

Chemical Safety and Lifecycle Management Sub-Group Report October 30-31, 2007

The Chemical Safety and Lifecycle Management (CSLM) Sub-Group met in Las Vegas October 30-31, 2006. Twenty-one attendees representing various DOE/NNSA, DOE contract, sub-contract, and related organizations participated in the one-and-a-half day meeting. Participating organizations included DOE/NNSA, seven national laboratories, the Defense Nuclear Facilities Safety Board (DNFSB), the Stanford Linear Accelerator Center, Fluor-Daniel Hanford, Savannah River Site, and AlphaTRAC.

The general session was kicked-off with a welcome and overview from the EFCOG Director, John Longenecker, who reviewed the history, purpose, and key elements of the EFCOG organization. Jim Morgan, CSLM Chairperson, followed the general session with a welcome to the Sub-Group. A series of CSLM project reports and updates followed, including a report out on the recent chemical inventory benchmarking survey presented by Leslie Soderquist (Idaho National Lab) ([See Attachment 1](#)). There was excellent discussion regarding benchmarking survey findings and results, and where to go from here. The Group decided that a task team should be composed (Leslie to chair; members to include Mark Brynildson, Kathy Ertell, Judy Fulton, Steve Harris, and John Peters) to develop draft recommendations for applying a graded approach with respect to the frequency and accuracy of conducting chemical inventories. Special thanks to Fred Simmons, SRS, who was not able to make the meeting, but was instrumental in compiling the survey data.

Helena Whyte, LANL, provided a brief update on the progress of technical publications. Her team recently published a paper entitled, *Determining Acute Health Hazard Ratings in the Absence of Applicable Toxicological Data*, in the November, 2007 issue of Journal of Occupational Hygiene. A second technical paper, *Chemical Storage: Myth and Reality*, is currently pending publication in an upcoming edition of the Journal of Health and Safety. Jim Morgan followed Helena's update with a description of the soon to be published Chemical Safety Handbook, Volume III revisions, including an

appendix relating to building and fire codes, a section on 10 CFR 851 provisions, and updated NFPA citations ([See Attachment 2](#)). Dan Marsick spoke about the upcoming EFCOG/CSLM Chemical Safety Workshop scheduled for March 4-6, 2008, which will include the latest update on implementation of the Global Harmonization Standard.

The Group was provided with an update to EO 13423 implementation and told to expect revisions to DOE O 450.1 to be promulgated by December, with potential implications to several EFCOG Groups (See Attachments [3](#) and [4](#)). One CSLM-related issue related to the Order will be a January 24, 2008 requirement for DOE to develop written goals and necessary support actions to reduce the release and use of toxic/hazardous chemicals. There was discussion on how best to coordinate on this issue; Josh Silverman, DOE-HQ, will lead a task team (Leslie Soderquist, Dave Quigley, and Jim Morgan) to develop implementation guidance and coordinate CSLM input with the Environmental Sub-Group.

In the afternoon session, Jim Morgan, with support from Dave Freshwater, led a discussion regarding the proposal to sponsor a DOE-wide Chemical Hazard Database, and the strategy for recommending support and adoption by the Department. Jim volunteered Fred Simmons to work with a third task team composed of Kathy Ertell, Dave Freshwater, Steve Harris, Jeff Hieb, and Dave Quigley to draft a white paper proposal for DOE outlining the project purpose, objectives, and how the system will be maintained.

Mark Brynildson, Sandia National Lab (SNL)-California, concluded the day with his presentation on the use of the SNL Chemical Information System to accomplish strategic hazard reductions (i.e. reduced hazardous material inventory quantities) in response to emergency preparedness requirements and a desire to return to the base program identified in DOE O 151.1C ([See Attachment 5](#)).

The half-day session on Wednesday included a series of formal and informal presentations, along with roundtable discussions, regarding the disposition of unneeded chemicals at several of the sites (Attachments [6](#) and [7](#)).

In summary, the CSLM Sub-Group session was successfully concluded with several action items and Group consensus on new initiatives, including a desire to follow up with recommendations on applying a graded approach to chemical inventory management, the task team to develop DOE O 450.1 implementation guidance, and the effort to draft a white paper proposal for DOE consideration and sponsorship of a complex-wide chemical hazard database. In addition, the Group will continue to pursue publication of technical papers in peer-reviewed journals, and is taking an active role in sponsoring the upcoming EFCOG/CSLM Chemical Safety Workshop. Activity sheets for all identified tasks were drafted and submitted during the Fall meeting.