

The ECOS-DoD Sustainability Work Group, Emerging Contaminants Task Group**Risk Communication Principles****July 2007**

INTRODUCTION

The purpose of this document is to provide information and resources on the issues pertaining to risk communications on Emerging Contaminants (ECs). The document also sets forth the fundamental principles the ECOS-DoD Sustainability Work Group believes should be followed by both state and federal stakeholders in conducting risk communication, whether at the internal, interagency, or public level. It is the view of the Task Group that these principles should be part of communications decisions at all stages of action following the identification of an EC. Furthermore, the principles represent a starting point for reconciliation should stakeholders disagree on how the risks of a particular EC should be communicated.

This document is organized into three sections: background, principles, and resources. The background section provides information on past EC communications challenges and the mission of the EC Task Group. This is followed by a list of five fundamental risk communication principles supported by the ECOS-DoD Sustainability Work Group. Lastly, in the resources section, the specific principles of good risk communication, a fact sheet template, and a list of applicable communications resources are provided. It is the hope of the Work Group that parties will turn to these resources early in the process of communicating the risks of an EC.

BACKGROUND

The ECOS-DoD Sustainability Work Group was formed in 2004 in an effort to forge partnerships to “exchange information and ideas across state and jurisdictional boundaries and to further solutions to create sustainable bases and ranges in harmony with local communities.”¹ This effort is being applied across two issue areas, each represented by a Task Group: Compatible Use and Sustainability, and Emerging Contaminants. This paper focuses only on the work of the EC Task Group.

The EC Task Group was formed largely in response to past difficulties encountered by state and federal stakeholders in addressing contaminants without promulgated health protection or cleanup standards. In the absence of such standards, parties were sometimes unclear as to the risks posed by a particular contaminant, what level a site should be remediated to, and, in some cases, whether remedial action should be taken at all.

¹ ECOS Resolution 04-8, http://www.ecos.org/files/1192_file_Copy_of_Resolution_04_8.pdf

As an initial step in determining the type of actions the ECs Task Group should undertake to address situations similar to those described above, the Task Group convened a group of over 100 state and federal stakeholders at a forum in November 2005 to help identify the major barriers the States and DoD face in addressing ECs. While many issues were identified, several were prioritized as warranting the Task Group's most immediate attention. EC risk communication was one of these priority issues.

PRINCIPLES

The following five principles represent fundamental concepts that the ECOS-DOD Sustainability Work Group believes should be followed by all stakeholders engaging in EC risk communication. By following these principles and developing policies consistent with them, the Work Group hopes that all parties will improve EC communication/coordination and message clarity to the public, while decreasing conflict at all stages.

- The ECOS-DOD Sustainability Work Group supports the use of effective risk communication techniques to reduce conflicts due to miscommunication and poor communication practices. These techniques strive to reduce miscommunication, and build trust and credibility. Early communications with the public should be applied as soon as practicable following contaminant identification. Specific principles of good risk communication applicable to the communication of EC issues are delineated in the resources section.
- The ECOS-DOD Sustainability Work Group recommends that risk communication specialists be involved in emerging contaminant projects from the time a contaminant's presence is identified on site--not as an after thought. Early involvement of communications professionals on emerging contaminant issues will assist with all levels of communications and reduce the chances of conflict due to miscommunication.
- The ECOS-DOD Sustainability Work Group recommends early coordination between regulatory agencies, DoD, public health and resource agencies for issues on emerging contaminants. This includes sharing drafts of fact sheets, public notices, and other public documents to ensure that each party is aware of the other's position on an issue.
- The ECOS-DOD Sustainability Work Group recognizes that different agencies have different missions that may give rise to different messages to the public. To reduce conflict and confusion in the public arena, the Work Group strongly supports the sharing of information and coordination on the causes of these different messages. The Work Group further recommends early and often sharing of information, and most importantly, before public statements are released.
- The ECOS-DOD Sustainability Work Group recognizes that when addressing emerging contaminant issues, agency positions shift due to new data, information, or technology and that a critical component of good risk communication is articulating to the public when a cleanup level or public health advisory is based on limited, old, or uncertain data or technology. Again, the Work Group

recommends early and often interagency sharing of information and coordination on public information when new information becomes available.

RESOURCES

Specific Principles of Good Risk Communication

Effective risk communication principles are based on establishing trust and credibility and engaging stakeholders in meaningful dialog. These general principles are essential to the EC risk communications principles presented in this paper.

Internal/ interagency communication

When an EC issue arises, the dialog/communication provided by responsible agencies to public stakeholders is dependent upon the information and data that is available. During the early phase of the EC life cycle, all responsible agencies must work together as soon as possible to exchange information and to enable pertinent information be readily available for informed decision making. Internal/interagency communication should also include the development and coordination of messages and communication plans. The information provided to the public should be credible and consistent. To ensure consistency among government entities, monitoring data should be readily available and transparent to all agencies addressing EC issues. This internal/interagency communication is necessary to enable credible and consistent messages.

Potential internal information sharing mechanisms include, but are not limited to, a website and information exchange workshops. A “secure” private website would be an ideal mechanism for responsible agencies to share information and key messages. Information exchange workshops on specific contaminants could be used to address complicated issues in depth when needed.

External/ public communication

Later in the EC lifecycle, it is usually the responsibility of a state environmental/health office to provide information, answer questions and provide leadership on ensuring a community’s health is protected. As mentioned above, the state environmental office or state health protection agency should begin with obtaining and sharing information via interagency mechanisms where possible. The communication by the state office, or any responsible agency, should strive to establish trust and credibility and create a meaningful dialog with stakeholders. The agency should identify and utilize the most effective means of communicating with the public, which may utilize community involvement programs established by DoD components.

A sensitive but important challenge in communicating EC issues is preliminary and changing information. While problematic, it may be beneficial to provide the public with preliminary information as it will enhance trust and credibility, and negate the need for the public to use a Freedom of Information Act request.

As with internal communication mechanism, a website could be one mechanism to provide information to, and receive information from the public regarding EC issues.

Such a public website must be easily found by internet search efforts, be easily understood and run by a credible and independent third party.

Fact Sheet Template

Below, the Task Group has developed a generic fact sheet template to be used by risk communication practitioners in the early stages following the identification of an EC. In reviewing the fact sheet, one overarching theme to bear in mind is the importance of data accuracy. Specifically, it is important to be clear about what we know is scientifically valid and is backed by scientific peer-reviewed data. It is also important to communicate the difference between the findings of a single study (with or without peer review), a small number of peer reviewed studies, and the peer reviewed interpretation of a body of literature. Likewise, it is important to communicate what is known with certainty and what remains uncertain, why, and, ideally, what is being done to account for uncertainties (e.g., default assumptions, uncertainty factors) and what is being done to reduce uncertainties (e.g., more research). When working with uncertain or limited data it is essential to inform the public that the potential risks or standards being used are temporary in nature and are expected to change as new information and better data is generated.

Emerging Contaminant Generic Information Sheet Template

- 1) What is XXXX?
 - Description of chemical, sources/applications, history/development, any common names, appearances, physical state (solid, liquid or vapor under normal conditions), CAS information
- 2) Who might be concerned (sensitive populations) with XXXX and explain why this target population is considered vulnerable?
 - Examples of target populations include pregnant mothers, children, elderly, etc.
- 3) Where may XXXX be found (relate to nearby communities, don't leave generic)?
 - In air, water, soil, consumer products, at home, at work?
- 4) How can I know if XXXX is in my water, soil, or air?
 - Test available, real time, certified laboratories
- 5) What may happen to XXXX in the environment?
 - How released, persistence, breakdown products, fate and transport properties
- 6) How might I be exposed to XXXX?
 - Point of contact, ingestion (drinking, eating, unintentional ingestion), inhalation, absorption through skin, injection

- 7) How may XXXX affect my health?
- What are the signs and symptoms?
 - Presence of chemical does not equal exposure
 - Exposure does not equal disease
 - Dose, duration, frequency (what is safe level of exposure?)
 - Endpoints: cancer, organ systems, reproductive, developmental
 - Half-life, can XXXX be removed from the body?
 - Low grade chronic exposure vs. high impact acute exposure
- 8) What are the possible environmental impacts from XXXX?
- Ecological impacts
 - Impacts to nearby populations/resources
- 9) Are there specific symptoms of the effects of XXXX? Is there a medical remedy for XXXX?
- Seek medical advice if you have any symptoms that you think may be related to chemical exposure
- 10) How may I reduce my exposure to XXXX?
- 11) How might I remove XXXX from soil/water/air?
- 12) Are there any guidelines or standards for XXXX to protect people's health?
- 13) What is (the agency) doing to address concerns related to XXXX?
- 14) Where can I get more information?
- 15) Contacts:

Risk Communication Resources

Primer on Health Risk Communication Principles and Practices, Agency on Toxic Substances and Disease Registry, last updated 06/25/01:
<http://www.atsdr.cdc.gov/HEC/primer.html>

Improving Risk Communication, National Research Council, National Academies Press, 1989: <http://darwin.nap.edu/books/0309039436/html>

The Determinants of Trust and Credibility in Environmental Risk Communication: An Empirical Study, Peters, Richard G., et. al; Risk Analysis. 1997; 17(1):43-54. available at: <http://www.centerforriskcommunication.com/pubs/crc-p2.pdf>

Communication in Risk Situations, Responding to the communication challenges posed by bioterrorism and emerging infectious diseases, Association of State and Territorial Health Officials, 2002, available at:

<http://www.astho.org/pubs/ASTHO%20Risk%20Communication%20e-Workbook.htm>

A Case Study of Health Risk Communication: What the Public Wants and What it Gets, Trauth, Jeannette M., Risk, 1994, vol 15, available at:

<http://www.piercelaw.edu/risk/vol5/winter/trauth.htm>

Links to Additional Resources:

<http://environmentalrisk.cornell.edu/ERAP/RiskLinks.cfm>

<http://www.bt.cdc.gov/chemical>

http://www.astho.org/?template=risk_communication.html

<http://chppm-www.apgea.army.mil/risk/whatis.aspx>

<http://riskcommunication.samhsa.gov/page11.htm>