Great Lakes/Chemtura leads the methyl bromide industry in product stewardship, technical service, and product defense.

Regulatory pressures on methyl bromide are increasing. Adherence to the highest levels of product stewardship has never been more important.

**Active product defense, product stewardship, and exceptional applicator performance are the keys to continued availability of Meth-O-Gas®**
What is Product Stewardship?

- The integration of health, safety, environmental, and regulatory considerations into each aspect of the product life cycle, from design and manufacture to distribution, sales, use, and ultimate disposal.

Why are product stewardship programs so important?

- It’s the right thing to do
- Commitment to safety
  - Meth-O-Gas® products used safely and in accordance with the label.
Benefits of Product Stewardship

• Safer products and packaging
• Safer, more informed use
• Minimize regulatory intervention by reducing incidents
• Provide value added product
Product Stewardship Expectations, Responsibilities, and Performance standards

- **Provide**
  - Highest quality product and service.
  - Safest container available.
  - Clear and accurate health and safety information.

- **Understand**
  - The hazards and requirements associated with our products.
  - How to safely handle the product.

- **Train employees and customers**
  - Follow all label directions.
  - Use safe work practices.
  - Properly store and ship Meth-O-Gas® products.
  - Communicate product knowledge to users.
  - Implement effective product stewardship programs.
Elements of Product Stewardship

- Safety
- Training
- Regulatory compliance
  - Customer, supplier and packaging location audits
  - Distributor and Repackaging agreements
- Quality control/Product Quality and traceability
- Packaging
- Documentation
- Communication
- Customer and technical service
- Recovery/Recapture
- Security
- Help line in case of emergencies
Product Stewardship Partnership

- Documentation for traceability
- All applicators certified
- Written Standard Operating Procedures (SOPs)
- Complete Meth-O-Gas® training

- Compliance w/ all federal, state & local regulations
- Commercial Drivers Licenses (CDLs) for all applicators with HAZMAT Endorsements

- Infrastructure of support
- Stewardship
- Training & audits

Great Lakes Chemical Corporation
A Chemtura Company
Product Quality

- Great Lakes El Dorado produces bulk methyl bromide
  - ISO 9001 compliant manufacturing facility
  - Full-service QC laboratory/QA
- Recordkeeping/Traceability of contents of each cylinder
- Certificate of analysis on each lot
Package Quality

• Dedicated cylinders for 100% product
• Weather-resistant labels
  ▪ New sleeve labels for Meth-O-Gas® 100
• Cylinders
  ▪ Maintenance Program
  ▪ Appearance Standards for repackagers
  ▪ Return Policy
  ▪ Cylinder tracking
Communication

- Fumigants Website
  - www.chemtura.com/fumigants
- Fumigation Guide
- Container Management Guide
- Specimen Labels/MSDS
- Meth-O-Gas® Applicator Training Manual
- Fumigation Fax e-newsletter
- Complaint/non-conformance management system
- Full-time technical support
  - 24/7 phone hotline
Recovery/Recapture

- Recovery vessels
- Recapture systems
Security Enhancements

Manufacturers

• Consolidation of bulk vessels within facility limits
• Increased security for off-site storage
• Monitoring of vessel movements and locations
• More frequent communication with repackagers and distributors
• Security plans according to DOT and DHS requirements

Distributors

• Consolidation of inventory at fewer locations
• Reduced inventory at user locations
• Stringent inventory monitoring
• Improved container tracking systems
• Heightened facility security
Meth-O-Gas®

Training

• Distributor/Repackager training
• Emergency response training
• Meth-O-Gas® Applicator Training
Meth-O-Gas®

Meth-O-Gas® Applicator Education

• Meth-O-Gas® Training required prior to purchase of product.
• Initial and Refresher Training taken online.
• Training site is controlled access.
• Must pass 50 question test to complete training requirement and qualification to purchase products.
• Training is good for 2 years.
Meth-O-Gas®

Meth-O-Gas® Applicator Education Program

- Health, Safety and Environmental Information
- Regulations
- Transportation and Safety Regulations
- Detection Devices
- Personal Protective Equipment
- Safe Storage, Handling, and Disposal
- Emergency Response
- Fumigation Process
Regulatory Compliance

- EPA
  - FIFRA, EPCRA, CERCLA
  - CAA (Montreal Protocol compliance)
- OSHA
- DOT

Reporting requirements vary by regulation and type of situation.

- Recordkeeping
  - Required by pesticide regulations; states may have additional requirements.
  - Required by methyl bromide CAA regs
The Label is the Law

- Methyl bromide is a Restricted Use Pesticide
- “It is a violation of federal and state law to use a pesticide in a manner inconsistent with its labeling.”
- Container labels and supplemental label booklets are legal documents.
- Information
  - Product identity and information
  - Directions for use
    - Method of application (Container/trailer, chamber, or tarp.)
    - Treatment site
    - Commodity
    - Pests Controlled
    - Dosage Requirements
    - Tolerances
  - Safety information
  - Environmental hazards
What defines a successful fumigation?

• Safety first
  ▪ Methyl bromide does not distinguish between insects, rodents, nematodes, or humans.

• Effective treatment – Fumigation Process
  ▪ Sealing the treatment site
  ▪ Eliminate/minimize barriers to penetration of the gas
  ▪ Using the correct dose and exposure period
  ▪ Following all label directions/requirements
  ▪ Temperature and other weather/atmospheric conditions
Meth-O-Gas®

Fumigation Process

1. Site Evaluation
2. Advance Notification
3. Site Preparation
4. Securing the Fumigation Site
5. Fumigation
6. Clearing for Re-entry
Plan Safety into each step of the Fumigation Process

- Planning and Preparation
- Read and follow label directions.
- Use checklists
- Teamwork and Communication
- Training
- Follow all safety precautions and requirements
- Personal Protective Equipment/Detection devices
- Monitor Meth-O-Gas® air concentrations during fumigation and clearing for re-entry.
- Recordkeeping
- Emergency response
- Report all incidents/accidents
If in doubt, ask us!

• Technical Service  1-800-378-9451 (24/7)
• Emergency Response 1-800-949-5167 (24/7)
• Customer Service 1-800-428-7947
• Odyssey logistics (cylinder return) 1-866-816-0823
• Website:  www.chemtura.com/fumigants