# SAFETY DATA SHEET



## 1. Identification

**Product identifier Gas Samples Mixture-601** 

Other means of identification

M-PP9M2

Recommended use For Laboratory Use Only

**Recommended restrictions** None known.

Manufacturer/Importer/Supplier/Distributor information

Manufacturer

Company name Chem Service, Inc. 660 Tower Lane **Address** 

West Chester, PA 19380

**United States** 

Toll Free 800-452-9994 **Telephone** Direct

610-692-3026

Website www.chemservice.com E-mail info@chemservice.com

Chemtrec US 800-424-9300 **Emergency phone number** 

> Chemtrec outside US +1 703-527-3887

# 2. Hazard(s) identification

Physical hazards Flammable liquids Category 2 Health hazards Acute toxicity, oral Category 3 Acute toxicity, dermal Category 3 Acute toxicity, inhalation Category 3 Serious eye damage/eye irritation Category 2A Reproductive toxicity Category 2 Specific target organ toxicity, single exposure Category 1 Specific target organ toxicity, repeated Category 1

exposure

**Environmental hazards** Hazardous to the aquatic environment, acute Category 2

hazard

Hazardous to the aquatic environment, Category 2

long-term hazard

**OSHA** defined hazards Not classified.

Label elements



Signal word Danger

**Hazard statement** Highly flammable liquid and vapor. Toxic if swallowed. Toxic in contact with skin. Causes serious eye irritation. Toxic if inhaled. Suspected of damaging fertility or the unborn child. Causes damage to organs. Causes damage to organs through prolonged or repeated exposure. Toxic to aquatic

life. Toxic to aquatic life with long lasting effects.

**Precautionary statement** Prevention

Obtain special instructions before use. Do not handle until all safety precautions have been read and understood. Keep away from heat/sparks/open flames/hot surfaces. - No smoking. Use only outdoors or in a well-ventilated area. Keep container tightly closed. Ground/bond container and receiving equipment. Use explosion-proof electrical/ventilating/lighting equipment. Use only non-sparking tools. Take precautionary measures against static discharge. Do not breathe mist or vapor. Wash thoroughly after handling. Do not eat, drink or smoke when using this product. Avoid release to the environment. Wear protective gloves/protective clothing/eye protection/face protection.

Response

If swallowed: Immediately call a poison center/doctor. If on skin (or hair): Take off immediately all contaminated clothing. Rinse skin with water/shower. If inhaled: Remove person to fresh air and keep comfortable for breathing. If in eyes: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing. Call a poison center/doctor. Specific treatment (see this label). Rinse mouth. If eye irritation persists: Get medical

advice/attention. Take off immediately all contaminated clothing and wash it before reuse. In case of fire: Use appropriate media to extinguish. Collect spillage.

Storage

Store in a well-ventilated place. Keep container tightly closed. Store in a well-ventilated place.

Keep cool. Store locked up.

Disposal Hazard(s) not otherwise classified (HNOC)

Supplemental information

Dispose of contents/container in accordance with local/regional/national/international regulations.

Static accumulating flammable liquid can become electrostatically charged even in bonded and grounded equipment. Sparks may ignite liquid and vapor. May cause flash fire or explosion.

0.02% of the mixture consists of component(s) of unknown acute oral toxicity. 0.1% of the mixture consists of component(s) of unknown acute dermal toxicity. 99.98% of the mixture consists of component(s) of unknown acute hazards to the aquatic environment. 99.96% of the mixture consists of component(s) of unknown long-term hazards to the aquatic environment.

# 3. Composition/information on ingredients

#### **Mixtures**

| Chemical name           | Common name and synonyms | CAS number | %    |
|-------------------------|--------------------------|------------|------|
| Methanol                |                          | 67-56-1    | >98  |
| Chloroethane            |                          | 75-00-3    | 0.02 |
| Dichlorodifluoromethane |                          | 75-71-8    | 0.02 |
| Methyl bromide          |                          | 74-83-9    | 0.02 |
| Methyl chloride         |                          | 74-87-3    | 0.02 |
| Trichlorofluoromethane  |                          | 75-69-4    | 0.02 |
| Vinyl chloride          |                          | 75-01-4    | 0.02 |

<sup>\*</sup>Designates that a specific chemical identity and/or percentage of composition has been withheld as a trade secret.

#### 4. First-aid measures

Inhalation

Remove victim to fresh air and keep at rest in a position comfortable for breathing. Oxygen or artificial respiration if needed. Do not use mouth-to-mouth method if victim inhaled the substance. Induce artificial respiration with the aid of a pocket mask equipped with a one-way valve or other proper respiratory medical device. Call a POISON CENTER or doctor/physician.

Skin contact

Take off immediately all contaminated clothing. Rinse skin with water/shower. Call a POISON CENTER or doctor/physician if you feel unwell. Get medical attention if irritation develops and persists.

Eye contact

Immediately flush eyes with plenty of water for at least 15 minutes. Remove contact lenses, if present and easy to do. Continue rinsing. Get medical attention if irritation develops and persists.

Ingestion

Call a physician or poison control center immediately. Rinse mouth. Do not induce vomiting without advice from poison control center. If vomiting occurs, keep head low so that stomach content doesn't get into the lungs. Do not use mouth-to-mouth method if victim ingested the substance. Induce artificial respiration with the aid of a pocket mask equipped with a one-way valve or other proper respiratory medical device.

Most important symptoms/effects, acute and delayed

Symptoms may include stinging, tearing, redness, swelling, and blurred vision. Prolonged exposure may cause chronic effects.

Indication of immediate medical attention and special treatment needed

Provide general supportive measures and treat symptomatically. Thermal burns: Flush with water immediately. While flushing, remove clothes which do not adhere to affected area. Call an ambulance. Continue flushing during transport to hospital. In case of shortness of breath, give oxygen. Keep victim warm. Keep victim under observation. Symptoms may be delayed.

**General information** 

Take off immediately all contaminated clothing. IF exposed or concerned: Get medical advice/attention. Ensure that medical personnel are aware of the material(s) involved, and take precautions to protect themselves. Wash contaminated clothing before reuse.

# 5. Fire-fighting measures

Suitable extinguishing media

Alcohol resistant foam. Water fog. Carbon dioxide (CO2). Dry chemical powder, carbon dioxide, sand or earth may be used for small fires only.

Unsuitable extinguishing media

Do not use water jet as an extinguisher, as this will spread the fire.

# Specific hazards arising from the chemical

Vapors may form explosive mixtures with air. Vapors may travel considerable distance to a source of ignition and flash back. This product is a poor conductor of electricity and can become electrostatically charged. If sufficient charge is accumulated, ignition of flammable mixtures can occur. To reduce potential for static discharge, use proper bonding and grounding procedures. This liquid may accumulate static electricity when filling properly grounded containers. Static electricity accumulation may be significantly increased by the presence of small quantities of water or other contaminants. Material will float and may ignite on surface of water. During fire, gases hazardous to health may be formed.

Special protective equipment and precautions for firefighters

Self-contained breathing apparatus and full protective clothing must be worn in case of fire.

Fire-fighting equipment/instructions

In case of fire and/or explosion do not breathe fumes. Move containers from fire area if you can do so without risk.

Specific methods
General fire hazards

Use standard firefighting procedures and consider the hazards of other involved materials.

Highly flammable liquid and vapor.

## 6. Accidental release measures

Personal precautions, protective equipment and emergency procedures Immediately evacuate personnel to safe areas. Keep unnecessary personnel away. Keep people away from and upwind of spill/leak. Keep out of low areas. Eliminate all ignition sources (no smoking, flares, sparks, or flames in immediate area). Wear appropriate protective equipment and clothing during clean-up. Do not breathe mist or vapor. Fully encapsulating, vapor protective clothing should be worn for spills and leaks with no fire. Do not touch damaged containers or spilled material unless wearing appropriate protective clothing. Ventilate closed spaces before entering them. Use appropriate containment to avoid environmental contamination. Transfer by mechanical means such as vacuum truck to a salvage tank or other suitable container for recovery or safe disposal. Local authorities should be advised if significant spillages cannot be contained. For personal protection, see section 8 of the SDS.

Methods and materials for containment and cleaning up

Eliminate all ignition sources (no smoking, flares, sparks, or flames in immediate area). Take precautionary measures against static discharge. Use only non-sparking tools. Keep combustibles (wood, paper, oil, etc.) away from spilled material. This material is classified as a water pollutant under the Clean Water Act and should be prevented from contaminating soil or from entering sewage and drainage systems which lead to waterways.

Large Spills: Stop the flow of material, if this is without risk. Dike the spilled material, where this is possible. Cover with plastic sheet to prevent spreading. Use a non-combustible material like vermiculite, sand or earth to soak up the product and place into a container for later disposal. Following product recovery, flush area with water.

Small Spills: Wipe up with absorbent material (e.g. cloth, fleece). Clean surface thoroughly to remove residual contamination.

**Environmental precautions** 

Never return spills to original containers for re-use. For waste disposal, see section 13 of the SDS. Avoid release to the environment. Contact local authorities in case of spillage to drain/aquatic environment. Prevent further leakage or spillage if safe to do so. Do not contaminate water. Avoid discharge into drains, water courses or onto the ground. Use appropriate containment to avoid environmental contamination.

# 7. Handling and storage

Precautions for safe handling

Obtain special instructions before use. Do not handle until all safety precautions have been read and understood. Vapors may form explosive mixtures with air. Do not handle, store or open near an open flame, sources of heat or sources of ignition. Protect material from direct sunlight. Minimize fire risks from flammable and combustible materials (including combustible dust and static accumulating liquids) or dangerous reactions with incompatible materials. Handling operations that can promote accumulation of static charges include but are not limited to: mixing, filtering, pumping at high flow rates, splash filling, creating mists or sprays, tank and container filling, tank cleaning, sampling, gauging, switch loading, vacuum truck operations. Take precautionary measures against static discharges. All equipment used when handling the product must be grounded. Use non-sparking tools and explosion-proof equipment. Do not breathe mist or vapor. Do not taste or swallow. Avoid contact with skin. Avoid contact with eyes. Avoid contact during pregnancy/while nursing. Avoid prolonged exposure. Avoid contact with clothing. Use only outdoors or in a well-ventilated area. Wear appropriate personal protective equipment. Observe good industrial hygiene practices. When using, do not eat, drink or smoke. Wash hands thoroughly after handling. Wash contaminated clothing before reuse. Avoid release to the environment. Do not empty into drains.

For additional information on equipment bonding and grounding, refer to the Canadian Electrical Code in Canada, (CSA C22.1), or the American Petroleum Institute (API) Recommended Practice 2003, "Protection Against Ignitions Arising out of Static, Lightning, and Stray Currents" or National Fire Protection Association (NFPA) 77, "Recommended Practice on Static Electricity" or National Fire Protection Association (NFPA) 70, "National Electrical Code".

# Conditions for safe storage, including any incompatibilities

Store locked up. Keep away from heat, sparks and open flame. Prevent electrostatic charge build-up by using common bonding and grounding techniques. Avoid spark promoters. Eliminate sources of ignition. Ground/bond container and equipment. These alone may be insufficient to remove static electricity. Store in original tightly closed container. Store in a cool, dry place out of direct sunlight. Store in a well-ventilated place. Refrigeration recommended. Store away from incompatible materials (see Section 10 of the SDS). Keep in an area equipped with sprinklers.

# 8. Exposure controls/personal protection

#### Oc

| US. OSHA Specifically Regulated Su<br>Components   | Type       | Value                |
|--|------------|----------------------|
| Vinyl chloride (CAS<br>75-01-4)                    | STEL       | 5 ppm                |
| *  | TWA        | 1 ppm                |
| JS. OSHA Table Z-1 Limits for Air Co<br>Components | Type       | Value                |
| Chloroethane (CAS                                  | PEL        | 2600 mg/m3           |
| 75-00-3)   |            | 1000 ppm             |
| Dichlorodifluoromethane<br>(CAS 75-71-8)           | PEL        | 4950 mg/m3           |
| Mathamal (CAC C7 FC 4)                             | DEL        | 1000 ppm             |
| Methanol (CAS 67-56-1)                             | PEL        | 260 mg/m3<br>200 ppm |
| Methyl bromide (CAS                                | Ceiling    | 80 mg/m3             |
| 74-83-9)   |            | 20 ppm               |
| Trichlorofluoromethane                             | PEL        | 5600 mg/m3           |
| (CAS 75-69-4)                                      | . ==       | 1000 ppm             |
| US. OSHA Table Z-2 (29 CFR 1910.10                 | 000)       |                      |
| Components   | Туре       | Value                |
| Methyl chloride (CAS<br>74-87-3)                   | Ceiling    | 200 ppm              |
| ,  | TWA        | 100 ppm              |
| US. ACGIH Threshold Limit Values                   | _          |                      |
| Components   | Туре       | Value                |
| Chloroethane (CAS<br>75-00-3)                      | TWA        | 100 ppm              |
| Dichlorodifluoromethane<br>(CAS 75-71-8)           | TWA        | 1000 ppm             |
| Methanol (CAS 67-56-1)                             | STEL       | 250 ppm              |
| Mothyl bromido (CAS                                | TWA        | 200 ppm              |
| Methyl bromide (CAS<br>74-83-9)                    | TWA        | 1 ppm                |
| Methyl chloride (CAS<br>74-87-3)                   | STEL       | 100 ppm              |
|  | TWA        | 50 ppm               |
| Trichlorofluoromethane<br>(CAS 75-69-4)            | Ceiling    | 1000 ppm             |
| Vinyl chloride (CAS<br>75-01-4)                    | TWA        | 1 ppm                |
| US. NIOSH: Pocket Guide to Chemic                  | al Hazards |                      |
| Components   | Туре       | Value                |
| Dichlorodifluoromethane<br>(CAS 75-71-8)           | TWA        | 4950 mg/m3           |
| Mothanal (CAS 67 FG 1)                             | STEI       | 1000 ppm             |
| Methanol (CAS 67-56-1)                             | STEL       | 325 mg/m3<br>250 ppm |
|  | TWA        | 260 mg/m3            |
|  |            | 200 ppm              |
|  | <b>.</b>   |                      |
| Trichlorofluoromethane<br>(CAS 75-69-4)            | Ceiling    | 5600 mg/m3           |

## **Biological limit values**

## **ACGIH Biological Exposure Indices**

| Components             | Value   | Determinant | Specimen | Sampling Time |  |
|------------------------|---------|-------------|----------|---------------|--|
| Methanol (CAS 67-56-1) | 15 ma/l | Methanol    | Urine    | *             |  |

<sup>\* -</sup> For sampling details, please see the source document.

#### **Exposure guidelines**

#### US - California OELs: Skin designation

Chloroethane (CAS 75-00-3)

Methanol (CAS 67-56-1)

Methyl bromide (CAS 74-83-9)

Vinyl chloride (CAS 75-01-4)

Can be absorbed through the skin.

Can be absorbed through the skin.

Can be absorbed through the skin.

US - Minnesota Haz Subs: Skin designation applies

Methanol (CAS 67-56-1)

Methyl bromide (CAS 74-83-9)

Skin designation applies.

Skin designation applies.

US - Tennesse OELs: Skin designation

Methanol (CAS 67-56-1)

Methyl bromide (CAS 74-83-9)

Can be absorbed through the skin.

Can be absorbed through the skin.

**US ACGIH Threshold Limit Values: Skin designation** 

Chloroethane (CAS 75-00-3)

Methanol (CAS 67-56-1)

Methyl bromide (CAS 74-83-9)

Methyl chloride (CAS 74-87-3)

Can be absorbed through the skin.

US NIOSH Pocket Guide to Chemical Hazards: Skin designation

Methanol (CAS 67-56-1)

Can be absorbed through the skin.

US. OSHA Table Z-1 Limits for Air Contaminants (29 CFR 1910.1000)

Methyl bromide (CAS 74-83-9)

Can be absorbed through the skin.

Appropriate engineering

controls

Explosion-proof general and local exhaust ventilation. Good general ventilation (typically 10 air changes per hour) should be used. Ventilation rates should be matched to conditions. If applicable, use process enclosures, local exhaust ventilation, or other engineering controls to maintain airborne levels below recommended exposure limits. If exposure limits have not been established, maintain airborne levels to an acceptable level. Provide eyewash station.

#### Individual protection measures, such as personal protective equipment

**Eye/face protection** Wear eye/face protection. Wear safety glasses with side shields (or goggles).

Skin protection

Hand protection Wear protective gloves.

Other Wear appropriate chemical resistant clothing.

**Respiratory protection** If engineering controls do not maintain airborne concentrations below recommended exposure

limits (where applicable) or to an acceptable level (in countries where exposure limits have not

been established), an approved respirator must be worn.

**Thermal hazards** Wear appropriate thermal protective clothing, when necessary.

General hygiene considerations

When using, do not eat, drink or smoke. Always observe good personal hygiene measures, such as washing after handling the material and before eating, drinking, and/or smoking. Routinely

wash work clothing and protective equipment to remove contaminants.

# 9. Physical and chemical properties

**Appearance** 

Physical state Liquid.
Form Liquid
Color Not available.
Odor Not available.
Odor threshold Not available.
pH Not available.

Melting point/freezing point -144.04 °F (-97.8 °C) estimated Initial boiling point and boiling 148.46 °F (64.7 °C) estimated

range

Flash point 53.6 °F (12.0 °C) estimated

Evaporation rate Not available. Flammability (solid, gas) Not available.

Upper/lower flammability or explosive limits

Flammability limit - lower

(%)

7.3 % estimated

Flammability limit - upper

(%)

Not available.

Explosive limit - lower (%) Not available.

Explosive limit - upper (%) Not available.

Vapor pressure 169.3 hPa estimated

Vapor densityNot available.Relative densityNot available.

Solubility(ies)

Solubility (water) Not available.

Partition coefficient Not available.

(n-octanol/water)

Auto-ignition temperature 867.2 °F (464 °C) estimated

**Decomposition temperature** Not available. **Viscosity** Not available.

Other information

Density 0.787047 g/cm3 estimated
Flammability class Flammable IB estimated
Percent volatile 99.9 % estimated

Specific gravity 0.79 estimated VOC (Weight %) 99.9 % estimated

10. Stability and reactivity

**Reactivity**The product is stable and non-reactive under normal conditions of use, storage and transport.

Chemical stabilityMaterial is stable under normal conditions.Possibility of hazardousHazardous polymerization does not occur.

reactions

Conditions to avoid Avoid heat, sparks, open flames and other ignition sources. Avoid temperatures exceeding the

flash point. Contact with incompatible materials.

Incompatible materials Strong oxidizing agents.

**Hazardous decomposition** 

products

No hazardous decomposition products are known.

# 11. Toxicological information

Information on likely routes of exposure

**Ingestion** Toxic if swallowed.

**Inhalation** Toxic by inhalation. May cause damage to organs by inhalation.

Skin contact Toxic in contact with skin.

Eye contact Causes serious eye irritation.

Symptoms related to the physical, chemical and toxicological characteristics

Symptoms may include stinging, tearing, redness, swelling, and blurred vision.

Information on toxicological effects

Acute toxicity Toxic by inhalation. Toxic if swallowed. Toxic in contact with skin. Expected to be a low hazard for

usual industrial or commercial handling by trained personnel.

Components Species Test Results

Chloroethane (CAS 75-00-3)

Acute Inhalation

LC50 Mouse > 19000 ppm, 4 Hours

Rat > 19000 ppm, 4 Hours

152 mg/l, 2 Hours

**Test Results** Components **Species** Dichlorodifluoromethane (CAS 75-71-8) **Acute** Oral LD50 Rat > 1 g/kg Methanol (CAS 67-56-1) Acute Dermal LD50 Rabbit 15800 mg/kg Inhalation LC50 Mouse 79.43 mg/l, 134 Minutes Rat > 115.9 mg/l, 4 Hours 64000 ppm, 4 Hours 82.1 mg/l, 6 Hours Oral LD50 6000 mg/kg Monkey Mouse 7300 mg/kg Pig > 5000 mg/kg Rabbit 14.4 g/kg Rat 5628 mg/kg Other LD50 Guinea pig 3556 mg/kg Hamster 8555 mg/kg Mouse 4100 mg/kg Rabbit 1826 mg/kg Rat 2131 mg/kg Methyl bromide (CAS 74-83-9) Acute Dermal LD50 Rat 135 mg/kg Inhalation LC100 Rat 0.63 mg/l, 6 Hours LC50 Mouse 4.68 mg/l, 1 Hours 1.54 mg/l, 2 Hours Rat 302 ppm, 8 Hours Oral LD50 Rat 104 mg/kg Methyl chloride (CAS 74-87-3) **Acute** Inhalation LC50 6300 mg/m3 Mouse 6300 mg/m3, 7 Hours 3000 ppm, 4 Hours 2200 ppm, 6 Hours 6.3 mg/l, 7 Hours 4.6 mg/l, 6 Hours Rat 73600 ppm, 30 Minutes 5133 ppm, 1 Hours 2700 ppm, 4 Hours 5.3 mg/l, 4 Hours Oral LD50 Rat 1800 mg/kg

Components Species Test Results

Trichlorofluoromethane (CAS 75-69-4)

Acute

Inhalation

LC50 Hamster 571 mg/l, 4 Hours

Mouse 10000 mg/l, 30 Minutes

Oral

LD50 Rat 3725 mg/kg

Other

LD50 Mouse 1743 mg/kg

Vinyl chloride (CAS 75-01-4)

Acute Inhalation

LC50 Guinea pig

 Guinea pig
 595 mg/l, 2 Hours

 Mouse
 294 mg/l, 2 Hours

 Rabbit
 595 mg/l, 2 Hours

 Rat
 390 mg/l, 2 Hours

 Rodent
 293 mg/m3, 2 Hours

Oral

LD50 Rat > 500 mg/kg

**Skin corrosion/irritation** Prolonged skin contact may cause temporary irritation.

Serious eye damage/eye

irritation

Causes serious eye irritation.

Respiratory or skin sensitization

Respiratory sensitization Not available.

**Skin sensitization** This product is not expected to cause skin sensitization.

**Germ cell mutagenicity**No data available to indicate product or any components present at greater than 0.1% are

mutagenic or genotoxic.

Carcinogenicity This product is not considered to be a carcinogen by IARC, ACGIH, NTP, or OSHA.

IARC Monographs. Overall Evaluation of Carcinogenicity

Chloroethane (CAS 75-00-3)

Methyl bromide (CAS 74-83-9)

Methyl chloride (CAS 74-87-3)

3 Not classifiable as to carcinogenicity to humans.

3 Not classifiable as to carcinogenicity to humans.

3 Not classifiable as to carcinogenicity to humans.

Vinyl chloride (CAS 75-01-4) 1 Carcinogenic to humans.

US. National Toxicology Program (NTP) Report on Carcinogens

Vinyl chloride (CAS 75-01-4) Known To Be Human Carcinogen.

US. OSHA Specifically Regulated Substances (29 CFR 1910.1001-1050)

Vinyl chloride (CAS 75-01-4) Cancer

**Reproductive toxicity** Suspected of damaging fertility or the unborn child.

Suspected of damaging fertility of the unit

Specific target organ toxicity -

single exposure

Causes damage to organs.

Specific target organ toxicity -

repeated exposure

Causes damage to organs through prolonged or repeated exposure.

Aspiration hazard Not available.

**Chronic effects** Prolonged inhalation may be harmful. Causes damage to organs through prolonged or repeated

exposure.

# 12. Ecological information

**Ecotoxicity**Toxic to aquatic life with long lasting effects. Accumulation in aquatic organisms is expected.

| Components           |      | Species                          | Test Results               |  |
|----------------------|------|----------------------------------|----------------------------|--|
| Methanol (CAS 67-56- | 1)   |                                  |                            |  |
| Aquatic              |      |                                  |                            |  |
| Crustacea            | EC50 | Water flea (Daphnia magna)       | > 10000 mg/l, 48 hours     |  |
| Fish                 | LC50 | Fathead minnow (Pimephales prome | elas) > 100 mg/l, 96 hours |  |

<sup>\*</sup> Estimates for product may be based on additional component data not shown.

Components **Species Test Results** 

Methyl bromide (CAS 74-83-9)

Aquatic

Crustacea EC50 Water flea (Daphnia magna) 2 mg/l, 48 hours Fish LC50 Guppy (Poecilia reticulata) 0.0008 mg/l, 96 hours

Methyl chloride (CAS 74-87-3)

Aquatic

LC50 Fish Inland silverside (Menidia beryllina) 270 mg/l, 96 hours

No data is available on the degradability of this product. Persistence and degradability

No data available. Bioaccumulative potential Partition coefficient n-octanol / water (log Kow)

Chloroethane 1.43 Dichlorodifluoromethane 2.16 Methanol -0.77Methyl bromide 1.19 Methyl chloride 0.91 Trichlorofluoromethane 2.53

Mobility in soil No data available.

Other adverse effects No other adverse environmental effects (e.g. ozone depletion, photochemical ozone creation

potential, endocrine disruption, global warming potential) are expected from this component.

# 13. Disposal considerations

**Disposal instructions** Collect and reclaim or dispose in sealed containers at licensed waste disposal site. This material

and its container must be disposed of as hazardous waste. Do not allow this material to drain into sewers/water supplies. Do not contaminate ponds, waterways or ditches with chemical or used container. Dispose of contents/container in accordance with local/regional/national/international

regulations.

Local disposal regulations Dispose in accordance with all applicable regulations.

Hazardous waste code The waste code should be assigned in discussion between the user, the producer and the waste

disposal company.

## **US RCRA Hazardous Waste U List: Reference**

Dichlorodifluoromethane (CAS 75-71-8) U075 Methanol (CAS 67-56-1) U154 Methyl bromide (CAS 74-83-9) U029 Methyl chloride (CAS 74-87-3) U045 Trichlorofluoromethane (CAS 75-69-4) U121 Vinyl chloride (CAS 75-01-4) U043

Waste from residues / unused

products

Dispose of in accordance with local regulations. Empty containers or liners may retain some product residues. This material and its container must be disposed of in a safe manner (see:

Disposal instructions).

Contaminated packaging

Empty containers should be taken to an approved waste handling site for recycling or disposal. Since emptied containers may retain product residue, follow label warnings even after container is

emptied.

# 14. Transport information

DOT

UN1230 UN number

Methanol, solution, MARINE POLLUTANT **UN proper shipping name** 

Transport hazard class(es)

3 Class Subsidiary risk 3 Label(s) Ш Packing group **Environmental hazards** 

Marine pollutant Yes

Special precautions for user Read safety instructions, SDS and emergency procedures before handling.

Special provisions IB2, T7, TP2

Packaging exceptions 150 Packaging non bulk 202 Packaging bulk 242

<sup>\*</sup> Estimates for product may be based on additional component data not shown.

## **IATA**

UN number UN1230

UN proper shipping name Methanol solution

Transport hazard class(es)

Class 3

Subsidiary risk 6.1(PGI, II)

Packing group II Environmental hazards No. ERG Code 3L

Special precautions for user Read safety instructions, SDS and emergency procedures before handling.

Other information

Passenger and cargo

aircraft

Allowed.

Cargo aircraft only Allowed.

**IMDG** 

UN number UN1230

UN proper shipping name METHANOL SOLUTION, MARINE POLLUTANT

Not available.

Transport hazard class(es)

Class 3

Subsidiary risk 6.1(PGI, II)

Packing group

**Environmental hazards** 

Marine pollutant Yes EmS F-E, S-D

Special precautions for user Read safety instructions, SDS and emergency procedures before handling.

Transport in bulk according to Annex II of MARPOL 73/78 and

the IBC Code

DOT



IATA; IMDG



Marine pollutant



## 15. Regulatory information

**US federal regulations** 

This product is a "Hazardous Chemical" as defined by the OSHA Hazard Communication

Standard, 29 CFR 1910.1200.

All components are on the U.S. EPA TSCA Inventory List.

## TSCA Section 12(b) Export Notification (40 CFR 707, Subpt. D)

Not regulated.

## **CERCLA Hazardous Substance List (40 CFR 302.4)**

Chloroethane (CAS 75-00-3)

Dichlorodifluoromethane (CAS 75-71-8)

Methanol (CAS 67-56-1)

Methyl bromide (CAS 74-83-9)

Methyl chloride (CAS 74-87-3)

Trichlorofluoromethane (CAS 75-69-4)

Vinyl chloride (CAS 75-01-4)

Listed.

#### SARA 304 Emergency release notification

Methyl bromide (CAS 74-83-9) 1000 LBS US. OSHA Specifically Regulated Substances (29 CFR 1910.1001-1050)

Vinyl chloride (CAS 75-01-4) Cancer

Central nervous system

Liver Blood Flammability

Superfund Amendments and Reauthorization Act of 1986 (SARA)

Hazard categories Immediate Hazard - Yes

Delayed Hazard - Yes Fire Hazard - Yes Pressure Hazard - No Reactivity Hazard - No

SARA 302 Extremely hazardous substance

| Chemical name | CAS number | Reportable quantity | Threshold planning quantity | Threshold planning quantity, lower value | Threshold planning quantity, upper value |
|---------------|------------|---------------------|-----------------------------|--|--|
|               |            |                     |                             | lower value                              | upper value                              |

Methyl bromide 74-83-9 1000 1000 lbs

No

SARA 311/312 Hazardous

chemical

SARA 313 (TRI reporting)

| Chemical name | CAS number | % by wt. |  |
|---------------|------------|----------|--|
| Methanol      | 67-56-1    | >98      |  |

#### Other federal regulations

## Clean Air Act (CAA) Section 112 Hazardous Air Pollutants (HAPs) List

Chloroethane (CAS 75-00-3)

Methanol (CAS 67-56-1)

Methyl bromide (CAS 74-83-9)

Methyl chloride (CAS 74-87-3)

Vinyl chloride (CAS 75-01-4)

## Clean Air Act (CAA) Section 112(r) Accidental Release Prevention (40 CFR 68.130)

Chloroethane (CAS 75-00-3) Methyl chloride (CAS 74-87-3) Vinyl chloride (CAS 75-01-4)

Safe Drinking Water Act

Not regulated.

(SDWA)

## **US state regulations**

## US. Massachusetts RTK - Substance List

Chloroethane (CAS 75-00-3)

Dichlorodifluoromethane (CAS 75-71-8)

Methanol (CAS 67-56-1)

Methyl bromide (CAS 74-83-9)

Methyl chloride (CAS 74-87-3)

Trichlorofluoromethane (CAS 75-69-4)

Vinyl chloride (CAS 75-01-4)

### US. New Jersey Worker and Community Right-to-Know Act

Chloroethane (CAS 75-00-3) 500 LBS Dichlorodifluoromethane (CAS 75-71-8) 500 LBS

Methanol (CAS 67-56-1) 500 LBS Methyl bromide (CAS 74-83-9) 500 LBS Methyl chloride (CAS 74-87-3) 500 LBS Trichlorofluoromethane (CAS 75-69-4) 500 LBS Vinyl chloride (CAS 75-01-4) 500 LBS

# US. Pennsylvania RTK - Hazardous Substances

Chloroethane (CAS 75-00-3)

Dichlorodifluoromethane (CAS 75-71-8)

Methanol (CAS 67-56-1) Methyl bromide (CAS 74-83-9) Methyl chloride (CAS 74-87-3) Trichlorofluoromethane (CAS 75-69-4)

Vinyl chloride (CAS 75-01-4)

#### US. Rhode Island RTK

Chloroethane (CAS 75-00-3)

Dichlorodifluoromethane (CAS 75-71-8)

Methanol (CAS 67-56-1) Methyl bromide (CAS 74-83-9) Methyl chloride (CAS 74-87-3) Trichlorofluoromethane (CAS 75-69-4) Vinyl chloride (CAS 75-01-4)

## **US. California Proposition 65**

WARNING: This product contains a chemical known to the State of California to cause cancer and birth defects or other reproductive harm.

## US - California Proposition 65 - CRT: Listed date/Carcinogenic substance

Listed: July 1, 1990 Chloroethane (CAS 75-00-3) Vinyl chloride (CAS 75-01-4) Listed: February 27, 1987

## US - California Proposition 65 - CRT: Listed date/Developmental toxin

Inventory name

Methanol (CAS 67-56-1) Listed: March 16, 2012 Methyl bromide (CAS 74-83-9) Listed: January 1, 1993 Methyl chloride (CAS 74-87-3) Listed: March 10, 2000 US - California Proposition 65 - CRT: Listed date/Male reproductive toxin

Methyl chloride (CAS 74-87-3) Listed: August 7, 2009

#### International Inventories

Country(s) or region

| Australia   | Australian inventory of Chemical Substances (AICS)                     | res |
|-------------|--|-----|
| Canada      | Domestic Substances List (DSL)   | Yes |
| Canada      | Non-Domestic Substances List (NDSL)                                    | No  |
| China       | Inventory of Existing Chemical Substances in China (IECSC)             | Yes |
| Europe      | European Inventory of Existing Commercial Chemical Substances (EINECS) | Yes |
| Europe      | European List of Notified Chemical Substances (ELINCS)                 | No  |
| Japan       | Inventory of Existing and New Chemical Substances (ENCS)               | Yes |
| Korea       | Existing Chemicals List (ECL)  | Yes |
| New Zealand | New Zealand Inventory  | Yes |
| Philippines | Philippine Inventory of Chemicals and Chemical Substances (PICCS)      | Yes |
|             |  |     |

Australian Inventory of Chemical Substances (AICS)

Toxic Substances Control Act (TSCA) Inventory

## 16. Other information, including date of preparation or last revision

10-02-2014 Issue date

Version # 01 Health: 2 **NFPA** ratings

United States & Puerto Rico

Flammability: 3 Instability: 0

Material name: Gas Samples Mixture-601

Yes

On inventory (yes/no)\*

<sup>\*</sup>A "Yes" indicates that all components of this product comply with the inventory requirements administered by the governing country(s)

A "No" indicates that one or more components of the product are not listed or exempt from listing on the inventory administered by the governing country(s).

#### Disclaimer

The above information is believed to be correct on the date it was last revised and must not be considered all inclusive. The information has been obtained only by a search of available literature and is only a guide for handling the chemicals. OSHA regulations require that if other hazards become evident, an upgraded SDS must be made available to the employee within three months. RESPONSIBILITY for updates lies with the employer and not with CHEM SERVICE, Inc.

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