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REGION 6 LEPC UPDATE

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This month, we will look at OSHA's Global Harmonized System of Classification (GHS), and how it may affect your community. Also, some resources for emergency response, CAMEO updates, Stress, Death, and Rock N' Roll. - Steve and Hilary

Local Government Reimbursement Success Stories



EPA Headquarters has evaluated several applications submitted under the Local Governments Reimbursement Program. Based on the evaluation:

- Beauregard Parish, LA, is eligible for an award of \$ 3,213.00 for costs incurred responding to drug labs in March, and July, 2012.
- Saline County, AR, is eligible for an award of \$ 3,803.86 for costs incurred responding to a drug lab in July, 2012.
- Calcasieu Parish, LA, is eligible for an award of \$ 8,014.41 for costs incurred responding to drug labs in May, 2011 and January, 2012.

OSHA's Updated HazCom Standard -- GHS in Your Community

For those of you who haven't heard, OSHA has revised its Hazard Communication Standard (HCS), aligning it with the United Nations' Globally Harmonized System (GHS) of chemical classification and labeling.

This GHS alignment is an international method of hazard communication, and it standardizing the criteria for classification of chemical hazards, as well as labels and MSDS, across international boundaries.

The GHS was negotiated in a multi-year process by hazard communication experts from many different countries, international organizations, and stakeholder groups. It is based on major existing systems around the world, including OSHA's Hazard Communication Standard and the chemical classification and labeling systems of other US agencies.



Why Change Now?

The original OSHA HAZCOM standard allowed chemical manufacturers and importers to convey information on labels and material safety data sheets in whatever format they choose. OSHA feels that adopting the GHS format will:

- Improve the quality and consistency of hazard information in the workplace
- Improve/standardize chemical information received from other countries
- Reduce trade barriers
- Increase productivity for American businesses who use the HAZCOM standard.

This means that labeling on chemicals which cross international borders will have a harmonious, consistent labeling system across the globe.

What's Really Changing?

Major changes to the Hazard Communication Standard Include:

- **Hazard classification:** Provides specific criteria for classification of health and physical hazards, as well as classification of mixtures.
- **Labels:** Chemical manufacturers and importers will be required to provide a label that includes a **harmonized signal word, pictogram, and hazard statement** for each hazard class and category. Precautionary statements must also be provided.
- **MSDS Changing to SDS** – What we all have been calling Material Safety Data Sheets (MSDS's), have been renamed Safety Data Sheets (SDS's). These SDS will now have a specified and uniform 16-section format.
- **Information and training:** Employers are required to train workers by December 1, 2013 on the new labels elements and safety data sheets format to facilitate recognition and understanding.

Changes on MSDS SDS

The information contained in the SDS is largely the same as the MSDS, except now the SDSs are required to be presented in a consistent user-friendly, 16-section format.

- **Section 1, Identification**
 - Includes product identifier; manufacturer or distributor name, address, phone number; emergency phone number; recommended use; restrictions on use.
- **Section 2, Hazard(s) identification**
 - Includes all hazards regarding the chemical; required label elements.
- **Section 3, Composition/information on ingredients**
 - Includes information on chemical ingredients; trade secret claims.
- **Section 4, First-aid measures**
 - Includes important symptoms/ effects, acute, delayed; required treatment.
- **Section 5, Fire-fighting measures**
 - Lists suitable extinguishing techniques, equipment; chemical hazards from fire.

- **Section 6, Accidental release measures**
 - Lists emergency procedures; PPE; proper methods of containment and cleanup.
- **Section 7, Handling and storage**
 - Lists precautions for safe handling and storage, including incompatibilities.
- **Section 8, Exposure controls/personal protection**
 - Lists OSHA's Permissible Exposure Limits (PELs); Threshold Limit Values (TLVs); appropriate engineering controls; personal protective equipment (PPE).
- **Section 9, Physical and chemical properties**
 - Lists the chemical's characteristics.
- **Section 10, Stability and reactivity**
 - Lists chemical stability and possibility of hazardous reactions.
- **Section 11, Toxicological information**
 - Includes routes of exposure; related symptoms, acute and chronic effects; numerical measures of toxicity.
- **Section 12, Ecological information**
 - Optional under HazCom 2012.
 - Includes ecotoxicity; persistence/degradability; bioaccumulation potential; mobility in soil.
- **Section 13, Disposal considerations**
 - Optional under HazCom 2012.
 - Description of wastes and information on their safe handling and methods of disposal.
- **Section 14, Transport information**
 - Optional under HazCom 2012.
 - Hazardous Materials or Dangerous Goods shipping information according to 49CFR, IATA, etc.
- **Section 15, Regulatory information**
 - Optional under HazCom 2012.
 - Safety, health and environmental regulations specific to the product.
- **Section 16, Other information**

Changes in Labels

The original standard allowed label preparers to convey hazard information in a variety of ways. Under the new GHS standard, each label must contain six specific elements, so that the information conveyed is consistent. The six required elements of a label are:

- Product Identifier
- Manufacturer Information
- Signal Word
- Pictogram
- Hazard Statements
- Precautionary Statements



Introducing the New GHS Pictograms

Always outlined in red. Always black symbol and text on a white background.

 <p>Health Hazard</p> <ul style="list-style-type: none"> • Carcinogen • Mutagenicity • Reproductive toxicity • Respiratory sensitizer • Target organ toxicity • Aspiration toxicity 	 <p>Flame</p> <ul style="list-style-type: none"> • Flammables • Pyrophorics • Self-heating • Emits flammable gas • Self-reactives • Organic peroxides 	 <p>Exclamation Mark</p> <ul style="list-style-type: none"> • Irritant (skin and eye) • Skin sensitizer • Acute toxicity (harmful) • Narcotic effects • Respiratory tract irritant • Hazardous to ozone layer (non-mandatory)
 <p>Gas Cylinder</p> <ul style="list-style-type: none"> • Gases under pressure 	 <p>Corrosion</p> <ul style="list-style-type: none"> • Skin Corrosion/ burns • Eye damage • Corrosive to metals 	 <p>Explosion Bomb</p> <ul style="list-style-type: none"> • Explosives • Self-reactives • Organic peroxides
 <p>Flame Over Circle</p> <ul style="list-style-type: none"> • Oxidizers 	 <p>Environment (Non-mandatory)</p> <ul style="list-style-type: none"> • Aquatic toxicity 	 <p>Skull and Crossbones</p> <ul style="list-style-type: none"> • Acute toxicity (fatal or toxic)

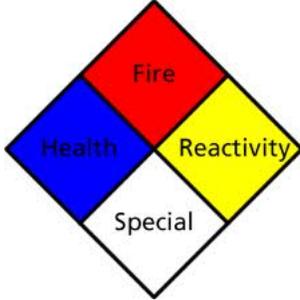
When You *Won't* See a GHS Pictogram

- The red-outlined GHS pictogram labels are not for transportation purposes, and are for labeling containers and SDS.
- GHS pictograms are not required for transport. They should not be displayed on freight containers, road vehicles, or railway cars.
- U.S.DOT placards will still be utilized on freight containers, road vehicles, and railcars.
- DG Shipping - On packages covered by the UN Model Regulations on the Transport of Dangerous Goods: where a transport pictogram appears, a GHS pictogram for the same hazard should not appear.
- For transport, the pictograms prescribed by the UN Model Regulations on the Transport of Dangerous Goods should be used. Pictograms for transportation will have the customary symbol on the upper half, of the label, with the hazard class in the lower half. Like this one:



GHS, the NFPA Fire Diamond, and HMIS Labels

Courtesy of MSDSonline



The OSHA GHS standard does not dis-allow the use of NFPA or HMIS labels. However, it does *not* allow the NFPA or HMIS labels to *substitute* for the standardized GHS label elements such as pictograms and signal words.

A summary offered by MSDSonline explains “When it comes to NFPA/HMIS vs. GHS, it’s important to note that there is one key difference in the way each ranks hazard severity. For GHS labels, the greater the severity, the **lower** the hazard number; whereas with NFPA/HMIS labels, the greater the severity, the **higher** the hazard number.”

When it comes down to it, OSHA is the regulatory body with jurisdiction over hazard communication, and determines the laws of the HazCom standard.

NFPA and HMIS are valuable, but voluntary compliance systems, which may or may not make adjustments to their systems once OSHA publishes their final rule.

Chemical Name	
HEALTH	0
FLAMMABILITY	0
PHYSICAL HAZARD	0
PERSONAL PROTECTION	0

What Does This Mean for LEPCs and Communities?

The new GHS system means that labels and Safety Data Sheets will begin conveying more consistent information, but it is a new system to learn. LEPCs, local first responders, and reporting facilities within the community will all need to understand the new GHS system, before they can maximize the system’s effectiveness.

- Responders On-Scene should know how to recognize GHS standard labels, and know how they are different from the NFPA fire diamond
- Tier II Reporting will begin utilizing SDS sheet
- Transport labels will remain the same, according to USDOT regulations. However, individual containers such as drums and totes will begin sporting the new GHS labels.



When Is All This Happening??

All hazardous materials shipped after June 1st, 2015 must be labeled according to the new standard. However, manufacturers, importers, and distributors may start using the new labeling system in the revised HCS as soon as they like. So your community may already be seeing these new labels and SDSs very soon.

Online Resources for Understanding the GHS Standard

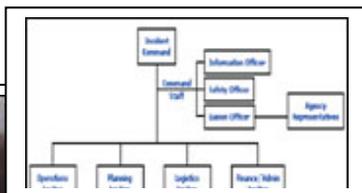
- OSHA has devoted the Hazard Communication portion of their website to understanding the GHS standard. Visit www.osha.gov/dsg/hazcom/ for FAQs, factsheets, and to learn more about how GHS will affect your chemical preparedness program.
- MSDSONline has an extensive GHS Answer Center with lots of useful information, including GHS 101 Q&As and free GHS webinar training (no word yet on if they will change their website to SDSonline). Visit their website at www.msdsolnline.com

PREPAREDNESS RESOURCES FROM OSHA

OSHA has developed a revised webpage for emergency preparedness and response. The site includes a variety of useful tools, including:

- ❖ General Disaster Guidance for Businesses
- ❖ Resources for Response and Disaster Recovery Workers
- ❖ Health & Safety Guidance Documents for Disaster / First Responder Situations
- ❖ Quickcards and Fact Sheets for Disaster and Emergency Response Issues
- ❖ E-Tools on ICS and Emergency Evacuation
- ❖ Disaster Site Worker Outreach Training Program
- ❖ Hazard Information on specific topics like pandemic influenza, radiation, anthrax, chemical hazards/terrorism, and oil spills

Visit <http://www.osha.gov/SLTC/emergencypreparedness/> to explore OSHA's resources offerings for emergency preparedness





Now Available: CAMEO Chemicals 2.4

- Visit the CAMEO Chemicals website version at <http://www.cameochemicals.noaa.gov>
- Visit the CAMEO Chemicals mobile site version at <http://m.cameochemicals.noaa.gov>
- Download the CAMEO Chemicals 2.4 desktop version at <http://www.response.restoration.noaa.gov/cameochemicals>

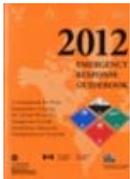
Note: If you're using the desktop version of CAMEO Chemicals 2.1 or later, you can use the automatic update feature to get the latest version. The next time you start your desktop CAMEO Chemicals, it will notice that there is a new version available and give you the chance to auto update. If you say yes, the program will download and install the new version for you automatically. (If you have trouble with the automatic update feature, uninstall CAMEO Chemicals and then manually download and use the CAMEO Chemicals 2.4 installer from the link provided above.)

What's changed in CAMEO Chemicals 2.4?

- Updated data from several sources: AEGs, DOT Hazard Labels, DuPont, EPA List of Lists, NFPA, and the Hazardous Materials Table (49 CFR 172.101)
 - Updated reactivity data to match the Chemical Reactivity Worksheet (CRW) v. 3.0 release
 - Revised the Compatibility Chart and reactivity predictions to match the CRW release
 - Made minor changes and bug fixes
- Regards, The CAMEO Team at EPA and NOAA

PHMSA: More Helpful Resources for Local Emergency Responders

Courtesy of Pipeline and Hazardous Materials Safety Administration (PHMSA)



PHMSA's webpage at <http://www.phmsa.dot.gov/prepare-respond>, contains a wide variety of quick guides, training resources, and handbooks for firefighters and emergency responders. This information supports community response and partnership with multiple agencies.

These guides include a diagram of an emergency decontamination corridor system for firefighters and many links to documents including: the Emergency Response Guidebook (ERG) for your computer and mobile device, the USCG Incident Management Handbook, the National Incident Management System (NIMS) (including the Incident Command System (ICS)), and a Joint Information Center Model.

It also includes links to partnering agencies including FEMA, DOT, and CDC. Also not to be forgotten is information to prevent problems in the first place with links to community protection, call before you dig, and identifying hazardous materials in your community.



JUST ANNOUNCED: Updated for 2013

NRT Joint Information Center (JIC) Model



The 2013 NRT JIC model has been updated with lessons learned and best practices from recent incidents and exercises.

- The NRT JIC Model explains what a JIC is and why a JIC is established
- Outlines the structure, processes, functional positions and roles and responsibilities of JIC personnel
- Includes a series of appendices designed to provide additional reference materials and tools that can support a JIC operation.

Available from the NRT website www.nrt.org under "Guidance, Technical Assistance & Planning > NRT JIC Model".

Stress, Death, and Rock and Roll

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Death comes knocking, but do we hear it? Well, trust me on this one, you can hear it if you've been trained to listen. Firefighters, study, if you will, the causes of on-scene deaths of fire responders and, from what I have seen in statistics and newspaper articles, you will find that heart attack and stroke are right there on top, with heat stress and regular old stress-stress as initiating or complicating factors.



I, personally, see stress as the most debilitating contemporary hazard, not just at scenes, but in everyday life. If I was allowed to teach only one course to improve the health and safety of responders, it would be my Stress Management course, for I believe it would do the most good. Hazmat Safety would be second, but a distant second, for we have fairly well succeeded in promoting hazmat preparedness, planning, and response safety. Obviously, from the statistics for responders and others, we have done a pretty miserable job of stress management training.



During a recent 6200-mile trip to New York state to do Stress Management training at Cobleskill and Rural Hazmat Preparedness training at the Fire Academy in Montour Falls (as well as some mural painting for a retired firefighter and her son outside of Syracuse), I had plenty of road time to reflect on the rationale behind my training methods, in stress, hazmat, and even art. Here are a few key, critical, stress-related things I think everyone, every responder, should know.

First: Stress-stress. Unless you are about to be eaten by a lion, there are very few or no good effects of stress, adrenaline, and other stress chemicals on a human body. As I elicit the mental, physical, emotional, and behavioral effects of stress from class participants (fear, anxiety, headache, muscle ache, forgetfulness, anger, inability to focus, self-medication, increased blood pressure, increased heart rate, erratic breathing, etc., till the list has thirty or forty words), they begin to realize that they already know the all-encompassing ill effects of stress. They themselves make the lists that prove that stress kills.

Second: Heat Stress. Radiant heat is a killer. In class we redefine heat from “energy” to the “ability to do work” to the “ability to do harm” to the “ability to kill firefighters.” Through participant interaction, we heighten their awareness that a fire is a “microwave emitter” and that they, in their bunker gear/turnouts, are in a “microwave oven.” Radiant heat (“ability to kill firefighters”) resonates with two key mammal constituents, water and fat (which come in varying doses in firefighters, eh?). It transfers the invisible, radiant energy from the fire to the firefighter, unseen, unheard, unsmelt, unfelt. In class the participants do the heart-math that shows that heat stress, like stress-stress, kills.

Third: De-stress or Die (early). I have written many articles, given many keynotes, and taught many different classes on stress management. Each of them is based on the concept that one has to personally understand the ill effects of stress; one has to want to counteract them consciously, aggressively, regularly, and purposefully; and one has to implement a regular, daily, effective program of stress management. Period! No if, ands, or buts.

Fourth: Breathe breathe! There are many good, helpful, life-enhancing stress management programs. Mine, as defined in my articles, works for me. But, all are good, and all are better than nothing. One is best for you. But you have to try them, work them, test them, then devise your own amalgam. Yet, I see breathing, deep breathing, cleansing breathing, as being the foundational center of any successful stress management program. Do your homework. Take a breathing or yoga class. Download a You Tube breathing video. Find a great breathing mentor, coach, teacher. But learn to breathe well and live.



So, that’s the Stress, Death part of the title. The Rock and Roll part is this. A bit over two years ago I was in the midst of the grieving period after the death of our son Christian, who succumbed to the effects of Duchenne Muscular Dystrophy. He had had a good life and a good death and the last thing we did together, at his instigation, was our regular breathing exercises.

A few months later, I was having an art show the weekend after Thanksgiving, 2010, and it snowed every day. I was brushing the snow off my windshield and felt “funny.” After finding a doctor to look at me (at the time I had had no doctor and no known health problems), he found nothing and I was sent to a cardiologist, who said, post treadmill test, that I had a “99 percent blockage of my proximal left anterior descending,” and oh, by the way, “we call that the widowmaker.”

Then he said, “Why aren’t you reacting to this information.” I pointed to the Stress Management poster that was behind me, and said, “I teach that course. I monitor my body. I knew something was wrong. And I figure right now is not a good time to run up my blood pressure or heart rate, so I am doing breathing exercises.” He said something about it saving my life, and we went on to an infinitely more costly life-saving heart procedure the next morning.

But, you ask, that’s stress and death, where’s the rock and roll? Well, now it’s eighteen months later, and since my wife and I are ready to move on a bit more, we started dating again with lunches out together, then dinners, then music, and now we have moved on to “rock and roll.” By going dancing to classic rock and roll bands here in Helena twice a week, we have refocused our marriage on us, we get some exercise, we laugh, we see each other face to face, and our stress is better managed.

For we know, now that we have passed from merely mitigating the pervasive negative effects of stress (with breathing and other stress management tools), to using dancing and rock and roll to initiate and encourage the positive, growth-oriented effects of joy! It ain’t rocket science, but it is science, and it is your choice. And nothing beats a little Mustang Sally!

EMERGENCY RESPONSE NUMBERS

Arkansas Dept. of Emergency Management	800-322-4012
Louisiana State Police	877-925-6595
New Mexico State Police	505-827-9126
Oklahoma Dept. of Environmental Quality	800-522-0206
Texas Environmental Hotline	800-832-8224

National Response Center	800-424-8802
EPA Region 6	866-372-7745
CHEMTREC	800-424-9300

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