

**EFCOG Chemical Safety and Lifecycle Management  
Subgroup Spring 2009 Meeting Minutes, Washington, DC**

**Thursday March 12, 2009  
Forrestal Room GJ-015**

**Morning**

Group tour of the EMS Activities at the [Bureau of Engraving and Printing](#) 8:30 a.m.- Noon.  
Meet at the DOE Forrestal Lobby at 7:45 a.m.

**Afternoon**

<b>1:00 - 1:15</b>	Introduction & Welcome	<i>Jim Morgan</i>
<b>1:15 - 2:00</b>	Recap of the Workshop	<i>Steve Harris &amp; Dan Marsick</i>
<b>2:00 - 3:00</b>	Current Project Reviews and Project Selection	<i>Jim Morgan</i>
	- Inventory Accuracy White Paper Project	<i>Leslie Soderquist</i>
	- Technical Publications Project	<i>Helena Whyte &amp; Dave Quigley</i>
	- Chemical Hazard Database Project	<i>Dave Freshwater &amp; Fred Simmons</i>
<b>3:00 - 3:15</b>	<b>Break</b>	
<b>3:15 - 4:15</b>	DOE Chemical Management Handbook Volume 2 Review & Discussion	<i>Jim Morgan &amp; Fred Simmons</i>
<b>4:15 - 4:30</b>	Close	<i>Jim Morgan</i>

**Chemical Safety and Lifecycle Management (CSLM) Subgroup Spring Meeting  
Summary**

**March 12, 2009**

Participants:

Joseph Beres, US Dept of State	Denny Hjeresen, LANL
Mark Brynildson, SNL/CA	Dan Marsick, DOE HS-11
Jayne-Anne, Bond, ATL	Dina, Metz-Siegel, LANL
Randy Castillo, SNL/NM	Jim Morgan, SRNS
Corrie, Clark, ANL	John Peters, BNL
Wayne Davis, WSMS	Dave Quigley, B&W Y-12
Dave Freshwater, DOE NA-41	Timothy Roberts, LBNL
Steve Harris, LLNL	Fred Simmons, SRNS
Jeffrey Hieb, CH2M Hill PRC	Bill Von Holle, DFNSB

**3/12/2009**

**1. Welcome, - Jim Morgan, SRNS, EFCOG CSLM Subgroup Chair**

Jim Morgan, welcomed participants to the semi-annual meeting of the EFCOG CSLM Subgroup and each participant introduced themselves. Jim also provided a recap of the DOE CSTC/EFCOG CSLM Workshop just concluded (3/10/09 and 3/11/09) and led a discussion on the workshop. Comments are summarized below.

Some of the general comments were that the workshop included lots of green topics. It was very successful, well coordinated and provided a lot of interesting information and useful discussion even though Mark Brynildson exceeded his quota of questions in the Workshop.

Additional comments include:

- Concurrent meetings prevented some information exchange. Summaries of subgroups near the end of the workshop could help to improve information exchange between groups.
- Repeat topics such as the Globally Harmonized System for Hazard Communication (GHS) are good to include in the workshop if real change occurs since the last workshop presentation.
- The Workshop summary that will be published on-line or e-mailed should be distributed to all EFCOG ES&H Subgroups and other potentially interested EFCOG subgroups outside of the ES&H group.

-A Point-of-Contact for each subgroup needs to be identified for workshop logistics such as changing rooms if too small to better coordinate with the DOE Workshop Coordinator.

-Workshop evaluation sheets need to be returned to the DOE workshop coordinator, Dan Marsick to facilitate the feedback and improvement process. Most, if not all presentations will be on-line soon ([http://www.hss.energy.gov/HealthSafety/WSHP/chem\\_safety/ws2009/](http://www.hss.energy.gov/HealthSafety/WSHP/chem_safety/ws2009/)) and Dan will also make available, by request, a DVD of the workshop. Contact Dan Marsick for more information ([dan.marsick@eh.doe.gov](mailto:dan.marsick@eh.doe.gov))

-Video conferencing should be continued as it saves ~\$2000/person in travel expenses. Attendance sheets should also be completed in the field video conference rooms to better identify additional interested personnel in the complex.

-There was some discussion on the length of the workshop. Was two and a half days plus the half day tour the appropriate length for the workshop and CSLM meeting? Feedback is encouraged.

-Finally, please participate in the periodic conference calls, provide ideas for topics at the next CSLM meeting scheduled for October 6 and 7, 2009 in Las Vegas and consider presenting your work at the upcoming meetings and workshops. DOE sites do better support participant attendance at meetings if the participant is presenting at the meeting.

Jim also provided an overview of the EFCOG ES&H Group/CSLM Subgroup. He presented the CSLM officers that were voted in or reconfirmed at the last subgroup meeting in Las Vegas, October 2008:

Jim Morgan, CSLM Subgroup Chair  
Steve Harris, CSLM Subgroup Vice-Chair  
Mark Brynildson, CSLM Subgroup Secretary

He briefly described the succession plan to move the officers up every two years or as needed due to a leadership vacancy.

Additional topics discussed include:

### **CSLM Definition**

Chemical Lifecycle and Safety Management – CSLM is the effective application of Integrated Safety Management principles to safely manage chemicals from cradle to grave (planning, acquisition, storage, transportation, use, and disposition) in a manner that protects workers and the general public, maximizes efficiency, and minimizes adverse impacts to the environment.

## **Green Chemical Management Definition**

Green Chemical Management – Green Chemical Management consists of an innovative and efficient chemical management system that encourages the use of the twelve Green Chemistry Principles to promote environmentally friendly and economically sustainable business processes that results in reduced waste, safer outputs, and reduced or eliminated pollution and environmental damage.

## **CSLM Mission & Vision**

- The Chemical Safety and Lifecycle Management (CSLM) team mission is to promote excellence and efficiency in all aspects of CSLM by gathering, evaluating, and sharing performance measures, best management practices, and lessons learned.
- Our vision is for continual improvement of CSLM to minimize impacts to workers, community, and the environment.

## **CSLM Goals and Objectives**

- Benchmark and report current CSLM practices
- Identify and share best practices
- Identify and recommend performance measures
- Develop Points of Contact and resource lists
- Support the function of the DOE Chemical Safety Topical Committee
- Identify related DOE ISM assessment criteria and “Lines of Inquiry” to EFCOG members and provide feedback to DOE
- Interface with other EFCOG groups regarding CSLM principles and requirements
- Identify new and emerging requirements and impacts to CSLM

## **Accomplishments**

- Developed CSLM contact and resource list
- Support of DOE Chemical Safety Website, including adding a hot link to the EFCOG Website
- Ongoing work with identifying benchmarking focus areas, criteria, and methodology
- In March 2009 the CS&LM Subgroup Group co-sponsored the DOE Chemicals Safety Workshop.
- CS&LM Subgroup Group agreed to co-sponsor the DOE Chemical Safety Topical Committee with DOE Office of Worker Protection.
- Numerous publications
- An active network chemical safety and chemical management professionals

## **2. Project Discussion**

### **2A. Discussion on Chemical Hazard Database Strategy – co-lead by Fred Simmons, SRNS and Dave Freshwater, DOE-NA-41**

Fred Simmons presented the “EICID – Electronic Chemical Information Database” project update. The team led by Fred and Dave has looked at the scope, requirements, and process and has concluded that the database must keep only the minimum amount of data due to support costs. A White Paper describing a path forward to obtain further support will be written by the team.

Topics will include:

Project champion and stakeholders

Project scope and requirements

Project process, host site/database, and standardized definitions for NFPA determination, data dictionary, test plan and the migration plan for existing data

### **2B. Technical Publication Presentation, Progress & Discussion – Dave Quigley, Y-12**

This team has been very productive with their publications and has been very successful in advancing Chemical Safety through their work. The CSLM Subgroup will miss Helena Whyte and her wonderful contributions to our group as she retired last year from LANL and will curtail her activities in the CSLM Subgroup. Current paper in review or topics under consideration include NFPA determinations, green chemistry/green chemical management, “why do we continue to have chemical accidents?”, reproductive toxins and over-pressurization of drums.

### **2C. Chemical Inventory Accuracy White Paper Team – Steve Harris, LLNL for Leslie Soderquist, INL**

Steve presented the goals behind a Chemical Inventory Accuracy White Paper and reviewed the origin of the effort and the need for better definition of chemical inventory accuracy expectations in the DOE. The measure of accuracy is basically the degree of agreement between the inventory database location record and the observation of inventory in the chemical storage locations in a facility. Since accuracy expectations are also not well defined in regulations the draft white paper will propose a process to determine appropriate site accuracy expectations. The draft white paper will be further reviewed in the project team and then be circulated for review in the broader CSLM subgroup in the next few months.

### **3. DOEHRS/ESOH Meeting Briefing – Randy Castillo, SNL/NM**

An DOE EESOH Workshop was held February 18 – 19, 2009 at NTS North Las Vegas that focused on Industrial Hygiene, Chemical Management, and Occupation Medicine Database systems. There is a DOE initiative led by Dan Field, DOE/LSO to study the Northrop Grumman EESOH/DOEHRS System for all DOE facilities. Currently, the EESOH/DOEHRS System is mandated for use in the DOD and is various stages of implementation at some DOD sites. The meeting brought together DOE information systems management, ES&H management and SMEs to discuss the issues related to adopting this system for DOE. Using the same system at all DOE sites is appealing to some since standardization is perceived to improve the information management and reporting processes across all DOE sites and reduce overall DOE costs. NTS is already using portions of the system and will likely be the first model to monitor for effectiveness of the system at a DOE site.

A CSLM project team, led by Randy Castillo (SNL/NM) has been approved by the subgroup. Dina Matz-Siegel (LANL), Steve Harris (LLNL), and Tim Roberts (LBNL) have agreed to serve on the project team.

### **4. Current and Future CSLM Projects from the Workshop**

#### **Current Projects**

- 1) Publications Project  
Helena Whyte (co-lead)  
Dave Quigley (co-lead)  
Fred Simmons  
Dan Marsick
  
- 2) Inventory Accuracy Project  
Leslie Soderquist (lead)  
Randy Castillo  
Mark Brynildson  
Judy Fulton  
Steve Harris  
Dan Marsick
  
- 3) Chemical Hazard Database Project  
Fred Simmons (co-lead)  
Dave Freshwater (co-lead)  
Jeff Hieb  
Dave Quigley  
Dan Marsick

## **Future Project Suggestions from the Workshop and Fall Meeting**

- 1) REACH - conference topic and committee
- 2) Leading indicators for Chemical Safety
- 3) Barcoding in difficult environments
  - a. RFID and security
  - b. Classified chemical container tracking
  - c. Outside environments/gas cylinders
- 4) Chemical management requirements flow down to subcontractors
- 5) DOE-wide chemical information and assessment system (DOEHRS/ESOH)
- 6) CSLM web site and/or resource page (see Center of Excellence EFCOG Electrical Safety web pages)
- 7) Coordination with CIAQ (indoor air quality)
- 8) Leadership in Energy and Environmental Design (LEED Program - Green Bldg)
- 9) Chemical lifecycle cost estimating process
- 10) S&H with alternative energy
- 11) Special issues with nanomaterials safety and management
- 12) Chemical management and integration at a multi-contractor site
- 13) Tracking non-traditional chemicals (biomaterials, radioactive sources, explosives, small and large tanks, lead, precious metals, batteries, waste accumulated, HV/AC freons, fire suppression (halons), transformer oil, elevator hydraulic oil, etc.)

## **New Projects Selected at this Meeting**

- 1) Leading Indicators for Chemical Safety  
Jim Morgan (lead)  
Fred Simmons  
Randy Castillo  
Steve Harris  
Dina Matz-Siegel  
John Peters  
Jeff Hieb  
Dave Quigley  
Dan Marsick
  
- 2) DOE-wide chemical information and assessment system (DOEHRS/ESOH)  
Randy Castillo (lead)  
Steve Harris  
Tim Roberts  
Dina Matz-Siegel

John Peters  
Jeff Hieb  
Dave Quigley  
Dan Marsick

## **5. DOE Chemical Management Handbook Overview and Volume 2 Discussion – Jim Morgan, SRNS**

[http://www.hss.energy.gov/healthsafety/wshp/chem\\_safety/](http://www.hss.energy.gov/healthsafety/wshp/chem_safety/)

<http://www.hss.energy.gov/healthsafety/wshp/chem%5Fsafety/DOE-HDBK-1139-1-2006.pdf>

<http://www.hss.energy.gov/healthsafety/wshp/chem%5Fsafety/doe-hdbk-1139-2-2006Aug2006.pdf>

<http://www.hss.energy.gov/healthsafety/wshp/chem%5Fsafety/doe-hdbk-1139-3-2008.pdf>

Jim Morgan provided an overview of the DOE Chemical Management Handbook and led a review of the *DOE Handbook CHEMICAL MANAGEMENT (Volume 2 of 3) Chemical Safety and Lifecycle Management* DOE-HDBK-1139/2-2006 AUGUST 2006

## **6. Closing Discussion – Jim Morgan, SRNS**

### **Fall 2009 EFCOG Semi-Annual EFCOG Meeting – Jim Morgan, SRNS**

Planning for the Fall 2009 CSLM semi-annual meeting at NTS North Las Vegas has begun. A draft agenda will be circulated soon. The primary days are 10/7/2009 & 10/8/2009 for the CSLM meeting. Please plan to attend.

Special thanks go to Dan Marsick for all the hard work and long hours coordinating and co-hosting this workshop. **Well done Dan!**

Thanks also to everyone who helped with any aspect of the Workshop. All your efforts contributed to the success of the workshop and are very appreciated!

### **Meeting Minutes Contact**

Contact Mark Brynildson, Secretary, DOE EFCOG CSLM Subgroup (925) 294-3150, [mebryni@sandia.gov](mailto:mebryni@sandia.gov) if you have any questions about the meeting minutes of attachments.