Times, American Library Association.	er and Assistant Managing Editor in charge of the he Fire That Changed America" was acclaimed one
1:30 - 2:15	Two Keynotes on EPA, Homeland Security, and	I Chemical Industry Security Ballrooms C&
	45 minutes for two presentations and questions	
	Keynote on EPA's efforts in Homeland Security	1
	Marianne Horinko, Assistant Administrator for Response (OSWER)	the EPA Office of Solid Waste and Emergency
	Marianne Horinko was named Acting EPA Administra in that capacity until the recent formal appointment of 11th, Ms. Horinko spent her first few months at EPA in	f Michael Leavitt in that post. Following September

Training Partnerships for Prevention, Protection and Preparedness: A Conference to Build Stronger Partnerships On Disaster Response Training



Training Partnerships for Prevention, Protection and Preparedness: A Conference to Build Stronger Partnerships On Disaster Response Training

## NIEHS WETP Technical Conference Thursday, April 22, 2004 — Washington, DC Tipawan Reed, Executive Director, Office of Applied Innovations (OAI) NPRF/IAFF Partnership - The Chicago Fire Department Training Initiative Chief Eugene D. Ryan, HAZMAT Coordinator, Chicago Fire Department, Special Operations Scott M. Solomon, Director, Hazardous Materials Training Department, International Association of **Fire Fighters** SEIU/ESF Partnership - Partnership with Brookdale University Hospital and Medical Center, Brooklyn, NY Michael Vatch, Emergency Department Administrator, Brookdale University Hospital and Medical Center, Brooklyn, New York. Steve Schrag, Health and Safety Project Coordinator, SEIU 1199NY **Breakout 3: Industry and Trade Associations Caucus Room** Moderator. John Morawetz, Director, Center for Worker Health & Safety, International Chemical Workers Union This breakout will provide information on the industry and trade association partnerships that have increased the number and quality of courses available for responding to WMD incidents and other emergencies at fixed sites and other public facilities. Presenters Charlie Wise, ICWU Local 619 Don Ritter, ICWU, Local 959 Matt Zimmerman, Security Manager, Cabot Corporation Al Valerioti, Master Instructor, IAFF Dr. Carol Rice, Professor, University of Cincinnati Breakout 4: State, Local, and Bi-National Partnerships: Public **Health and Emergency Response Quorum Room** Moderator. Eric Lamar, Principal Investigator, IAFF This breakout will closely examine the Massachusetts approach to preparing communities for a public health emergency, the Arizona effort to partner with several Mexican states to train emergency responders, and the New York State initiatives in emergency management. Issues to be considered include: serving large and small communities, reconciling local government operations with regional needs, challenges confronting trainers in a bi-national preparedness program, as well identifying and planning for future challenges. Presenters Massachusetts Approach Paul Morse, Project Manager, The New England Consortium

**Charlie Kaniecki**, District Health Officer and **Claudia Sarti**, Assistant to District Health Officer/ Zoonotic Specialist, Department of Public Health, Center for Emergency Preparedness, State of Massachusetts

- 4 -

Training Partnerships for Prevention, Protection and Preparedness: A Conference to Build Stronger Partnerships On Disaster Response Training

INIEHS W	ETP Technical Conference	Friday, April 23, 2004 — Washington, DC
	<i>Arizona-Mexican Effort</i> Hal Berkowitz, Manager, Arizona State University Karina Ordonez, Southwest Border Specialist, Ariz Willebaldo Alatriste Candiani, General Director E	zona Governor's Office of Homeland Security
	<i>New York Effort</i> <b>Kevin Neary</b> , Supervisor, State Emergency Manag	jement Office, NY
4:00 - 4:30	Report Back	
	Summary by breakout moderators	
5:30 – 7:30	Reception	Solarium
	In honor of Workers' Memorial Day — April 28 <sup>th</sup>	
	Friday, April 23,	2004
8:00 - 8:30	Continental breakfast	Foyer outside Ballrooms C&D
	Plenaries	Ballrooms C&D
8:30 - 9:20	Second OSHA Plenary: Worker Protection and He	omeland Security
	30 minutes of presentations followed by 20 minutes of	facilitated discussion
	Moderated by Chip Hughes Ruth McCully, Director, Directorate of Science, Te John Ferris, Special Assistant for Homeland Secu	•••
	This plenary will be a review of OSHA's newly emerging and the actions the agency has taken to prepare for its	
9:20 - 10:10	EPA Plenary Panel	
	40 minutes of presentations followed by 15 minutes of	facilitated discussion
	<i>Moderated by</i> <b>Chip Hughes</b> John Gustafson, Executive Director, National Res Rod Turpin, Chief National Health and Safety Advi	
	Charles Rogoff, Co-Chair, NRT Training Comm Emergency Preparedness (HMEP) grant program	nittee and Director, DOT Hazardous Materials
	Mark Mjonness, Director, EPA Response Operation	ons Center , OEPPR
	The plenary panel will review the role of the National F and the changes anticipated under the NIMS.	Response Team, EPA's participation on the team,

A Conference to Build Stronger Partnerships On Disaster Response Training

	ETP Technical Conference	Friday, April 23, 2004 — Washington, DC
10:10 – 10:15	Charge to the Breakout Groups	
	John Moran, National Clearinghouse	
10:15 –10:30	Break	
10:30 – 12:00	Concurrent Breakout Sessions	
	These breakouts will address awardee efforts and activation plan. This plan, which is still under deve resources throughout the WETP community and e available quickly and efficiently to local, state, and key of the National Incident Management System (NIM following breakouts.	elopment, will identify key emergency response stablish a protocol for making these resources federal partners. The plan will meet requirements
	Breakout 5: Transportation	Montcalm Salon
	Breakout 6: Hospital and public health	LaFayette Salon
	Breakout 7: Chemical facilities	Caucus Room
	Breakout 8: Construction trades	Quorum
12:00 – 12:30	Report Back	
	Summary by breakout moderators	
12:30	Closing	
	Chip Hughes	

A Conference to Build Stronger Partnerships On Disaster Response Training

## Appendix B

# NIEHS WETP Conference Participant List

## April 21 - 23, 2004

Last Name	First Name	Affiliation	Phone Number	Email
Aldridge	Patricia	Fluor Hanford/HAMMER	509-373-7972	patricia_k_aldridge@rl.gov
Alerding	Linda	Midwest Consortium	513-558-0528	alerdilr@ucmail.uc.edu
August	James	AFSCME	202 429-1233	jaugust@afscme.org
Baker	Michael	MDB/NC	202-331-0060	mbaker@michaeldbaker.com
Bakula	Melissa	International Brotherhood of Teamsters	202-624-6963	mbakula@teamster.org
Beard	Sharon	WETP/NIEHS	919-541-0303	beard1@niehs.nih.gov
Beaudet-Sarti	Claudia	University of Mass/Lowell Partner,	413 586 7525	Claudia.Sarti@state.ma.us
		Mass DPH, Western Region 1		
Berkowitz	Hal	Arizona State University	480-727-1323	hal.berkowitz@asu.edu
Berntsen	Pat	Kirkwood Community College	319-398-5678	pbernts@kirkwood.edu
Bingham	Eula	Midwest Consortium	513-558-5728	eula.bingham@uc.edu
Bishop	George	STAT Marketing, Inc	703 934-1223	GBishop128@aol.com
Blackwood	Karen	The University of Alabama at Birmingham	205-934-8242	kblackwd@uab.edu
Blair	Walter	AFSCME	202-429-5078	wblair@afscme.org
Borwegen	Bill	SEIU Education and Support Fund	202-898-3385	BorwegeB@seiu.org
Bourne	Marko	FEMA-Department of Homeland Security	202-646-3150	marko.bourne@dhs.gov
Bray	Eric	International Chemical Workers Union Council	330-867-2444	kschmidt@icwuc.org
Bridgewater	Albert	Knowledge Equity Institute	703-850-4852	albert@albertbridgewater.com
Brown	Marianne	UCLA Labor Occupational Safety and Health	310-794-5964	mpbrown@ucla.edu
		(LOSH) Program		1 0
Burgess	Paula	ATSDR	770-488-3345	PBurgess@cdc.gov
Burgie	Andrew	Hunter College	212-481-7652	aburgie@hunter.cuny.edu
Burkhammer	Stew	OSHA Office of Construction Services	202-693-2020	stew.burkhammer@osha.gov
Candiani	Willebaldo	Arizona State University	480-727-1323	hal.berkowitz@asu.edu
Cantrell	Brenda	George Meany Center-National Labor College	301-431-5435	bcantrell@georgemeany.org
Carafano	James	Heritage Foundation	202-331-7990	carafano@csbaonline.org
Carey	Pat	U.S. Environmental Protection Agency	703-603-8772	carey.pat@epa.gov
Catlin	Mark	SEIU Education and Support Fund	202-898-3290	catlinm@seiu.org
Cronin	Cathy	OSHA Training Institute	847-759-7725	Cronin.Cathleen@dol.gov
Daltuva	Judith	University of Michigan	734-936-0756	jdal@umich.edu
Darnell	Darrell	Local Programs for Domestic Preparedness, DHS	202-307-6860	darrell.darnell@dhs.gov
Davis	Wendell	International Association of Fire Fighters	202-737-8484	wdavis@iaff.org
Dawkins	Michelle	Clark Atlanta University - Environmental	404-880-6914	mdawkins@cau.edu
		Justice Resource Ctr.		
Decker	Stephen	International Association of Fire Fighters	202-737-8484	sdecker@iaff.org
Decker	Dennis	OAI, Inc.	502 573-0365	dennis.decker@mail.state.ky.us
Dennis	Scott	International Association of Fire Fighters	202-737-8485	sdennis@iaff.org
Elisburg	Donald	NIEHS Clearinghouse	305-361-1298	delisbur@infionline.net
Ellenberger	Donald	Center to Protect Workers Rights (CPWR)	301-578-8500	dellenberger@cpwr.com
Evans	Kiameesha	NYC Carpenters School	973-286-2071	babydoc96@aol.com
Feil	Doug	Kirkwood Community College	319-398-5678	dfeil@kirkwood.edu
Ferris	John	OSHA Special Assistant for Homeland Security		John.Ferris@osha.gov
Galler	Jerry	STAT Marketing, Inc	703 934-1223	jerry@acmt.net
Gestone-Setteducat	Rebecca	United Federation of Teachers		
Gifford	Kristin	International Association of Fire Fighters	202-737-8484	Kgifford@iaff.org
Gill	Mike	PACE International Union	615-831-6775	mgillpaceunion@adelphia.net
Glassic	Mike	Y-Stress	570-894-2371	mglassic@y-stress.com
Gorka	Noreen	Y-Stress	570-894-2371	ngorka@y-stress.com
Gotsch	Audrey	UMDNJ-School of Public Health	732-445-0220	perc@eohsi.rutgers.edu

	. 1			$\sim$ 10
Graham	John Mark	NYC Carpenters School	212-727-2224	smcnamara@nyccbf.org
Graham	Mark Louise	AFSCME International Chemical Workers Union Council	202-429-5084	mgraham@afscme.org
Gregoire	Larry	MDB/NC	330-867-2444	kschmidt@icwuc.org
Gross	Rachel		202-331-0060	rgross@michaeldbaker.com
Gustafson	Gary	Laborers-AGC	860-974-0800	ggustafson@laborers-agc.org
Gustafson	John	National Response Team - EPA	202-874-4722	Gustafson.John@epamail.epa.gov
Hamad	Jihad	Lutheran Hospital		
Hedrick	Paul	Service Employees International Union	202-842-9883	HEDRICKP@seiu.ORG
Held	Thomas	MetaMedia Training International, Inc.	301-515-6300	theld@metamediausa.com
Herleikson	Cynthia	Laborers-AGC Education & Training Fund	860-974-0800	cherleikson@laborers-agc.o
Horinko	Marianne	EPA OSWER		
Hughes	Chip	NIEHS	919-541-0217	hughes3@niehs.nih.gov
Johnson	Faye	SEIU Education and Support Fund	202 898-3375	johnsonf@seiu.org
Juette	John	Fluor Hanford/HAMMER		jljuette@charter.net
Kaniecki	Charles	University of Mass/Lowell Partner, Mass DPH, Western Region 1	800-445-1255	Charlie.Kaniecki@state.ma.us
Kapelner	Joshua	Laborers-AGC Education & Training Fund	860-974-0800	jkapelner@laborers-agc.org
Kilgo	Everett	NYC Carpenters School	973-286-2071	zebrakeys@msn.com
Killinger	Donald	NYC Carpenters School	212-727-2224	dkillinger@nyccbf.org
King	Judith	The University of Alabama at Birmingham	205-934-8752	judiking@uab.edu
Kovach	John	International Union of Operating Engineers	304-253-8674	jkovach@iuoeiettc.org
Lamar	Eric	IAFF	202-737-8484	elamar@iaff.org
Lane	Jim	SEIU Education and Support Fund /	916-321-2325	jlane@seiu250.org
		Shirley Ware Educatrion Center		
Larson	Marilyn	FOF Communications	202-667-6048	fof@fofcom.com
LeConche	John	Laborers-AGC Education & Training Fund	860-974-0800	jleconche@laborers-agc.org
Leazer	Nancy	OAI, Inc.	816-513-9630	Nancy_Leazer@kcmo.org
Lippy	Bruce	MDB/NC	202-331-0060	blippy@michaeldbaker.com
Lopez-Cardona	Emma	DOE		
Lundblad	Frank	US Postal Service	202-268-3692	flundbla@email.usps.gov
MacKay	Robert	University of Washington	206-732-0318	smackay@u.washington.edu
, Maiello	Richard	703-920-7070		rmaiello@dandp.com
Marco	Amanda	OAI, inc	312/528-3512	amarco@oaiinc.org
Martin	Matthew	Toxicology Research Center of SUNY	716 829-2125	mm35@buffalo.edu
Mason	Carolyn	NIEHS WETP	919-541-0303	mason6@niehs.nih.gov
Matthews	John	UCLA Labor Occupational Safety and	310-794-5964	mathewsj@ucla.edu
		Health (LOSH) Program		
McAllister	Dianna	UMass/Lowell, The New England Consortium	978-934-3197	
McCarthy	Claudine	National Association of County & City	202-783-5550	cmccarthy@naccho.org
,		Health Officials		
McCully	Ruth	OSHA Directorate of Science and Technology	202-693-2300	McCully.ruth@dol.gov
McNamara	Suzanne	NYC Carpenters School	212-727-2224	smcnamara@nyccbf.org
McQuiston	Tom	PACE International Union	615-831-6775	tom.mcquiston@earthlink.net
Medina	Rixio	Chemical Safety and Hazard Investigation Board	202-261-7680	rixio.medina@csb.gov
Mirer	Franklin	United Auto Workers	313-926-5563	fmirer@uaw.net
Mitchell	Chuck	University of Washington	206-732-0318	cmitchell21@qwest.net
Mizula	Bernard	The New England Consortium	918-934-4316	Bernard_Mizula@uml.edu
Mjoness	Mark	Response Operations Center, EPA Office of Emergency Prevention, Preparedness, and Response		Mjoness.Mark@epamail.epa.gov
Mock	Amy	AFSCME	614-794-9642	akmock@aol.com
Moguel	Wanda	National Puerto Rican Forum (NPRF)	646-792-0434	Wandam@nprf.org
Morawetz	John	ICWU	513-621-8882	JMorawetz@ICWUC.org
Morse	Paul	UMass/Lowell, The New England Consortium	978-934-4313	Paul_Morse@uml.edu
Myers	David	NYC CARPENTERS SCH	212-727-2224	dmyers@nyccbf.org
Nash	James	Occupational Hazards	202-296-7041	
Neary	Kevin	State Emergency Management Office, NY		kevin.neary@semo.state.ny.us
Nelson	Thomas	International Brotherhood of Teamsters	202-624-6963	tnelson@teamster.org
				U 0

Odell	Kimberly	International Union of Operating Engineers	304-253-8674	kodell@iuoeiettc.org
Ordonez	Karina	Arizona State University	480-727-1323	hal.berkowitz@asu.edu
Outwater	Ted	WETP/NIEHS	919-541-0303	outwater@niehs.nih.gov
Padro-Soler	Gladys	National Puerto Rican Forum (NPRF)	646-792-0434	Gladysps@nprf.org
Paulson	Glenn	UMDNJ-School of Public Health	732-235-9773	paulsogl@umdnj.edu
Payne	Hank	OSHA Training Institute		henry.payne@osha.gov
Penn	Paul	EnMagine	530-622-5964	Paul@enmagine.com
Polis	Maria	MDB/NC	202-331-0060	mpolis@michaeldbaker.com
Potter	Herman	PACE International Union	615-831-6775	hpotter@isdn.net
Potts	Jeff	The Catholic University of America	202-319-5865	potts@cua.edu
Pressley	Shelia	OAI, Inc.	312-528-3528	spressley@oaiinc.org
Ramirios	Esther	California/Arizona Consortium	310-794-5975	ssomervi@ucla.edu
Rathje	Dean	New Leaf Interactive Media, Inc.	319-848-7670	newleafmedia@southslope.net
Reed	Tipawan	OAI, Inc.	312-582-3504	treed@oaiinc.org
Renner	Paul	The Labor Institute/PACE	917-606-0511	Paullabor@Laborinstitute.org
Rice	Carol	Midwest Consortium	513-558-1751	alerdil@uc.edu
Ritter	Donald	ICWUC Safety and Health Center	610-367-6552	donbonrit@aol.com
Rosen	Mitchel	UMDNJ	732-235-9452	mrosen@umdnj.edu
Rogoff	Charles	NRT Training Committee, DOT Research and		Charles.Rogoff@RSPA.dot.gov
		Special Programs Administration (RSPA)		
Rosen	Mitchel	UMDNJ	732-235-9452	mrosen@umdnj.edu
Rosenblum	Ian	U.S. Department of the Interior	202-208-5795	Ian_M_Rosenblum@nbc.gov
Sandborn	Wayne	UMass/Lowell, The New England Consortium	978-934-4313	Wayne_Sanborn@uml.edu
Sandifer	Joyce	Xavier University/Deep South Center for	504-520-5230	jsandife@xula.edu
		Environmental Justice		
Schrag	Steve	SEIU Education and Support Fund/Local 1199NY	212-603-1171	schrags@worldnet.att.net
Schutter	Victoria	Kirkwood Community College	319-398-5678	vschute@kirkwood.edu
Sells	April	Poarch Band of Creek Indians	251-368-9136	aprilsells@yahoo
Slatin	Craig	University of Massachusetts Lowell -	978-934-3291	craig_slatin@uml.edu
		The New England Consortium		
Snyder	Ron	Kirkwood Community College	319-398-5678	rsnyder@kirkwood.edu
Solomon	Scott	International Association of Fire Fighters	202-737-8484	ssolomon@iaff.org
Somerville	Shelia	California-Arizona Consortium	310-794-5975	ssomervi@ucla.edu
Soros	Charles	Fire Department Safety Officers Association	206-784-9965	r.soros@comcast.com
Sprinker	Michael	ICWU	330-867-2448	msprinker@icwuc.org
Stafford	Pete	CPWR	301-578-8500	pstafford@cpwr.com
Stephens	Doug	PACE International Union	615-831-6775	dstephend@isdn.net
Sutton	Lisa	Clark Atlanta University -	404-880-6608	lsutton@cau.edu
~	- 1	Environmental Justice Resource Ctr.		
Syracuse	Joseph	Toxicology Research Center of SUNY	716 829-2125	japs@buffalo.edu
Tanasichuk	Kristina	American Public Works Association	202-408-9541	ktanasichuk@apwa.net
Tarbrake	Mary	The Center to Protect Workers Rights (CPWR)	301-578-8500	mtarbrake@cpwr.com
Taylor	Andrea	Environmental and Occupational Health Consultant	410-356-6850	akiddtay@aol.com
Thompson	Patricia	WETP/NIEHS	919-541-0303	thompso2@niehs.nih.gov
Tibbets	Mark	American Public Works Association	202-408-9541	mtibbetts@apwa.net
Trahan	Chris	The Center to Protect Workers Rights (CPWR)	301-578-8500	ctrahan@cpwr.com
Truong	Vithya	National Puerto Rican Forum (NPRF)	646-792-0434	Vithyat@nprf.org
Turner	Ebony	Xavier University/Deep South Center for Environmental Justice	504-304-3320	turner1596@aol.com
Turpin	Rod	EPA	732-321-6741	turpin.rod@epa.gov
Valerioti	Al	International Association of Fire Fighters	203-597-3453	al@specialty-training.cnchost.com
Vandervert	Paul	Fluor Hanford/HAMMER	509-373-6068	paul_j_vandervert@rl.gov
Vatch	Michael	Brookdale University Hospital and Medical Center	718-290-6838	mvatch@brookdale.edu
Vaughn	Kizetta	The Center to Protect Workers Rights (CPWR)	301-578-8500	kv3460@aol.com
Veasey	Allen	The University of Alabama at Birmingham	205-975-8617	aveasey@uab.edu
Vickery	A.D.	Seattle Fire Department		alan.vickery@seattle.gov
Webster	Shelia	University of Tennessee	865-974-1985	swebster@utk.edu

Wehby	Tim	PACE International Union	615-831-6775	twehby@isdn.net
Winchel	Rodney	Texas Engineering Extension Service	979-458-6955	
			Rodney.Wind	chel@teexmail.tamu.edu
Wise	Charles	Cabot Supermetals	610-369-1500	charles_wise@cabot-corp.com
Wolford	Rod	FOF Communications	202-667-6048	fof@fofcom.com
Wright	Beverly	Xavier University/Deep South Center for	504-304-3324	dscej@aol.com
		Environmental Justice		
Yoder	Wayne	U.S. Fire Administration, National Fire Programs	301-447-1090	wayne.yoder@dhs.gov
Zimmerman	Matthew	Cabot Supermetals	610-369-1500	
			matt_zimme	rman@cabot-corp.com

Appendix C

The standard application form HRSA 6025-1, HRSA Competing Training Grant Application, General Instructions and supplement for these grant programs have been approved by the Office of Management and Budget under the Paperwork Reduction Act. The OMB Clearance Number is 0915-0060.

#### APPENDIX AND LETTERS OF SUPPORT

All pages in the appendices are part of the application and must conform to the page limit requirements as described in the General Instructions. **The application may not exceed 100 pages total.** 

# **RESOURCE MATERIALS**

## CDC Public Health Preparedness and Response for Bioterrorism Program and HRSA Bioterrorism Hospital Preparedness Program Awardees by State

State	Bioterrorism Coordinator	<b>BT Hospital Preparedness Coordinator</b>
Alabama	Ray Sherer	Virginia Johns
	Director of Operations	Bioterrorism Hospital Preparedness
	Center for Emergency Preparedness	Coordinator
	Alabama Department of Public Health	Center for Emergency Preparedness
	P.O. Box 303017	Alabama Department of Public Health
	Montgomery, AL 36130-3017	P.O. Box 303017
	Phone: (334) 206-3394	Montgomery, AL 36130-3017
	Email: <u>rsherer@adph.state.al.us</u>	Phone: (334) 206-3394
		Email: vjohns@adph.state.al.us
Alaska	Deborah Erickson	Lisa Harlamert
	Deputy Director	BT Coordinator
	Alaska Department of Health and Social Services	Alaska Department of Health and Social
	P.O. Box 110610	Services
	Juneau, AK 99811	P.O. Box 110610
	Phone: (907) 465-8615	Juneau, AK 99811
	Email: deb_erickson@health.state.ak.us	Phone: (907) 465-8425
		Email: <u>lisa_harlamert@health.state.ak.us</u>
Arizona	David Engelthalter, MS	Jane L. Wixted, MSN, MHSA, ANP
	Office Chief	Hospital Preparedness Coordinator
	Bioterrorism and Epidemic Preparedness and	Office of the Assistant Director
	Response	Arizona Department of Health Services
	Arizona Department of Health Services	Division of Public Health Services
	Division of Public Health Services	1740 W. Adams Street, Room 201
	3815 N. Black Canyon Hwy.	Phoenix, AZ 85007

	Phoenix, AZ 85015	Phone: (602) 364-2471
	Phone: (602) 230-5890	Email: jwixted@hs.state.az.us
	Email: dengelt@hs.state.az.us	
Arkansas	Donnie Smith, MED	Bruce Thomasson
	Bioterrorism Preparedness Team Leader	Hospital Bioterrorism Coordinator
	Arkansas Department of Health	Arkansas Department of Health
	4815 West Markham, Slot 41	4815 West Markham, Slot 41
	Little Rock, AR 72205	Little Rock, AR 72205
	Phone: (501) 551-2157	Phone: (501) 280-4827
	Email: donsmith@HealthyArkansas.com	Email:
		bthomasson@HealthyArkansas.com
California	Patricia Felten	Cheryl Starling
Cullion III.	Acting Assistant Deputy Director, Emergency	Manager, Hospital Preparedness BT
	Preparedness	Project
	California Department of Health Services	California Department of Health Services
	Project Coordinator for the CDC BT Program	Emergency Medical Services Authority
	Emergency Preparedness Office,	1930 9th Street
	714 P Street, Room 1492	Sacramento, CA 95814
	Sacramento, CA 95814	Phone: (916) 322-4336 X463
	Phone: (916) 445-3489	Email: Cheryl.Starling@emsa.ca.gov
	Email: <u>PFelten@dhs.ca.gov</u>	Email: <u>Cheryi.Staring@emsa.ea.gov</u>
Colorado	Mark D. Estock, MPH	Robin K. Koons, PhD
Color ado	Epidemic Response Coordinator	Director, Hospital Preparedness Program
	Colorado Department of Public Health and	Colorado Department of Public Health and
	Environment	Environment
	4300 Cherry Creek Drive South	4300 Cherry Creek Drive South
	Denver, CO 80246-1530	Denver, CO 80246-1530
	Phone: (303)-692-2039	Phone: (303) 692-2154
	Email:mark.estock@state.co.us	Email: robin.koons@state.co.us
Connecticut	James Hadler, MD	Warren Wollschlager
Connecticut	State Epidemiologist	Chief of Staff
	Connecticut Department of Health	Connecticut Department of Health
	410 Capitol Avenue	410 Capitol Avenue
	P. O. Box 340308, MS#13COM	P. O. Box 340308, MS#13COM
	Hartford, CT 06134	Hartford, CT 06134
	Phone: (860) 509-7101	Phone: (860) 509-7101
	Email: james.hadler@po.state.ct.us	Email: warren.wollschlager@po.state.ct.us
D.C.	Michael S. Richardson MD FACP	Major General Donna Barbisch
D.C.	Senior Deputy Director, Medical Affairs	BT Hospital Preparedness Coordinator
	DC Department of Health	DC Department of Health
	825 North Capitol Street NE Room 2115	825 North Capitol Street NE Room 2115
	Washington, DC 20003	Washington, DC 20003
	Phone: (202) 442-9035	Phone: (202) 442-9035
D I	Email: michael.richardson@dc.gov	Email: <u>dbarbisch@dchealth.com</u>
Delaware	Robert W. Ross, BS, NREMT-P	Robert W. Ross, BS, NREMT-P
	Training Administrator/Emergency Coordinator	Training Administrator/Emergency
	Delaware Department of Health and Social Services	Coordinator
	Division of Public Health	Delaware Department of Health and Socia

	Office of Emergency Medical Services	Services
	Dover, Delaware 19901	Division of Public Health
	Phone: (302) 739-4710	Office of Emergency Medical Services
	Email: <u>rross@state.de.us</u>	Dover, Delaware 19901
		Phone: (302) 739-4710
		Email: <u>rross@state.de.us</u>
Florida	Mark Green	Reid Jaffe
	Bioterrorism Coordinator	Public Health Preparedness Coordinator
	Office of Public Health Preparedness	Office of Public Health Preparedness
	Florida Department of Health	Florida Department of Health
	4052 Bald Cypress Way Bin A23	4052 Bald Cypress Way Bin A23
	Tallahassee, FL 32399-1748	Tallahassee, FL 32399-1748
	Phone: (850) 245-4444 x 3217	Phone: (850) 245-4444 x 3393
	Email: Mark_green@doh.state.fl.us	Email: Reid Jaffe@doh.state.fl.us
Georgia	Kathleen E. Toomey, MD, MPH	David Bean, EMT-P
<b>B</b>	Division Director, Division of Public Health	Director, State Office of Emergency
	Georgia Department of Human Resources	Medical Services
	2 Peachtree Street - 15th Fl.	Division of Public Health
	Atlanta, GA 30303	Georgia Department of Human Resource
	Phone: (404) 657-2700	2600 Skyland Drive - Lower Level
	Email: ket1@dhr.state.ga.us	Atlanta, GA 30319
	Eman: Keriajan state.ga.us	Phone: (404) 679-0547
		Email: <u>rdbean@dhr.state.ga.us</u>
Hawaii	Paul V. Effler, M.D., M.P.H.	Donna Maiava, RN
паwап	Executive Director for Bioterrorism	Emergency Medical Services System
	Hawaii Department of Health	Program Manager
	Communicable Disease Division	Hawaii Department of Health
	1250 Punchowl Street, Room 117	3627 Kilauea Avenue, Rm 102
	Honolulu, Hi 96813	Honolulu, HI 96816-2317
	Phone: (808) 586-4580	Phone: (808) 733-9210
	Email: pveffler@mail.health.state.hi.us	Email:
		dmmaiava@camhmis.health.state.hi.us
Idaho	Jane S. Smith, RN	Jane S. Smith, RN
	Executive Director	Executive Director
	Public Health Preparedness Program	Public Health Preparedness Program
	Idaho Department of Health and Welfare	Idaho Department of Health and Welfare
	450 West State Street, P.O. Box 83720-0036	450 West State Street, P.O. Box 83720-
	Boise, Idaho 83720	0036
	Phone: (208) 334-5932	Boise, Idaho 83720
	Email: smithj2@idhw.state.id.us	Phone: (208) 334-5932
		Email: smithj2@idhw.state.id.us
Illinois	Don Kauerauf, Emergency Officer	Don Kauerauf, Emergency Officer
	Illinois Department of Public Health	Illinois Department of Public Health
	525 West Jefferson - 2nd Floor	525 West Jefferson - 2nd Floor
	Springfield, IL 62761	Springfield, IL 62761
	Phone: (217) 782-3984	Phone: (217) 782-3984
	Email: <u>dkauerau@idph.state.il.us</u>	Email: <u>dkauerau@idph.state.il.us</u>
	Roland Gamache, PhD, MBA	John Braeckel

	Bioterrorism Coordinator	BT Hospital Preparedness Coordinator
	Indiana Department of Health	Indiana Department of Health
	Two North Meridian	Two North Meridian
	Indianapolis, IN 46204-3006	Indianapolis, IN 46204-3006
	Phone: (317) 233-7664	Phone: (317) 233-7365
	Email: rgamache@isdh.state.in.us	Email: jbraecke@isdh.state.in.us
Iowa	Mary Rexroat, RN, BS	John Carter, RN, EMT-P
	Public Health BT Coordinator and NPS	BT Hospital Preparedness Coordinator
	Coordinator	Iowa Department of Public Health
	Iowa Department of Public Health	321 E. 12th St., Lucas Bldg, 6th Floor
	321 E. 12th St., Lucas Bldg 6th floor	Des Moines Iowa 50319-0075
	Des Moines, Iowa 50319-0075	Phone: (515) 242-5096
	Phone: (515) 281-5046	Email: jcarter@idph.state.ia.us
	Email: mrexroat@idph.state.ia.us	
Kansas	Ms. Mindee Reece	Mr. Richard Morrissey
	Bioterrorism Program Director	Director, Office of Local and Rural Health
	Kansas Department of Health and Environment	Kansas Department of Health and
	Division of Health	Environment
	1000 SW Jackson, Suite 210	Division of Health
	Topeka, KS 66612-1274	1000 SW Jackson, Suite 340
	Phone: (785) 296-0201	Topeka, KS 66612-1365
	Email: mreece@kdhe.state.ks.us	Phone: (785) 296-1200
		Email: morriss@kdhe.state.ks.us
Kentucky	William D. Hacker, MD	William D. Hacker, MD
•	Physician Consultant	Physician Consultant
	Kentucky Department for Public Health	Kentucky Department for Public Health
	Division of Epidemiology	Division of Epidemiology
	275 East Main Street	275 East Main Street
	Frankfort, Kentucky 40621	Frankfort, Kentucky 40621
	Phone: (502) 564-4830 ext. 3749	Phone: (502) 564-4830 ext. 3749
	Email: williamd.hacker@mail.state.ky.us	Email: williamd.hacker@mail.state.ky.us
Louisiana	Brian G. Blalock, MPH	Rosanne Prats, MHA
	Executive Director, Public Health	Director, Emergency Preparedness
	BT Preparedness and Emergency Response	Louisiana Department of Health and
	Louisiana Department of Health and Hospitals	Hospitals
		1201 Capitol Access Road, Bin 2
	Office of Public Health	Baton Rouge, LA 70821
	1201 Capitol Access Road, Bin 4	Phone: (225) 342-3417
	Baton Rouge, LA 70821	Email: rprats@dhh.state.la.us
	Phone: (225) 342-6534 ext. 3501	
	Email: bblalock@dhh.state.la.us	
Maine	Paul Kuehnert, RN, MPH	Paul Kuehnert, RN, MPH
	Director, Division of Disease Control	Director, Division of Disease Control
	Interim Director of Public Health Preparedness	Interim Director of Public Health
	Maine Bureau of Health	Preparedness
	Key Plaza 9th Floor, 11 State House Station	Maine Bureau of Health
	Augusta, ME 04333-0011	Key Plaza 9th Floor, 11 State House
	110guous, 1112 0 1000 0011	rie, riaza sur ricci, ri State ricuse

	Email: paul.kuehnert@state.me.us	Augusta, ME 04333-0011
	Eman. <u>paar.kaemier(a/state.me.as</u>	Phone: (207) 287-5179
		Email: <u>paul.kuehnert@state.me.us</u>
Maryland	Julie Casani, MD, MPH	Julie Casani, MD, MPH
iviai yland	Medical Coordinator, Emergency Preparedness and	Medical Coordinator, Emergency
	Response	Preparedness and Response
	Maryland Department of Health and Mental Hygiene	Maryland Department of Health and Menta
	Room 321 B DHMH	Hygiene
	201 West Preston	Room 321 B DHMH
	Baltimore, MD 21201	201 West Preston
	Phone: (410) 767-6682	Baltimore, MD 21201
	Email: jcasani@dhmh.state.md.us	Phone: (410) 767-6682
		Email: jcasani@dhmh.state.md.us
Massachuse	Alfred DeMaria, MD	Nancy Ridley, MS
tts	Assistant Commissioner	Assistant Commissioner
•••	Bureau of Communicable Disease Control	Department of Public Health
	State Laboratory Institute	Bureau of Health Quality Management
	305 South Street	250 Washington Street, 2 <sup>nd</sup> Floor
	Jamaica Plain, MA 02130	Boston, MA 02108
	Phone: (617) 983-6800	Phone: (617) 624-5280
	Email: alfred.demaria@state.ma.us	Email: nancy.ridley@state.ma.us
Michigan	V. Gail Maurer, RN, BSN	Linda Scott, RN, BSN, CIC
8	Office of Public Health Preparedness	Office of Public Health Preparedness
	Michigan Department of Community Health	Michigan Department of Community
	3423 N. Martin Luther King, Jr. Blvd, P.O. Box	Health
	30195	3423 N. Martin Luther King, Jr. Blvd
	Lansing, MI 48909	P.O. Box 30195
	Phone: (517) 335-8150	Lansing, MI 48909
	Email: maurerg@michigan.gov	Phone: (517) 335-8150
		Email: scottlin@michigan.gov
Minnesota	Robert Einweck	Pat Tommet, RN, PhD, CNP
	Director, Office of Emergency Preparedness	Hospital BT Preparedness Coordinator
	Minnesota Department of Health	Office of Emergency Preparedness
	Golden Rule Building	Minnesota Department of Health
	85 East 7th Place, P.O. Box 64882	Golden Rule Building
	Saint Paul, MN 55164-0882	85 East 7th Place, P.O. Box 64882
	Phone: (651) 281-9963	Saint Paul, MN 55164-0882
	Email: robert.einweck@health.state.mn.us	Phone: (651) 215-8830
		Fax: (651) 215-8895
		Email: pat.tommet@health.state.mn.us
Mississippi	Pam Nutt, RN, BSN	Joyce Pearson, RN, MSN
	Bioterrorism Coordinator	Hospital BT Coordinator
	Mississippi Department of Health	Mississippi Hospital Association
	P.O. Box 1700, 570 East Woodrow Wilson	P.O. Box 16444, 6425 Lakeover Drive
	Jackson, MS 39215	Jackson, MS 39236
	Phone: (601) 576-7725	Phone: (601) 368-3228
	Email: pnutt@msdh.state.ms.us	Email: jpearson@mhanet.org
Missouri	Pamela Rice Walker, MPA	Pamela Rice Walker, MPA

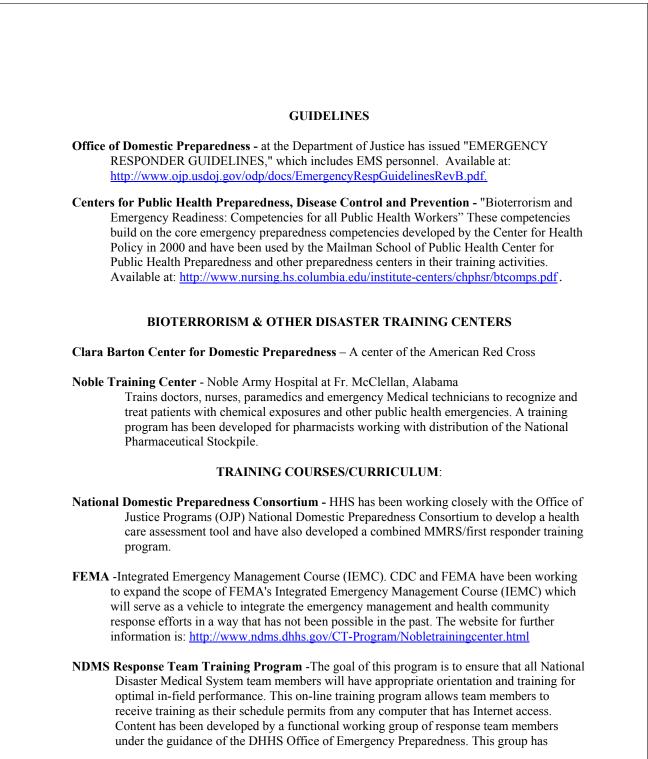
	Director, Center for Emergency Response and	Director, Center for Emergency Response
	Terrorism	and Terrorism
	Missouri Department of Health and Senior Services	Missouri Department of Health and Senior
	912 Wildwood	Services
	Jefferson City, MO 65109	912 Wildwood
	Phone: (573) 526-4768	Jefferson City, MO 65109
	Email: walkep@dhss.state.mo.us	Phone: (573) 526-4768
		Email: walkep@dhss.state.mo.us
Montana	Lorrie Leighton-Boster, MS, RN, NREMT	Lorrie Leighton-Boster, MS, RN, NREMT
	Public Health Disaster Coordinator	Public Health Disaster Coordinator
	Montana Department of Public Health & Human	Montana Department of Public Health &
	Services	Human Services
	1400 Broadway, Room C-216	1400 Broadway, Room C-216
	Helena, MT 59620	Helena, MT 59620
	Phone: (406) 444-1305	Phone: (406) 444-1305
	Email: lleighton-boster@state.mt.us	Email: <u>lleighton-boster@state.mt.us</u>
Nebraska	Joann Schaefer, MD	John Roberts
	Deputy Chief Medical Officer	BT Hospital Preparedness Coordinator
	Nebraska Department of Health and Human	Midwest Health Consultants
	Services	6757 Ridge Road
	301 Centennial Mall South, P.O. Box 95007	Lincoln, NE 68512
	Lincoln, NE 68509-5007	Phone: (402) 421-2356
	Phone: (402) 471-7762 OR (402) 471-8566	Email: Jroberts@mwhc-inc.com
	Email: joann.schaefer@hhss.state.ne.us	
Nevada	Jim Najima	Christopher Lake
	Public Health Preparedness Coordinator	BT Hospital Preparedness Coordinator
	Nevada Department of Human Resources	Nevada Hospital Association
	Health Division	5250 Neil Road, Suite 302
	505 E. King Street, Room 201	Reno, NV 89502
	Carson City, NV 89701	Phone: (775) 827-0184
	Phone: (775) 684-4200	Email: chris@nvha.net
	Email: jnajima@nvhd.state.nv.us	
New	Jesse Greenblatt, MD, MPH	Yvonne Goldsberry
Hampshire	State Epidemiologist	BT Hospital Preparedness Coordinator
	Office of Community and Public Health	Office of Community and Public Health
	New Hampshire Department of Health & Human	New Hampshire Department of Health &
	Services	Human Services
	6 Hazen Drive	6 Hazen Drive
	Concord, NH 03301	Concord, NH 03301
	Phone: (603) 271-8560	Phone: (603) 271-5194
	Email: jgreenblatt@dhhs.state.nh.us	Email: ygoldsberry@dhhs.state.nh.us
New Jersey	James S. Blumenstock	Carol Genese
	Senior Assistant Commissioner	Coordinator, BT Surveillance &
	New Jersey Department of Health and Senior	Epidemiologic Response
	Services	New Jersey Department of Health and
	P.O. Box 360	Senior Services
	Trenton, NJ 08625	Division of Epidemiology, Environmental

		1
	Email: james.blumenstock@doh.state.nj.us	Occupational Health Services 3635 Quakerbridge Road, P.O. Box 369
		Trenton, NJ 08625
		Phone: (609) 588-2583
		Email: <u>carol.genese@doh.state.nj.us</u>
New Mexico	Stuart Castle, MPH	Jim Pettyjohn, RN
	Program Manager	Injury Prevention and State Trauma Resource Nurse and
	Public Health Emergency Preparedness Unit	
	Office of Epidemiology, Public Health Division	Health Systems Emergency Preparedness
	New Mexico Department of Health 2500 Cerrillos Rd.	and Response Blanning Program Coordinator
	Santa Fe, NM 87505	Response Planning Program Coordinator Injury Prevention and EMS Bureau
		Public Health Division
	Phone: (505) 476-7882 24 hr. Emergency Number: (505) 827-0006	
	Email: <u>stuartc@doh.state.nm.us</u>	New Mexico Department of Health 2500 Cerrillos Rd.
	Eman. <u>stuarte(a)don.state.min.us</u>	Santa Fe, NM 87505
		Phone: (505) 476-7714
		24 hr. Emergency Number: (505) 827-
		0006
		Email: jpettyjohn@doh.state.nm.us
New York	Robert L. Burhans	Judy Faust
Itew Iork	Director, Public Health Preparedness and Response	BT Hospital Preparedness Coordinator
	New York State Department of Health	Bureau of Hospital Services
	Tower Building, ESP, Room 1142	New York State Department of Health
	Albany, New York 12237	Hedley Building, Suite 303, Sixth Floor
	Phone: (518) 402-7510	433 River Street, Troy, New York 12180-
	Email: <u>RLB04@health.state.ny.us</u>	2299
		Phone: (518) 402-1004
		Email: JAF15@health.state.ny.us
North	James W. Kirkpatrick, MD, MPH	Keli Coppola
Carolina	Bioterrorism Coordinator	BT Hospital Preparedness Coordinator
	North Carolina Department of Health and Human	North Carolina Department of Health and
	Services	Human Services
	Office of Public Health Preparedness and Response	Office of Emergency Medical Services
	Division of Public Health	Division of Facilities Services
	1902 Mail Service Center	2707 Mail Service Center
	Raleigh, NC 27699-1902	Raleigh, NC 27699-2707
	Phone: (919) 715-6734 OR (919) 715-0919	Phone: (919) 855-3935
	Email: Jim.Kirkpatrick@ncmail.net	Email: Keli.Coppola@ncmail.net
North	Tim Wiedrich, MS	Tim Wiedrich, MS
Dakota	Division of BT Preparedness and Response	Division of BT Preparedness and Response
	600 East Boulevard Avenue	600 East Boulevard Avenue
	Bismarck, ND 58505-0200	Bismarck, ND 58505-0200
	Phone: 701-328-2270	Phone: 701-328-2270
	Email: twiedric@state.nd.us	Email: twiedric@state.nd.us
Ohio	Steve Wagner, MPH, JD	Steve Wagner, MPH, JD
	Chief of the Bureau of Environmental Health	Chief of the Bureau of Environmental
	Division of Prevention	Health

Caronna	Program	Risk Management Coordinator for Support Services
South Carolina	Dan Drociuk, MT(ASCP), MSPH Director, Bioterrorism Surveillance and Response	Paul Richter Bisk Management Coordinator for Support
~		Email: donw@doh.state.ri.us
	Email: gregoryb@doh.state.ri.us	Phone: (401) 222-4727
	Phone: (401) 222-6868	Providence, RI 02908
	Providence, RI 02908	3 Capitol Hill, Room 401
	3 Capitol Hill, Room 209	Rhode Island Department of Health
isiana	Rhode Island Department of Health	Regulations
Island	Emergency Planner	Associate Director, Health Service
Rhode	Gregory Banner	Donald Williams
	·····	Email: <u>marsinger@state.pa.us</u>
	Email: <u>hburns@state.pa.us</u>	Phone: (717) 346-0640
	Phone: (717) 783-8804	Harrisburg, PA 17108
	Harrisburg, PA 17108	P.O. Box 90
	802 Health and Welfare Building	Pennsylvania Department of Health
	Pennsylvania Department of Health	Office of Public Health Preparedness
	Assessment	Preparedness
a	Deputy Secretary for Health Planning and	Coordinator, Hospital Bioterrorism
Pennsylvani	Helen Burns, RN, PhD	Martin Singer, MPH
		Email: <u>allan.d.visnick@state.or.us</u>
	Email: maria.g.sistrom@state.or.us	Phone: (503) 731-4002 ext. 843
	Phone: (503) 731-4024	Portland, OR 97232
	Portland, OR 97232	800 NE Oregon Street, Suite 360
	800 NE Oregon Street Suite 772	Public Health Preparedness Section
	Acute and Communicable Disease Prevention	Relations
	Office of Disease Prevention and Epidemiology	Office of Health Planning and Community
	Services	Health Services
	Oregon Department of Human Services, Health	Oregon Department of Human Services,
0	Bioterrorism Coordinator	BT Hospital Preparedness Coordinator
Oregon	Maria Sistrom, RN, MSN	Allan D. Visnick
	Email: <u>RobertLP@health.state.ok.us</u>	
	57172	Email: timc@health.state.ok.us
	Phone: (405) 271-4060 OR (405) 271-3266 ext.	Phone: (405) 271-4060
	Oklahoma City, OK 73117-1299	Oklahoma City, OK 73117-1299
	Room 605, 1000 NE 10th Street	1000 NE 10th Street
	Oklahoma State Department of Health	OSDH Building Room 605
	Acute Disease Service	Oklahoma State Department of Health
	Response	Acute Disease Service
	Bioterrorism Planning, Preparedness, Exercise and	Response
	Division Chief	Medical Director for BT Preparedness and
Oklahoma	Robert L. Petrone, PhD, MPH, PA-C	Timothy Cathey, MD
		Email: swagner@gw.odh.state.oh.us
	Email: swagner@gw.odh.state.oh.us	Phone: (614) 466-5599
	Phone: (614) 466-5599	246 N High Street, Columbus, Ohio 43215
	246 N High Street, Columbus, Ohio 43215	Ohio Department of Health
	Ohio Department of Health	Division of Prevention

	Environmental Control	P.O. Box 6009
	Bureau of Disease Control	West Columbia, SC 29171
	Division of Acute Disease Epidemiology	Phone: (803) 796-3080
	1751 Calhoun Street, Columbia, SC 29201	Email: prichter@scha.org
	Phone: (803) 898-0289	
	Email: drociukd@dhec.state.sc.us	
South	LaJean Volmer	LaJean Volmer
Dakota	South Dakota Department of Health	South Dakota Department of Health
	Division of Health Systems Development and	Division of Health Systems Development
	Regulation	and Regulation
	Office of Public Health Preparedness and Response	Office of Public Health Preparedness and
	600 East Capitol Pierre, SD 57501	Response
	Phone: (605) 773-3364	600 East Capitol Pierre, SD 57501
	Email: lajean.volmer@state.sd.us	Phone: (605) 773-3364
		Email: lajean.volmer@state.sd.us
Tennessee	Robb L. Garman, MPH	Kenneth M. Palmer, MBA, FACHE
	Tennessee Department of Health	Director, Hospital Bioterrorism
	Communicable and Environmental Disease	Preparedness Program
	Services	Tennessee Department of Health
	425 5th Ave North, 4th Floor, Cordell Hull Bldg	Bureau of Health Services
	Nashville, TN 37247-4947	425 5th Avenue North
	Phone: (615) 741-7247	5th Floor, Cordell Hull Bldg.
	Email: <u>robb.garman@state.tn.us</u>	Nashville, TN 37247
		Phone: (615) 741-1915
Texas	Dennis M. Perrotta, PhD CIC	Email: <u>kenneth.palmer@state.tn.us</u> Ron Hilliard, RN, LP
Texas	State Epidemiologist	Manager, Bioterrorism Hospital
	Office of the State Epidemiologist	Preparedness Program
	Texas Department of Health	Office of the State Epidemiologist
	1100 West 49th Street	Texas Department of Health
	Austin, Texas 78756-3199	1100 West 49th Street
	Phone: (512) 458-7111 x6666	Austin, Texas 78756-3199
	Email: <u>dennis.perrotta@tdh.state.tx.us</u>	Phone: (512) 458-7111 x6790
		Email: ron.hilliard@tdh.state.tx.us
Utah	Brian Garrett	Lloyd Baker
	Director of Bioterrorism Planning and Response	Bioterrorism Program Manager-HRSA
		Utah Dept. of Health, EMS Bureau
	Utah Department of Health	P.O. Box 142004
	288 N 1460 W	Salt Lake City, Utah 84114-2004
	Salt Lake City, Utah 84116	Phone: (801) 538-6807
	Phone: (801) 538-6471	Email: <u>lloydbaker@utah.gov</u>
	Cell: (801) 550-0398	
	Email: bgarrett@utah.gov	
Vermont	Lynne Dapice, MS, RN	Ellen B. Thompson
	Bioterrorism Grant Coordinator	Public Health Planning Chief
	Vermont Department of Health	Vermont Department of Health
	108 Cherry St, P.O. Box 70	Division of Health Improvement
	Burlington, VT 05402-0070	108 Cherry Street, P.O. Box 70

	Phone: (802) 657-4237	Burlington, VT 05402
	Email: <u>ldapice@vdh.state.vt.us</u>	Phone: (802) 863-7606
	<u>Augroote</u> , an <u>euro</u>	Email: <u>ethomps@vdh.state.vt.us</u>
Virginia	Lisa G. Kaplowitz, MD, MSHA	James Cisek, MD
	Deputy Commissioner	BT Hospital Preparedness Coordinator
	Emergency Preparedness and Response	Virginia Department of Health
	Virginia Department of Health	1500 East Main Street, Room 218
	1500 E. Main Street, P. O. Box 2448	Richmond, VA 23219
	Richmond, VA 23218	Phone: (804) 255-2531
	Phone: (804) 786-3563 OR (804) 692-0224	Email: jcisek@vdh.state.va.us
	Pager: (804) 351-1529	Eman. Jersek(a)van.state.va.us
	Email: <u>lkaplowitz@vdh.state.va.us</u>	
Washington	John Erickson, Special Assistant	John Erickson, Special Assistant
w asnington	Public Health and Hospital Preparedness and	Public Health and Hospital Preparedness
	Response	and Response
	Washington State Department of Health	Washington State Department of Health
	P.O. Box 47890	P.O. Box 47890
	Olympia, WA 98504-7890 Phone: (360) 236-4033	Olympia, WA 98504-7890 Phone: (360) 236-4033
		Email: john.erickson@doh.wa.gov
	Email: john.erickson@doh.wa.gov	
West	Cathy Slemp, MD, MPH	Mark King
Virginia	Director, Public Health Threat Preparedness and	Director, Office of Emergency Medical
	Acting State Health Official	Services
	West Virginia Bureau for Public Health	West Virginia Bureau for Public Health
	Office of the Commissioner	350 Capitol St., Room 515
	350 Capitol St. Room 702	Charleston, WV 25301-3716
	Charleston, WV 25301	Phone: (304) 558-3956
	Phone: (304) 558-2971	Email: <u>markking@wvdhhr.org</u>
	Email: <u>cathyslemp@wvdhhr.org</u>	
Wisconsin	Steven A. Marshall, MS	Dennis Tomczyk
	Bioterrorism Coordinator	Hospital Preparedness Coordinator
	Wisconsin Department of Health and Family	Wisconsin Department of Health and
	Services	Family Services
	Division of Public Health	Division of Public Health
	1 West Wilson Street, Room 250	1 West Wilson Street, Room 318
	Madison, WI 53701	Madison, WI 53071
	Phone: (608) 266-9783	Phone: (608) 266-3128
	Email: marshs@dhfs.state.wi.us	Email: tomczdj@dhfs.state.wi.us
Wyoming	Karl J. Musgrave, DVM, MPH	James D. McKinna
	Administrator	BT Hospital Preparedness Coordinator
	Wyoming Department of Health	Wyoming Department of Health
	Preventive Health and Safety Division	Preventive Health and Safety Division
	2300 Capitol Avenue	2300 Capitol Avenue
	Cheyenne, WY 82002	Cheyenne, WY 82002
	Phone: (307) 777-7958	Phone: (307) 777-8666
	Email: kmusgr@state.wy.us	Email: jmckin1@state.wy.us



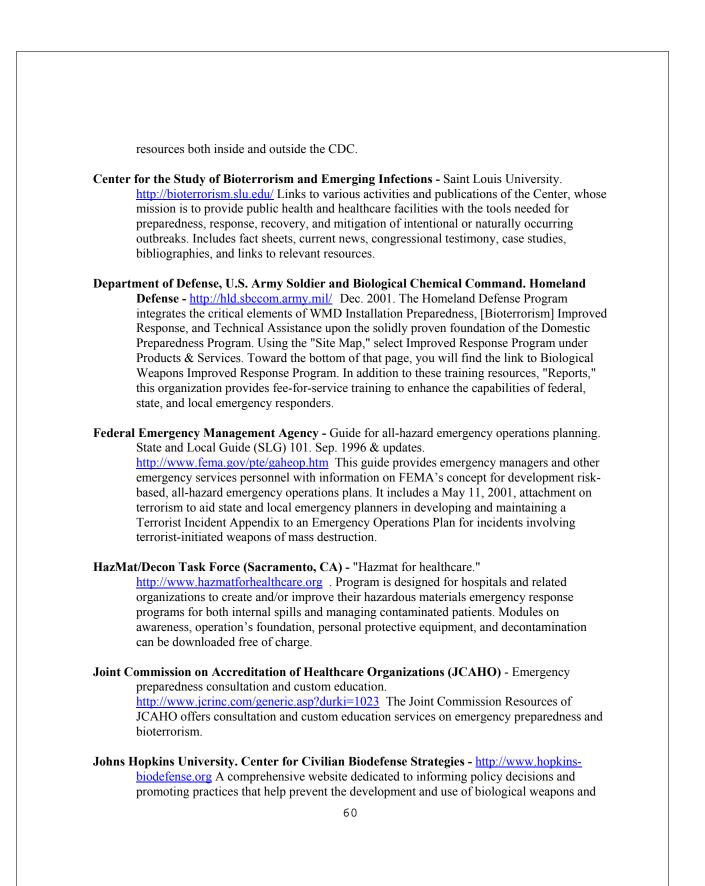
identified subject matter experts who contribute to course development. Assessment tools verify competency and completion of each module. <u>http://nams.umbc.edu/</u>

Association of State and Territorial Directors of Health Promotion and Public Health Education - http://www.astdhpphe.org Model Emergency Response Communications Planning for Infectious Disease Outbreaks and Bioterrorist Events. 2nd Ed. October 2001. This second edition is intended for a diverse group of state and local public health and emergency response officials whose efforts must be coordinated on short notice to contain a deliberately planned or naturally occurring infectious disease outbreak. The model provides a framework for communications among public health officials, between health officials and other emergency response players, and directly with the public and the media. The model addresses several important areas including situation and assumptions, operational guidelines, and organizations and assignment of responsibilities. \$29.95

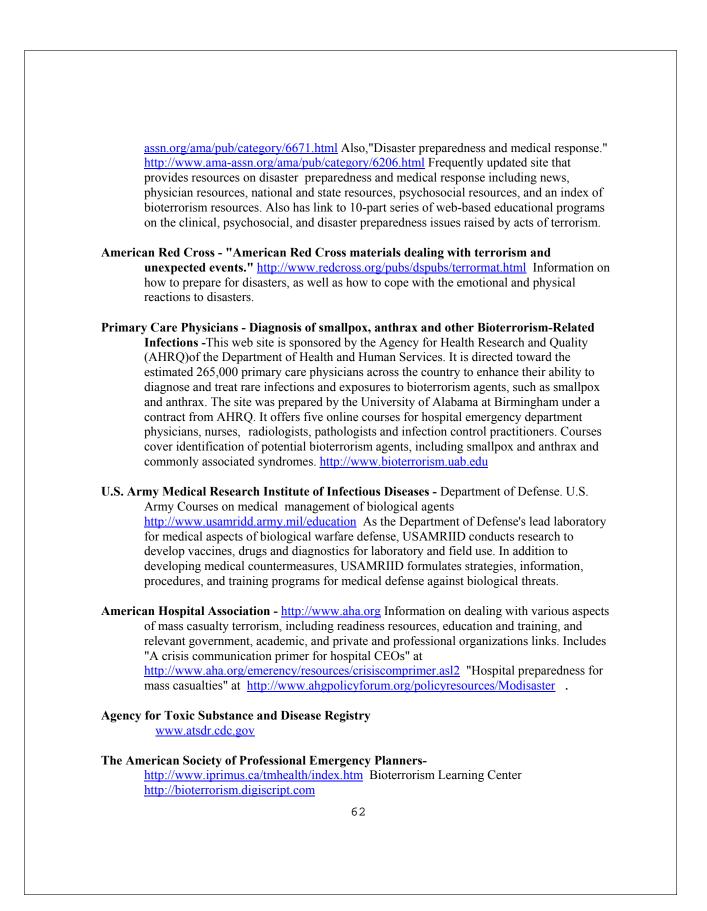
- American Hospital Association -"http://www.aha.org/Emergency/EmIndex.asp Information on dealing with various aspects of mass casualty terrorism, including readiness resources, education and training, and relevant government, academic, and private and professional organizations links. Includes "A crisis communication primer for hospital CEOs" at <a href="http://www.aha.org/emergency/resources/crisiscomprimer.asp">http://www.aha.org/emergency/resources/crisiscomprimer.asp</a> "Hospital preparedness for mass casualties" at <a href="http://www.ahapolicyforum.org/policyresources/MOdisaster.asp">http://www.ahapolicyforum.org/policyresources/MOdisaster.asp</a>
- American Medical Association "Disaster preparedness and medical response." <u>http://www.ama-assn.org/ama/pub/category/6206.html</u> Frequently updated site that provides resources on disaster preparedness and medical response including news, physician resources, national and state resources, psychosocial resources, and an index of bioterrorism resources. Also has link to 10-part series of web-based educational programs on the clinical, psychosocial, and disaster preparedness issues raised by acts of terrorism.

**Centers for Disease Control and Prevention, National Pharmaceutical Stockpile -** "Receiving, Distributing, and Dispensing the National Pharmaceutical Stockpile(NPS) : A Guide for Planners." Version 9-Draft, April 2002. This training resource was written primarily for state and local planners so they can understand the NPS Program and create detailed local plans for distributing the NPS resources as needed to hospitals to treat the sick – and to other locations to protect the well. It is anticipated that it will also be useful to senior federal, state, and local leadership to help them understand what their plans for distributing the NPS must contain so they can determine what they need to do to prepare for a future event. For further information, contact Stephan G. Reissman, PhD, CEM, at (404) 639-0459 or smr8@cdc.gov.

**Centers for Disease Control and Prevention -** "Public health emergency preparedness and response." <u>http://www.bt.cdc.gov</u> This site on public health emergency preparedness and response to biological, chemical or radiological terrorism is organized by type of agents and threats as well as by such site topics as preparation and planning, emergency response, laboratory information, surveillance, and training. In addition, it provides links to related



	should prevention fail, lessen the death and suffering that would result. Current information including educational and policy resources.
Natio	<b>nal Academies Press. Responding First to Bioterrorism -</b> <u>http://stills.nap.edu/shelfves/first</u> Expertly-selected web resources for First Responders on bioterrorism and public safety. Includes 18 Training Programs; three online training sites; and one database of National Emergency Managers Association Listing of Training Programs, a state-by-state catalog of training programs for emergency response to terrorism. The online courses include the American Board of Quality Assurance and Utilization Review Physician's "Online Course" in bioterrorism for doctors and nurses.
Publi	<b>c Health Foundation -</b> <u>http://trainingfinder.org</u> Clearinghouse of distance learning courses on a variety of topics, including 92 courses on bioterrorism/emergency preparedness. One central website provides public health professionals of all disciplines with a comprehensive database of distance learning opportunities. The site provides information to assess and meet the development needs of the public health workforce, while further advancing state- of-the-art training and utilization of public health competencies. Prices vary.
Publi	<b>c Health Grand Rounds-</b> "Bioterrorism: implications for public health." <u>http://publichealthgrandrounds.unc.edu/bioterrorism/resources.htm</u> Nov. 15, 2001. Provides links to a variety of bioterrorism resources, including viewable webcasts, online books, and selected CDC resources.
The I	Maryland Institute for Emergency Medical Services Systems (MIEMSS) - <u>http://miemss.umaryland.edu/Home.htm</u> The WMD Response Plan includes best practices for health care organizations (hospitals, public health, emergency medical services, and health care providers) and specific tasks and preparation actions that these and other health care system partners should implement in Maryland and are applicable in other states and territories.
U.S	Army. Medical Research Institute of Infectious Diseases - Medical management of biological casualties handbook. 4 <sup>th</sup> ed. Frederick MD: Fort Detrick, Feb. 2001. <a href="http://www.usamriid.army.mil/education/bluebook.html">http://www.usamriid.army.mil/education/bluebook.html</a> Intended for the health care provider on the front lines, this resource provides basic summary and treatment information in the prophylaxis and management of biological casualties. It includes effective countermeasures available against many of the bacteria, viruses, and toxins which might be used as biological weapons.
Ame	<b>rican Medical Association - Bioterrorism Resources for the Physician</b> Currently includes information on Anthrax, Antibiotic Misuse, Bioterrorism, Botulinum Toxin, Chlordane during time of disaster, organized medicine's role in the national response to terrorism, diagnosis and treatment related to disaster medicine problems, hospital preparedness, post- traumatic stress disorder, smallpox, tuleremia, and responding to the growing threat of biological weapons which can be located at: <u>http://www.ama-</u>
	61



Centers for Disease Control and Prevention- public health emergency preparedness and response site www.bt.cdc.go Food and Drug Administration Bioterrorism- page http://www.fda.gov/oc/opacom/hottopics/bioterrorism.html US PUBLIC HEALTH SERVICE, OFFICE OF EMERGENCY PREPAREDNESS: Web-Based Training Modules: CCRF http://ccrf.umbc.edu/ http://oep.osophs.dhhs.gov/ccrf/training.htm http://www.training.fema.gov/

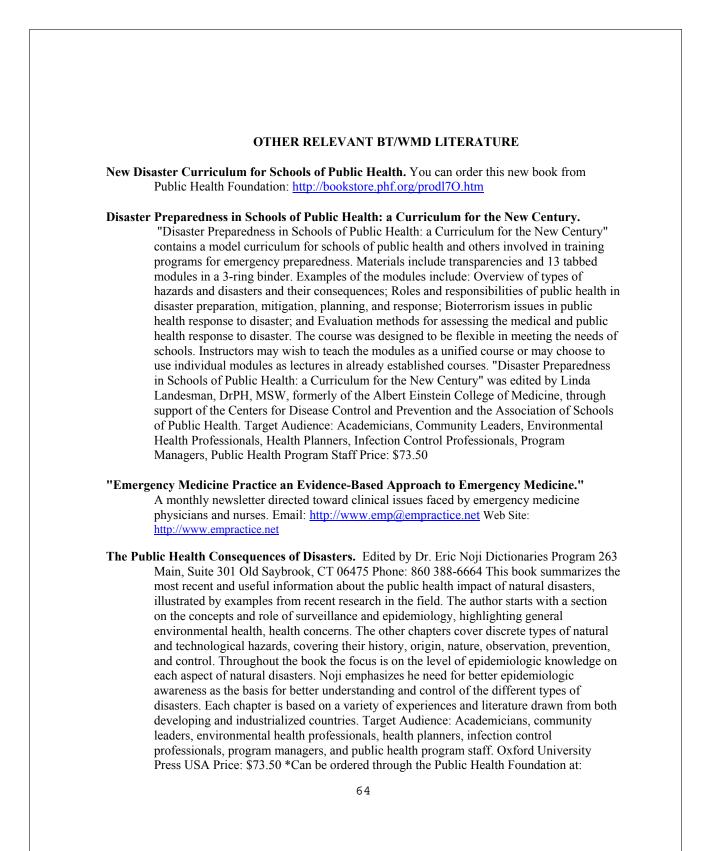
#### **CD-ROM BIOTERRORISM EDUCATIONAL RESOURCES**

Headquarters Air Force Civil Engineer Support Agency and Air Force Combat Support Systems, 139 Barnes Drive, Suite 1, Tyndall AFB, FL 32403-5319. CDCHelp@tyndall.af.mil. These resources are FREE.

http://oep.osophs.dhhs.gov/dmat/resource/ICS/sld001.htm file:///PI/USA Freedom Corps/Training Materials/MMRS.htm

**Emergency Response to Terrorism: Basic Concepts**. Train-The-Trainer Support Material. January 2002. The primary target audience includes fire personnel, EMS responders, and HazMat responders. It will benefit public health workers; public works management; law enforcement personnel; disaster response agencies; emergency management personnel; emergency communications personnel; and the Armed Forces, Reserves, and National Guard. Includes Lesson Plans, Student Study Guide, Appropriate Appendices, Presentation Slides, Glossary of Terms, and a Bibliography.

- **Emergency Response to Terrorism: Self-Study**. Train-the-Trainer Support Material. The target audience includes firefighters, emergency medical personnel, and HazMat emergency responders. It will benefit public health workers; public works management; law enforcement personnel; disaster response agencies; emergency management personnel; emergency communications personnel; law enforcement personnel, jurisdictional emergency coordinators, and the Armed Forces, Reserves, and National Guard.
- **Emergency Response to Terrorism. For Emergency Responders**. This course is designed to raise the emergency responder's level of awareness and better prepare them for responding to a potential criminal or terrorist event. The target audience included police/security forces, firefighters, EMS and HazMat responders, and EOD personnel.

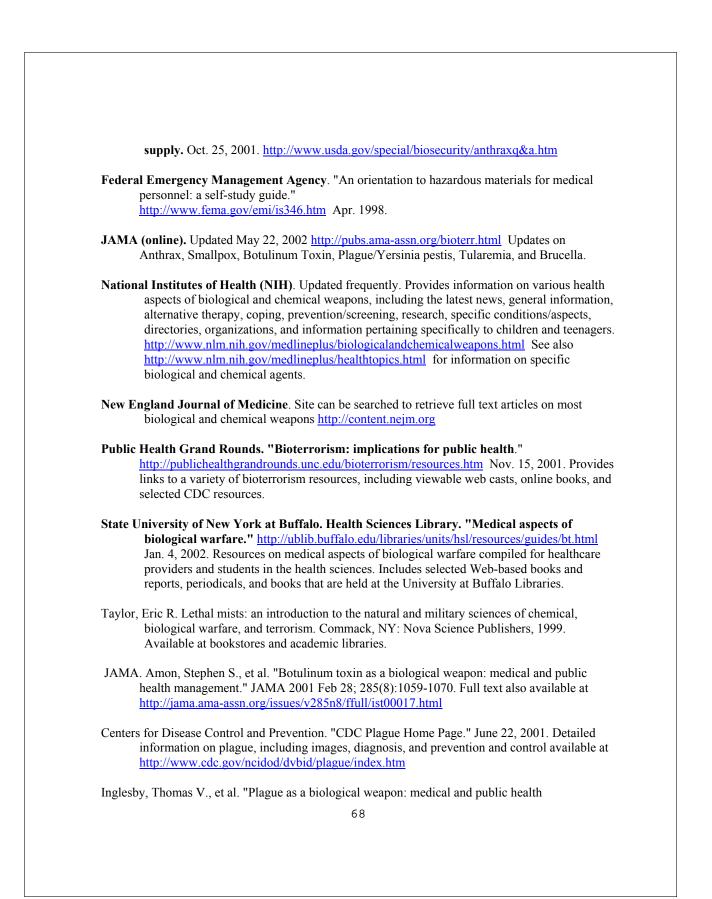


## http://bookstore.phf.org/prod170.htm

- Annals of Emergency Medicine. "Disaster medicine/emergency preparedness." <u>http://www.harcourthealth.com/scripts/om.dll/serve?action=open&location=em/em-</u> <u>disastercoll&id=em&group=toc</u> Nov. 2001. Bibliography of more than 40 articles from the journal from 1994 to November 2001 on disaster medicine and emergency preparedness.
- Centers for Disease Control and Prevention. "Public health emergency preparedness and response." <u>http://www.bt.cdc.gov</u> This site on public health emergency preparedness and response to biological, chemical or radiological terrorism is organized by type of agents and threats as well as by such site topics as preparation and planning, emergency response, laboratory information, surveillance, and training. In addition, it provides links to related resources both inside and outside the CDC.
- American College of Emergency Physicians (ACEP). providing updated bioterrorism information and resources. ACEP has developed two web-based resources: one that provides links to sites containing response plans, diagnosis, and treatment information; the other a discussion forum with a CDC representative relating to anthrax and the CDC's treatment and diagnostic protocols.
- American College of Emergency Physicians. "Bioterrorism resources for emergency physicians." <u>http://www.acep.org</u> Provides information on relevant conferences, journal articles, and protocols.
- **Emergency Management Strategic Healthcare Group (EMSHG)**. <u>http://www.va.gov/emshg</u> Jan. 7, 2002. EMSHG manages, coordinates and implements the emergency medical preparedness mission for the Department of Veterans Affairs through various Federal laws and regulations. Web site provides resources on a wide variety of topics relating to emergency medical preparedness, disaster response and recovery operations, including decontamination procedures, anthrax guidelines, upcoming broadcasts on terrorism, and the Emergency Management Academy education and training materials.
- Federal Emergency Management Agency. <u>http://www.fema.gov</u> Information on many aspects of disaster preparedness, including the United States governmental interagency domestic terrorism concept of operations plan (CONPLAN) <u>http://www.fema.gov/r-n-r/conplan</u> Jan. 2001.
- Guide for all-hazard emergency operations planning. State and Local Guide (SLG) 101. Sep. 1996 & updates. <u>http://www.fema.gov/pte/gaheop.htm</u> This guide provides emergency managers and other emergency services personnel with information on FEMA's concept for development risk-based, all-hazard emergency operations plans. It includes a May 11, 2001, attachment on terrorism to aid state and local emergency planners in developing and maintaining a Terrorist Incident Appendix to an Emergency Operations Plan for incidents involving terrorist-initiated weapons of mass destruction.



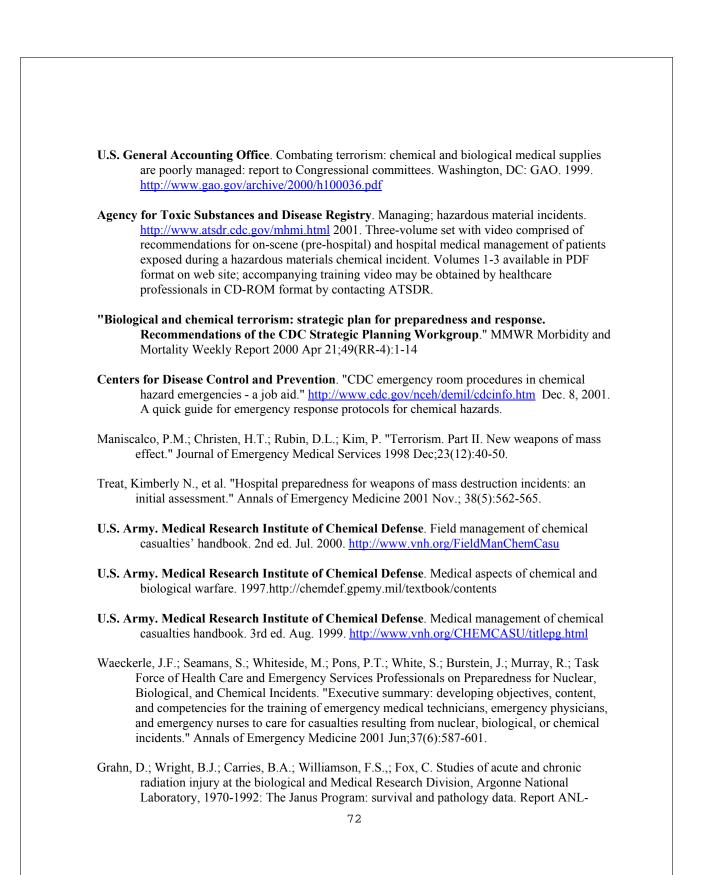
Center	<b>for the Study of Bioterrorism and Emerging Infections. Saint Louis University</b> . Mission is to provide public health and healthcare facilities with the tools needed for preparedness, response, recovery, and mitigation of intentional or naturally occurring
	outbreaks. Includes fact sheets, current news, congressional testimony, case studies, bibliographies, and links to relevant resources.
Institu	<b>Ite of Medicine. Chemical and biological terrorism; research and development to</b> <b>improve civilian medical response.</b> Washington, DC: National Academy Press, 1999. <u>http://bob.nap.edu/books/0309061954.html</u> This 279-page document Collects and assesses existing research, development, and technology information on detecting potential chemical and biological agents and protecting and treating both the targets of attack and health care providers. In addition, it also provides specific recommendations for priority research and development.
Nation	hal Institute of Allergy and Infectious Diseases. "Bioterrorism." http://www.niaid.nih.gov/publications/bioterrorism.htm Jan. 15, 2002. General information on Naiad's research on bioterrorism, as well as related news releases, congressional testimony, and links relevant bioterrorism to sites.
_	
Depar	tment of Health and Human Services. "Anthrax and biological incidents: preparedness and response." <u>http://www.hhs.gov/hottopics/healing/biological.html</u> Jan. 11, 2002. Information regarding HHS's role in emergency preparedness and response in the event of a biological or other public health emergency. Includes general information on bioterrorism, as well as specific information on anthrax and smallpox, and related testimony and speeches.
-	and response." <u>http://www.hhs.gov/hottopics/healing/biological.html</u> Jan. 11, 2002. Information regarding HHS's role in emergency preparedness and response in the event of a biological or other public health emergency. Includes general information on bioterrorism, as well as specific information on anthrax and smallpox, and related testimony and
-	<ul> <li>and response." <u>http://www.hhs.gov/hottopics/healing/biological.html</u> Jan. 11, 2002. Information regarding HHS's role in emergency preparedness and response in the event of a biological or other public health emergency. Includes general information on bioterrorism, as well as specific information on anthrax and smallpox, and related testimony and speeches.</li> <li>BIOLOGICAL AND OTHER WMD TERRORISM ARTICLES/ REFERENCES</li> <li>rs for Disease Control and Prevention, National Center for Infectious Diseases. "Bioterrorism-related articles." <u>http://www.cdc.gov/ncidod/EID/bio_links.htm</u> Jan. 12, 2002. Provides links to bioterrorism-related articles from the journal Emerging Infectious</li> </ul>
Cente	<ul> <li>and response." <u>http://www.hhs.gov/hottopics/healing/biological.html</u> Jan. 11, 2002. Information regarding HHS's role in emergency preparedness and response in the event of a biological or other public health emergency. Includes general information on bioterrorism, as well as specific information on anthrax and smallpox, and related testimony and speeches.</li> <li>BIOLOGICAL AND OTHER WMD TERRORISM ARTICLES/ REFERENCES</li> <li>rs for Disease Control and Prevention, National Center for Infectious Diseases. "Bioterrorism-related articles." <u>http://www.cdc.gov/ncidod/EID/bio_links.htm</u> Jan. 12, 2002. Provides links to bioterrorism-related articles from the journal Emerging Infectious Diseases.</li> </ul>
Cente	<ul> <li>and response." <u>http://www.hhs.gov/hottopics/healing/biological.html</u> Jan. 11, 2002. Information regarding HHS's role in emergency preparedness and response in the event of a biological or other public health emergency. Includes general information on bioterrorism, as well as specific information on anthrax and smallpox, and related testimony and speeches.</li> <li>BIOLOGICAL AND OTHER WMD TERRORISM ARTICLES/ REFERENCES</li> <li>rs for Disease Control and Prevention, National Center for Infectious Diseases.</li> <li>"Bioterrorism-related articles." <u>http://www.cdc.gov/ncidod/EID/bio_links.htm</u> Jan. 12, 2002. Provides links to bioterrorism-related articles from the journal Emerging Infectious Diseases.</li> <li>tical and Biological Arms Control Institute. Bioterrorism in the United States: threat, preparedness, and response. Final report.</li> <li>http://www.cbaci.org/CDCSectionLinksMain.htm Nov. 2000. A 339-page report on the growing threat of terrorist use of biological weapons in the United States, and the public</li> </ul>
Cente	<ul> <li>and response." <u>http://www.hhs.gov/hottopics/healing/biological.html</u> Jan. 11, 2002. Information regarding HHS's role in emergency preparedness and response in the event of a biological or other public health emergency. Includes general information on bioterrorism, as well as specific information on anthrax and smallpox, and related testimony and speeches.</li> <li>BIOLOGICAL AND OTHER WMD TERRORISM ARTICLES/ REFERENCES</li> <li>rs for Disease Control and Prevention, National Center for Infectious Diseases.</li> <li>"Bioterrorism-related articles." <u>http://www.cdc.gov/ncidod/EID/bio_links.htm</u> Jan. 12, 2002. Provides links to bioterrorism-related articles from the journal Emerging Infectious Diseases.</li> <li>ical and Biological Arms Control Institute. Bioterrorism in the United States: threat, preparedness, and response. Final report. http://www.cbaci.org/CDCSectionLinksMain.htm Nov. 2000. A 339-page report on the</li> </ul>
Cente	<ul> <li>and response." <u>http://www.hhs.gov/hottopics/healing/biological.html</u> Jan. 11, 2002. Information regarding HHS's role in emergency preparedness and response in the event of a biological or other public health emergency. Includes general information on bioterrorism, as well as specific information on anthrax and smallpox, and related testimony and speeches.</li> <li>BIOLOGICAL AND OTHER WMD TERRORISM ARTICLES/ REFERENCES</li> <li>rs for Disease Control and Prevention, National Center for Infectious Diseases.</li> <li>"Bioterrorism-related articles." <u>http://www.cdc.gov/ncidod/EID/bio_links.htm</u> Jan. 12, 2002. Provides links to bioterrorism-related articles from the journal Emerging Infectious Diseases.</li> <li>tical and Biological Arms Control Institute. Bioterrorism in the United States: threat, preparedness, and response. Final report.</li> <li>http://www.cbaci.org/CDCSectionLinksMain.htm Nov. 2000. A 339-page report on the growing threat of terrorist use of biological weapons in the United States, and the public</li> </ul>



	management." JAMA 2000 May 3;283(17):2281-2290. Full text also available at <a href="http://jama.ama-assn.org/issues/v283nl7/ffull.isuet90013.html">http://jama.ama-assn.org/issues/v283nl7/ffull.isuet90013.html</a>
Grabe	er, Mark. "Bioterrorism update: smallpox," Emergency Medicine 2002 Jan http://www.emedmag.com/stories/storyReader \$53
Hend	erson, D.A. "Smallpox: clinical and epidemiologic features." Emerging Infectious Diseases 1999; Jul-Aug; 5(4): 537-539. Full text also available at <a href="http://www.cdc.jzov/ncidod/EIID/vol5no4/henderson.htm">http://www.cdc.jzov/ncidod/EIID/vol5no4/henderson.htm</a>
Hend	erson, Donald A., et al. "Smallpox as a biological weapon: medical and public health management." JAMA 1999 Jun 9;281(22):2127-2137.Full text also available at <a href="http://jama.ama-assn.org/issues/v28ln22/ffull/jst90000.html">http://jama.ama-assn.org/issues/v28ln22/ffull/jst90000.html</a>
Denn	is, David T., et al. "Tularemia as a biological weapon: medical and public health management." 4M4 2001 Jun 6;285(21):2763-2773. Full text also available at <a href="http://jama.ama-assn.org/issues/v285n21/ffull/istl0001.html">http://jama.ama-assn.org/issues/v285n21/ffull/istl0001.html</a>
Flynn	, Brian W.; Nelson, Mary Elizabeth. "Understanding the needs of children following large- scale disasters and the role of government." Child and Adolescent Psychiatric Clinics of North America 1998 Jan;7(1):211-227.
Natio	nal Center for PTSD. "Terrorism and children." <u>http://www.ncptsd.orp-/facts/disasters/fs</u> <u>children disaster.html</u> Nov. 13, 2001. Fact sheet on terrorism and children.
Head	quarters Departments of the Army, the Navy and the Air Force and Commandant, Marine Corps. Treatment of biological warfare agent casualties. Washington, DC. Jul. 17, 2000. <u>http://www.vnh.org/FM8284/index.html</u>
Kaile	s, June Isaacson. "Disaster preparedness for people with disabilities." <u>http://www.jik.com/disaster.html</u> Sep. 19, 2001. Although some of the information focuses on disasters such as earthquakes and floods, the information has applicability for all types of disaster preparedness for people with disabilities.
Assoc	ciation for Professionals in Infection Control and Epidemiology, Inc. <u>http://www.apic.org/bioterror/bioterrorproducts.cfm</u> Lists various bioterrorism products and publications, including Bioterrorism readiness plan for healthcare facilities, which is available for \$10 (members) or \$18 (nom-members).
"Biol	pgical and chemical terrorism: strategic plan for preparedness and response. Recommendations of the CDC Strategic Planning Workgroup." MMWR Morbidity and Mortality Weekly Report 2000 Apr 21;49(RR-4):1-14.
Food	and Drug Administration. "Drug preparedness and response to bioterrorism."

	http://www.fda.gov/cder/drugprepare/default.htm Dec. 10, 2001. As part of the FDA effort to ensure that adequate supplies of medicine and vaccines are available in case of
	bioterrorism attacks, this site provides links to the most current information on drug therapy and vaccines relevant to bioterrorism. It also provides advice on purchasing and taking medication.
Khar	, Eli S.; Ashford, David A "Ready or not - preparedness for bioterrorism." The New England Journal of Medicine. 2001 Jul 26;345(4):287-289.
Stop	ford, Bettina M. "Responding to the threat of bioterrorism: practical resources and references, and the importance of preparation." Journal of Emergency Nursing 2001 Oct;27(5):471-475.
Univ	ersity of Alabama at Birmingham. "Rare infections and potential bioterrorist agents." <u>http://www.bioterrorism.uab.edu</u> Oct. 15, 2001. Continuing education module for medical professionals on rare infections and potential bioterrorist agents.
U.S.	Army. Medical Research Institute of Chemical Defense. Field Management of chemical casualties handbook. 2nd ed. Jul.2000.
U.S.	Army. Medical Research Institute of Chemical Defense. Medical aspects of chemical and biological warfare. 1997. <u>http://chemdef.apgea.army_mil/textbook/contents.asp</u>
U.S.	Army. Medical Research Institute of Infectious Diseases. Medical management of biological casualties handbook. 4" ed. Frederick MD: Fort Detrick, Feb. 2001. <u>http://www.usamriid.army.mil/education/bluebook.html</u>
U.S.	Army. Medical Research Institute of Infectious Diseases. Medical management of chemical casualties' handbook. 3rd ed. Aug 1999. <u>http://www.vnh.org/CHEMCASU/titlepg.html</u>
U.S.	Army Soldier and Biological Chemical Command. Homeland Defense Unit. "Neighborhood emergency help center: a mass casualty care strategy for biological terrorism incidents."
	http://www2.sbccom.army.mil/hid/bwirp/bwirp nehc green book download.htm May 2001.
Wae	ckerle, J.F.; Seamans, S.; Whiteside, M.; Pons, P.T.; White, S.; Burstein, J.; Murray, R.; Task
	Force of Health Care and Emergency Services Professionals on Preparedness for Nuclear, Biological, and Chemical Incidents. "Executive summary: developing objectives, content, and competencies for the training of emergency medical technicians, emergency physicians,
	and emergency nurses to care for casualties resulting from nuclear, biological, or chemical incidents." Annals of Emergency Medicine 2001 Jun;37(6):587-601.
Wess	ely, Simon; Hyams, Kenneth Craig; Bartholomew, Robert. "Psychological implications of chemical and biological weapons." BMJ2001 Oct 20;323(7318):878-9. Full text also

ŧ	available at http://bmj.com/cgi/content/full/323/7318/878 /btrsch.htm Oct. 2001.
Departr	nent of Agriculture. "Agricultural biosecurity."
	http://www.usda.,o/sspecial/biosecurity/anthraxg&a.htm Oct. 25, 2001.
	Summary of USDA's activities to ensure the well-being of America's agriculture and food
SI	apply.
Maniscal	co, P.M.; Christen, H.T.; Rubin, D.L.; Kim, P. "Terrorism. Part II. New weapons of mass
	ffect." Journal of Emergency Medical Services 1998 Dec;23(12):40-50.
Environn	nental Protection Agency. Chemical Emergency Preparedness and Prevention Office.
	http://www.epa.gov/ceppo Office provides leadership, advocacy, and assistance to prevent
	and prepare for chemical emergencies, respond to environmental crises, and inform the
	public about chemical hazards in their community. Web site provides information on
	prevention, preparedness, emergency response, international programs, and counter- perrorism relating to chemical emergencies.
,	enonsin relating to enemical energencies.
	Emergency Management Agency. "An orientation to hazardous materials for medical
1	personnel: a self-study guide." <u>http://www.fema.gzov/emi/is346.html</u> Apr.1998.
Mavo Fo	oundation for Medical Education and Research. "Biological, chemical weapons: arm
2	yourself with information." <u>http://www.mg oclinic.com/invoke.cfm?id=MH00027</u> Oct. 18,
-	2001. Information on anthrax, smallpox, plague, botulism and tularemia, and nerve gases.
National	Library of Medicine. "News by health topic: biological and chemical weapons."
	<u>http://www.nlm.nih.2ov/medlineplus/alphanews b.html</u> Provides the most recent 30 days of
	ews from the New York Times Syndicate, AP News Service, Reuters Health Information,
a	nd others.
National	Library of Medicine. "Biological and chemical weapons."
	http://www.nlm.nih.gov/medlineplus/biologicalandchemicalwegpons.html Updated
t	frequently. Provides information on various health aspects of biological and chemical
	weapons, including the latest news, general information, alternative therapy, coping,
	prevention/screening, research, specific conditions/aspects, directories, organizations, and
	nformation pertaining specifically to children and teenagers. See also <u>http://www.nlm.nih.gov/medlineplus/healthtopics.html</u> for information on specific
	piological and chemical agents.
	<b>neral Accounting Office</b> . Combating terrorism: accountability over medical supplies needs
	further improvement. Report to the chairman of the Subcommittee on National Security, Veterans Affairs, and International Relations, Committee on Government Enhancement,
	House of Representatives. Washington, DC: GAO. 2001.
	71



95/3. Argonne, IL: Argonne National Laboratory. 1995. Available from the N	Jational
Technical Information Service.	National
Federal Emergency Management Agency. Radiological Emergency Preparedness. strategic review implementation products. Final FEMA policy."	"REP program
http://www.fema.gov/pte/rep/fnlpl-2.htm Policy to be effective Oct. 1, 1999.	
Food and Drug Administration. "FDA's guidance on protection of children and adu	lts against
thyroid cancer in case of nuclear accident." <u>http://www.fda.gov/bbs/topics/ANSWERS/2001/ANS01126.html</u> Dec. 10, 2	2001.
Swindon, T.N. Manual on the medical management of individuals involved in radiation	
Australian Radiation Protection and Nuclear Safety Agency. Go to the websi <u>http://www.health.gov.au/hfs/arpansa/rempan2000</u> .	te
Treat, Kimberly N., et al. "Hospital preparedness for weapons of mass destruction inc	eidents: an
initial assessment." Annals of Emergency Medicine 2001 Nov.;38(5):562-565	
WHO Radiation Emergency Medical Preparedness and Assistance Network (RE REMPAN is a network of collaborating centers established by the World Hea	
Organization for the promotion of radiation emergency medical preparedness	
provides practical assistance and advice to countries in the case of overexpos	
source of radiation. This site provides information on REMPAN's objectives activities, and links to the Radiation Emergency Assistance Center/Training S	
(REAC/TS). <u>http://www.arpansa.gov.au/rempan.htm</u>	
GAO PUBLICATIONS RELATED TO BIOTERRORISM	
Homeland Security Homeland Security Responsibility and Accountability for Achiev Goals. (GAO-02-6271, April 11, 2002).	ing National
National Preparedness: Integration of Federal, State, Local, and Private Sector Efforts an Effective National Strategy for Homeland Security (GAO-02-6211, April 1	
Homeland Security: Progress Made, More Direction and Partnership Sought (GAO-0 12, 2002).	2-4901, March
Homeland Security: Challenges and Strategies in Addressing Short- and Long-Term Needs (GAO-02-1601, November 7, 2001).	National
Homeland Security: A Risk Management Approach Can Guide Preparedness Efforts 2081, October 31, 2001).	(GAO-02-
73	

Homelan	d Security: Need to Consider VA's Role in Strengthening Federal Preparedness (GAO-02-1451, October 15, 2001).
Homelan	d Security: Key Elements of a Risk Management Approach (GAO-02-1501, October 12, 2001).
	d Security: A Framework for Addressing the Nation's Issues (GAO-01-11581, September 1, 2001).
a	ng Terrorism Combating Terrorism Intergovernmental Cooperation in the Development of National Strategy to Enhance State and Local Preparedness (GAO-02-5501, April 2, 2002).
	ng Terrorism: Enhancing Partnerships Through a National Preparedness Strategy (GAO- 12-5491, March 28, 2002).
	ng Terrorism: Critical Components of a National Strategy to Enhance State and Local Preparedness (GAO-02-5481, March 25, 2002).
	ng Terrorism: Intergovernmental Partnership in a National Strategy to Enhance State and Local Preparedness (GAO-02-5471), March 22, 2002).
Combatir	ng Terrorism: Key Aspects of a National Strategy to Enhance State and Local Preparedness (GAO-02-4731, March 1, 2002).
	ng Terrorism: Considerations For Investing Resources in Chemical and Biological Preparedness (GAO-01-162T, October 17, 2001).
	ng Terrorism: Selected Challenges and Related Recommendations (GAO-01-822, eptember 20, 2001).
	ng Terrorism: Actions Needed to Improve DOD's Antiterrorism Program Implementation nd Management (GAO-01-909, September 19, 2001).
	ng Terrorism: Comments on H.R. 525 to Create a President's Council on Domestic Preparedness (GAO-01-555T, May 9, 2001).
	ng Terrorism: Observations on Options to Improve the Federal Response (GAO-01-660T, pri124, 2001).
	ng Terrorism: Comments on Counter terrorism Leadership and National Strategy (GAO- 1-556T, March 27, 2001).
Combatir	g Terrorism: FEMA Continues to Make Progress in Coordinating Preparedness and

	Response GAO-01-15, March 20, 2001).
Co	ombating Terrorism: Federal Response Teams Provide Varied Capabilities: Opportunities Remain to Improve Coordination (GAO-0114, November 30, 2000).
Co	ombating Terrorism: Need to Eliminate Duplicate Federal Weapons of Mass Destruction Training (GAO/NSTAD-00-64, March 21, 2000).
Co	ombating Terrorism: Observations on the Threat of Chemical and Biological Terrorism (GAO/T-NSIAD-00-50, October 20, 1999).
Co	ombating Terrorism: Need for Comprehensive Threat and Risk Assessments of Chemical and Biological Attack (GAO/NSIAD-99-163, September 7, 1999).
Co	ombating Terrorism: Observations on Growth in Federal Programs (GAO/T-NSIAD-99-181, June 9, 1999)
Co	ombating Terrorism: Analysis of Potential Emergency Response Equipment and Sustainment Costs (GAO-NSIAD-99-151, June 9, 1999).
Co	ombating Terrorism: Use of National Guard Response Teams Is Unclear (GAO/NSIAD-99-110, May 21, 1999).
Co	ombating Terrorism: Observations on Federal Spending to Combat Terrorism (GAO/T-NSIAD/GGD-99-107, March 11, 1999).
Co	ombating Terrorism: Opportunities to Improve Domestic Preparedness Program Focus and Efficiency (GAO-NSIAD-99-3, November 12, 1998).
Co	ombating Terrorism: Observations on the Nunn-Lugar-Domenici Domestic Preparedness Program (GAO/T- NSIAD-99-16, October 2, 1998).
Co	ombating Terrorism: Threat and Risk Assessments Can Help Prioritize and Target Program Investments (GAO/NSIAD-98-74, April 9, 1998).
Co	ombating Terrorism: Spending on Government Public Health- Bioterrorism: The Centers for Disease Control and Prevention's Role in Public Health Protection (GAO-02-235T, November 15, 2001).
Bi	oterrorism: Review of Public Health and Medical Preparedness (GAO02-149T, October 10, 2001).
Bi	oterrorism: Public Health and Medical Preparedness (GAO-02-141T, October 10, 2001).
	75

