

## SAFETY DATA SHEET

REV: 00 DATE: 4 OCTOBER 2016

### ALL SEASON

#### 50/50 PRE-MIXED COOLANT (RED)

#### 1. Product & Company Identification

##### Product Details

**Product name:** ALL SEASON 50/50 PRE-MIXED COOLANT (RED)  
**Physical form:** Liquid  
**Odour:** Light  
**CAS No.:** Mixture

##### Company Details

**Manufacturer:** Mohm Chemical Sdn Bhd  
**Address:** No. 32, Jalan Temenggong, Off Jalan Tampoi, 81100 Johor Bahru, Johor, Malaysia.  
**Tel:** + 60-7-3331222  
**Fax:** + 60-7-3320545/ + 60-7-3337919

#### 2. Hazards Identification

##### Hazard Pictogram



**Signal Word: Warning**

##### Classification

**ACUTE TOXICITY (oral) - Category 4**

##### Hazard Statement

**H302- Harmful if swallowed.**

##### Precautionary Statement – Prevention

**P270- Do not eat, drink or smoke when using this product.**  
**P264- Wash hands thoroughly after handling.**

##### Precautionary Statement – Response

**P301+p312- IF SWALLOWED: Call a POISON CENTER or physician if you feel unwell.**  
**P330- Rinse mouth.**

##### Precautionary Statement – Storage

**Not applicable.**



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##### Precautionary Statement – Disposal

**P501- Dispose of contents and container in accordance with all local, regional, national and International regulations.**

### 3. Composition / Hazardous Components

<u>Chemical Name</u>	<u>CAS No.</u>	<u>WT%</u>
Ethanediol	107-21-1	30 - 60

### 4. First-aid Measures

<b>Eye Contact :</b>	<b>Immediately flush eyes with plenty of water, occasionally lifting the upper and lower eyelids. Check for and remove any contact lenses. Continue to rinse for at least 20 minutes. Get medical attention if irritation occurs.</b>
<b>Skin Contact :</b>	<b>Flush contaminated skin with plenty of water. Remove contaminated clothing and shoes. Get medical attention if symptoms occur. Wash clothing before reuse. Clean shoes thoroughly before reuse.</b>
<b>Inhalation :</b>	<b>Remove victim to fresh air and keep at rest in a position comfortable for breathing. If not breathing, if breathing is irregular or if respiratory arrest occurs, provide artificial respiration or oxygen by trained personnel. It may be dangerous to the person providing aid to give mouth-to-mouth resuscitation. If unconscious, place in recovery position and get medical attention immediately. Maintain an open airway. Get medical attention if symptoms occur.</b>
<b>Ingestion :</b>	<b>Wash out mouth with water. If material has been swallowed and the exposed person is conscious, give small quantities of water to drink. Stop if the exposed person feels sick as vomiting may be dangerous. Do not induce vomiting unless directed to do so by medical personnel. If vomiting occurs, the head should be kept low so that vomit does not enter the lungs. Never give anything by mouth to an unconscious person. Get medical attention if symptoms occur.</b>

### 5. Fire Fighting Measures

<b>Suitable extinguishing media:</b>	<b>Use an extinguishing agent suitable for the surrounding fire.</b>
<b>Unsuitable extinguishing media:</b>	<b>None known.</b>
<b>Special firefighting procedure:</b>	<b>Fire-fighters should wear appropriate protective equipment and self-contained breathing apparatus (SCBA) with a full face-piece operated in positive pressure mode.</b>
<b>Hazardous decomposition:</b>	<b>Decomposition products may include the following materials: carbon dioxide carbon monoxide</b>
<b>Specific hazards arising from the chemical:</b>	<b>In a fire or if heated, a pressure increase will occur and the container may burst.</b>



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#### 6. Accidental release measures

<b>Methods for cleaning up:</b>	Stop leak if without risk. Move containers from spill area. Prevent entry into sewers, water courses, basements or confined areas. Wash spillages into an effluent treatment plant or proceed as follows. Contain and collect spillage with non-combustible, absorbent material e.g. sand, earth, vermiculite or diatomaceous earth and place in container for disposal according to local regulations (see Section 13). Dispose via a licensed waste disposal contractor. Contaminated absorbent material may pose the same hazard as the spilled product.
<b>Environmental precautions:</b>	Avoid dispersal of spilled material and runoff and contact with soil, waterways, drains and sewers. Inform the relevant authorities if the product has caused environmental pollution (sewers, waterways, soil or air).

#### 7. Handling and Storage

<b>Precautions for safe handling</b>	
<b>Protective measures:</b>	Put on appropriate personal protective equipment. Do not ingest. Avoid contact with eyes, skin and clothing. Avoid breathing vapor or mist. Keep in the original container or an approved alternative made from a compatible material, kept tightly closed when not in use. Empty containers retain product residue and can be hazardous. Avoid contact with used product. Do not reuse container.
<b>Advice on general occupational hygiene:</b>	Eating, drinking and smoking should be prohibited in areas where this material is handled, stored and processed. Workers should wash hands and face before eating, drinking and smoking. See also Section 8 for additional information on hygiene measures.
<b>Conditions for safe storage including any incompatibilities:</b>	Store in accordance with local regulations. Store in original container protected from direct sunlight in a dry, cool and well-ventilated area, away from incompatible materials and food and drink. Keep container tightly closed and sealed until ready for use. Containers that have been opened must be carefully resealed and kept upright to prevent leakage. Do not store in unlabeled containers. Use appropriate containment to avoid environmental contamination.

#### 8. Exposure control / Personal protection

<b>Control parameters</b>	
<b>Occupational exposure limits:</b>	Under conditions which may generate mists, the following exposure limits are recommended: ACGIH TLV TWA: 5 mg/m <sup>3</sup> ; STEL: 10 mg/m <sup>3</sup> .
<b>Appropriate engineering controls:</b>	Good general ventilation should be sufficient to control worker exposure to airborne contaminants.
<b>Environmental exposure controls:</b>	Emissions from ventilation or work process equipment should be checked to



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	ensure they comply with the requirements of environmental protection legislation.
<b>Individual protection measures</b>	
<b>Hygiene measures:</b>	Wash hands, forearms and face thoroughly after handling chemical products, before eating, smoking and using the lavatory and at the end of the working period. Ensure that eyewash stations and safety showers are close to the workstation location.
<b>Eye/face protection:</b>	Safety eyewear complying with an approved standard should be used when a risk assessment indicates this is necessary to avoid exposure to liquid splashes, mists, gases or dusts. If contact is possible, the following protection should be worn, unless the assessment indicates a higher degree of protection: safety glasses with side-shields.
<b>Hand protection:</b>	Chemical-resistant, impervious gloves complying with an approved standard should be worn at all times when handling chemical products if a risk assessment indicates this is necessary.
<b>Body protection:</b>	Personal protective equipment for the body should be selected based on the task being performed and the risks involved and should be approved by a specialist before handling this product.
<b>Other skin protection:</b>	Appropriate footwear and any additional skin protection measures should be selected based on the task being performed and the risks involved and should be approved by a specialist before handling this product.
<b>Respiratory protection:</b>	Use a properly fitted, air-purifying or supplied air respirator complying with an approved standard if a risk assessment indicates this is necessary. Respirator selection must be based on known or anticipated exposure levels, the hazards of the product and the safe working limits of the selected respirator.

### 9. Physical and Chemical Properties

<b>Form:</b>	Liquid
<b>Colour:</b>	Red
<b>Odour:</b>	mild
<b>Density, kg/litre @15°C</b>	1.03 to 1.08
<b>Flash point Closed cup:</b>	116°C
<b>Boiling point :</b>	107.78°C
<b>Pour Point, °C</b>	-36.667°C

### 10. Stability and Reactivity

<b>Reactivity:</b>	No specific test data related to reactivity available for this product or its ingredients.
<b>Chemical stability:</b>	The product is stable.
<b>Incompatibility (material to be avoid):</b>	Oxidizing materials.



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Conditions to be avoid:	No specific data.
Possibility of hazardous reactions:	Under normal conditions of storage and use, hazardous reactions will not occur.
Hazardous decomposition products:	Under normal conditions of storage and use, hazardous decomposition products should not be produced.

### 11. Toxicological Information

#### Acute toxicity

There is no data available.

#### Carcinogenicity

Product/ingredient name: Ethanediol

OSHA :-

IARC :-

NTP :-

ACGIH :A4

EPA :-

NIOSH :-

#### Specific target organ toxicity (single exposure)

There is no data available.

#### Specific target organ toxicity (repeated exposure)

There is no data available.

#### Irritation/Corrosion

There is no data available.

#### Sensitization

There is no data available.

#### Aspiration hazard

There is no data available.

#### Potential acute health effects

Eye contact : No known significant effects or critical hazards.

Inhalation : No known significant effects or critical hazards.

Ingestion : Harmful if swallowed.

Skin contact : No known significant effects or critical hazards.

#### Delayed and immediate effects and also chronic effects from short and long term exposure

No known significant effects or critical hazards.

#### Numerical measures of toxicity

##### Acute toxicity estimates

Route : Oral

ATE value : 1002.7 mg/kg



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#### 12. Ecological Information

##### Toxicity

There is no data available.

##### Persistence and degradability

There is no data available.

##### Bioaccumulative potential

There is no data available.

##### Mobility in soil

Soil/water partition coefficient ( $K_{oc}$ ) : There is no data available.

Other adverse effects : No known significant effects or critical hazards.

#### 13. Disposal Considerations

##### Waste Disposal

##### Method:

The generation of waste should be avoided or minimized wherever possible. Disposal of this product, solutions and any by-products should comply with the requirements of environmental protection and waste disposal legislation and any regional local authority requirements. Dispose of surplus and non-recyclable products via a licensed waste disposal contractor. Waste should not be disposed of untreated to the sewer unless fully compliant with the requirements of all authorities with jurisdiction. Waste packaging should be recycled. Incineration or landfill should only be considered when recycling is not feasible. This material and its container must be disposed of in a safe way. Empty containers or liners may retain some product residues. Avoid dispersal of spilled material and runoff and contact with soil, waterways, drains and sewers.

#### 14. Transport Information

DOT shipping name : ENVIRONMENTALLY HAZARDOUS SUBSTANCE, LIQUID, N.O.S. (Ethanediol)

UN number : UN3082

Transport hazard classes : 9

Packing group : III

IMDG shipping name : ENVIRONMENTALLY HAZARDOUS SUBSTANCE, LIQUID, N.O.S. (Ethanediol)

UN number : UN3082

Transport hazard classes : 9

Packing group : III

IATA shipping name : ENVIRONMENTALLY HAZARDOUS SUBSTANCE, LIQUID, N.O.S. (Ethanediol)

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Transport hazard classes : 9  
Packing group : III

#### 15. Regulatory Information

##### U.S. Federal regulations :

United States inventory (TSCA 8b): All components are listed or exempted.

Clean Water Act (CWA) 311: Acetaldehyde

Clean Air Act Section 112 (b) Hazardous Air Pollutants (HAPs) : Listed

Clean Air Act Section 602 Class I Substances : Not listed

Clean Air Act Section 602 Class II Substances : Not listed

DEA List I Chemicals (Precursor Chemicals) : Not listed

DEA List I Chemicals (Precursor Chemicals) : Not listed

#### 16. Other Information

These data are offered in good faith as typical values and not as a product specification. No warranty, either expressed or implied, is hereby made. The recommended industrial hygiene and safe handling procedures are believed to be generally applicable. However, each user should review these recommendations in the specific content of the intended use and determine whether they are appropriate.

\*\*\* End Of SDS \*\*\*



**MOHM CHEMICAL SDN. BHD.** (REG NO 276851-U)

No.32, Jalan Temenggong, Off Jalan Tampoi, 81100 Johor Bahru, Johor Darul Takzim, Malaysia.

Tel : +607 333 1222 Fax : +607 332 0545 / 333 7919

No.43, Jalan Tambur 33/19, Seksyen 33, Shah Alam Technology Park, 40400 Shah Alam, Selangor Darul Ehsan, Malaysia.

Tel : +603 5124 0876 / 5124 0878 Fax : +603 5124 0877