

## SAFETY DATA SHEET

**Item Code: W99F75**

Section 1.	Identification of the material and the supplier
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Item Code:	W99F75
Product:	Foam Fomofill
Product Use:	Filling large voids and gaps
New Zealand Supplier:	Realcold Ltd
Address:	9 Prescott Street Penrose, Auckland
Telephone:	09 526 5700
Fax Number:	09 526 5721
<b>Emergency Telephone:</b>	<b>09 526 5700</b> <b>0800 766 764 (National Poison Centre)</b>
Manufacturer:	Ramset New Zealand, 29 Poland Road, Glenfield
Date of MSDS Preparation:	14 March 2017 – ver 2

Section 2.	Hazards Identification
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**The manufacturer has stated that this substance is hazardous according to the *HSNO (Minimum Degrees of Hazard) Regulations 2001***

**Group Standard & ERMA Approval Code: Aerosols (Flammable) - HSR002515**

### Pictograms



Flammable

Toxic

Chronic

HSNO Class.	Hazard Code	Hazard Statement	EU Risk Phrases
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2.1.2A	H223	Flammable aerosol.	Not available
6.1D (inhalation)	H332	Harmful if inhaled.	R20
6.3B	H316	Causes mild skin irritation.	R38
6.4A	H320	Causes eye irritation.	R36
6.5A	H334	May cause allergy or asthma symptoms or breathing difficulties if inhaled.	R42
6.5B	H317	May cause an allergic skin reaction.	R43
6.9A	H372	Causes damage to organs through prolonged or repeated exposure	R48

**Prevention Code      Prevention Statement**

P102	Keep out of reach of children.
P103	Read label before use.
P104	Read safety data sheet before use
P210	Keep away from heat & hot surfaces. No smoking.
P211	Do not spray on an open flame or other ignition source.
P251	Pressurized container: Do not pierce or burn, even after use.
P260	Do not breathe gas or vapours.
P264	Wash hands thoroughly after handling.
P270	Do not eat, drink or smoke when using this product.
P271	Use only outdoors or in a well-ventilated area.
P272	Contaminated work clothing should not be allowed out of the workplace.
P280	Wear protective gloves/protective clothing/eye protection/face protection*.
P285	In case of inadequate ventilation wear respiratory protection.*

**Response Code      Response Statement**

P101	If medical advice is needed, have product container or label at hand.
P312	Call a POISON CENTER or doctor/physician if you feel unwell.
P331	Do NOT induce vomiting.
P363	Wash contaminated clothing before reuse.
P302 + P352	IF ON SKIN: Wash with plenty of soap and water.
P304 + P341	IF INHALED: If breathing is difficult, remove to fresh air and keep at rest in a position comfortable for breathing.
P305 + P351+P338	IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing.
P333 + P313	If skin irritation or rash occurs: Get medical advice/attention.
P337 + P313	If eye irritation persists: Get medical advice/attention.
P342 + P311	If experiencing respiratory symptoms: Call a POISON CENTER or doctor/physician.

**Storage Code      Storage Statement**

P410 + P412	Protect from sunlight. Do not expose to temperatures exceeding 50 °C.
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**Disposal Code      Disposal Statement**

P501	Dispose of according to Local Regulations or Authorities
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**Section 3.      Composition / Information on Ingredients**

<b>Ingredients</b>	<b>Wt%</b>	<b>CAS NUMBER.</b>
Diphenyl-4,4-diisocyanate	<0.7 free	101-68-8
Dimethylether	<10%	115-10-6
Butane	<10%	106-97-8

**Section 4.      First Aid Measures**

Routes of Exposure:

If in Eyes                      Rinse cautiously with water for several minutes. Remove contact lenses, if

present and easy to do. Apply continuous irrigation with water for at least 15 minutes holding eyelids apart. If eye irritation persists: Get medical advice.

- If on Skin Wash with plenty of soap and water. Apply moisturiser. Alternatively allow foam to harden and remove mechanically. Hardened foam residues will come off the skin gradually over a period of a few days. Acetone or nail polish remover may assist removal of the residue. Do not apply acetone or nail polish remover to eyes, sensitive or damaged skin. Acetone will defat the skin and may cause dermatitis in some individuals. If skin irritation occurs: get medical advice/attention. Take off contaminated clothing and wash before re-use.
- If Swallowed IF SWALLOWED: Do NOT induce vomiting. Rinse mouth. If vomiting occurs, place victim face downwards, with the head turned to the side and lower than the hips to prevent vomit entering the lungs.
- If Inhaled Remove person to fresh air. Remove contaminated clothing and loosen remaining clothing. Allow person to assume most comfortable position and keep warm. Keep at rest until fully recovered. Get medical advice if breathing becomes difficult.

## Section 5. Fire Fighting Measures

<b>Hazard Type</b>	Flammable Aerosol
<b>Hazards from decomposition products</b>	Spray/Vapours may form an explosive mixture in air which can be ignited by many sources such as pilot lights, open flames, electrical motors, switches and static electricity. This product has the potential to cause fire or to create an additional hazard during fire
<b>Suitable Extinguishing media</b>	Water fog, Alcohol foam, carbon dioxide or dry chemical.
<b>Precautions for firefighters and special protective clothing</b>	Self-contained breathing apparatus. Safety boots, non-flammable overalls, gloves, hat and eye protection.
<b>HAZCHEM CODE</b>	<b>2YE</b>

## Section 6. Accidental Release Measures

### Containment:

If greater than 3000L is stored, secondary containment is required. Emergency plans to manage any potential spills must be in place. Prevent spillage from spreading or entering soil, waterways or drains.

### Emergency Procedures:

In the event of spillage alert the fire brigade to location and give brief description of hazard. Shut off all possible sources of ignition.

Wear protective equipment to prevent skin, eye and respiratory exposure. Clear area of any unprotected personnel. Material will expand on release from container and harden in contact with atmospheric moisture. Hardening will progress from the surface inwards at a rate dependent on humidity and temperature. Allow spilled foam to solidify. Scrape up from surface using a non-sparking tool. Foam will contain flammable vapours even when cured.

Collect and seal in properly labelled containers or drums for disposal. Collect recoverable material into labelled containers for recycling or salvage. This material may be suitable for approved landfill. Dispose of only in accord with all regulations. Wear protective equipment to prevent skin and eye contamination and the inhalation of vapour. Work up wind or increase ventilation.

## Section 7. Handling and Storage

**Handling** Avoid storage of harmful substances with food. Store out of reach of children. Containers should be kept closed in order to minimise contamination. Keep from extreme heat and open flames. Do not puncture containers. Avoid contact with incompatible substances as listed in Section 10. Location test certificates must be available if storing greater than 3000 L of flammable aerosols with 2.1.2A classification. Containers (and outer packaging) must bear the prescribed labelling, including the Hazchem code, UN number, flammability warning and name of contents.

**Storage** Keep exposure to a minimum, and minimise the quantities kept in work areas. See section 8 with regard to personal protective equipment requirements. Avoid skin and eye contact and inhalation of vapour, mist or aerosols. Do not puncture containers. Do not pierce or burn, even after use.

## Section 8 Exposure Controls / Personal Protection

### WORKPLACE EXPOSURE STANDARDS (provided for guidance only)

Substance	TWA		STEL	
	ppm	mg/m <sup>3</sup>	ppm	mg/m <sup>3</sup>
Diphenylmethanediisocyanate		0.02		0.07
Dimethyether	400	766	500	958
Butane	800	1900	no data	

Workplace Exposure Standard – Time Weighted Average (WES-TWA). *The time-weighted average exposure standard designed to protect the worker from the effects of long-term exposure.* Workplace Exposure Standard – Short-Term Exposure Limit (WESSTEL). *The 15-minute average exposure standard. Applies to any 15- Minute period in the working day and is designed to protect the worker against adverse effects of irritation, chronic or irreversible tissue change, or narcosis that may increase the likelihood of accidents. The WES-STEL is not an alternative to the WES-TWA; both the short-term and time-weighted average exposures apply.*

### Engineering Controls

In industrial situations, it is expected that employee exposure to hazardous substances will be controlled to a level as far below the WES as practicable by applying the hierarchy of control require by the Health and Safety in Employment Act 1992 (HSE). Exposure can be reduced by process modification, use of local exhaust ventilation, capturing substances at the source, or other methods. If you believe air borne concentrations of mists, dusts or vapours are high, you are advised to modify processes or increase ventilation.

### Personal Protection

**Eyes:** Avoid contact with eyes. Do not spray near eyes. Use safety glasses and Or chemical splash goggles if splashes are possible. Avoid wearing contact lenses.

**Skin:** Avoid repeated or prolonged, skin contact. If discomfort is felt (e.g., if pre-existing conditions exist, such as dermatitis, cuts or sensitive skin), gloves

may be helpful. If you suffer from dermatitis type skin conditions, use gloves. Neoprene and Latex gloves are recommended. Replace gloves frequently. Gloves should be checked for tears or holes before use.

**Respiratory:** A respirator with an organic vapour cartridge when airborne concentrations approach the WES (section 8.) If using a respirator, ensure that the cartridges are correct for the potential air contamination and are in good working order.

## Section 9 Physical and Chemical Properties

<b>Appearance</b>	Light Yellow viscous liquid in aerosol can
<b>Odour</b>	Characteristic solvent odour
<b>Vapour Pressure</b>	5.5 – 6 bar
<b>Flash Point</b>	-73°C (butane)
<b>Boiling Point</b>	
<b>Lower &amp; Upper Flammability Limits</b>	1.5%, 18.6%
<b>Auto-ignition Temperature</b>	>230°C
<b>Volatile materials</b>	<200g/L (VOC)
<b>Specific Gravity</b>	0.9 – 1.1 g/cm <sup>3</sup>
<b>Solubility in Water</b>	Insoluble in water
<b>Danger of Explosion</b>	Container may explode when exposed to extreme heat

## Section 10. Stability and Reactivity

<b>Stability of Substance</b>	Stable
<b>Conditions to Avoid</b>	Flammable liquid. Keep away from sources of ignition at all times. Containers should be kept closed in order to avoid contamination. High humidity may harden contents of container or cause valve blockage.
<b>Incompatible Materials</b>	Avoid heat, sparks, flames and any other sources of ignition.
<b>Hazardous Decomposition Products</b>	Carbon monoxide, carbon dioxide, oxides of nitrogen and Hydrogen cyanide.

## Section 11 Toxicological Information

No specific data is available for this product.  
If swallowed, this mixture may cause irritation to gastrointestinal tract. Contact with the eyes and skin may result in irritation. Vapours may be harmful and irritating to the respiratory tract. This product is an adhesive and hardens upon contact with Moisture on the skin and in the eye. Skin contact may result in defatting and drying of the skin.

This product may contain low levels of free organic isocyanates, which are considered sensitising on contact and if inhaled. Prolonged, repeated or excessive exposure by inhalation of skin contact may cause sensitization and allergic reaction leading to bronchial spasms, asthma or dermatitis. The fully cured foam is considered non hazardous.

### Acute

<b>Oral</b>	No data for mixture or the ingredients are available.
<b>Dermal</b>	No evidence of dermal toxicity or any of the ingredients
<b>Inhaled</b>	No data for mixture is available. Using LC50's for ingredients, the calculated LC50 (inhalation, rat, mist) for the mixture is between 1 and 5 m./L. Data <u>considered</u>

includes: Diphenyl-4,4-diisocyanate: 0.369 mg/ (rat, inhalation form not reported) , Dimethylether not reported, Butane not reported.

- Eye** The mixture is considered to be an eye irritant, because Diphenyl-4,4-diisocyanate is considered eye irritant.
- Skin** The mixture is considered to be a skin irritant, because Diphenyl-4,4-diisocyanate is considered skin irritant. Prolonged or repeated skin contact may cause drying or cracking, irritation and possible dermatitis.

### **Chronic**

- Sensitisation** This product contains Diphenyl-4,4-diisocyanate which are known sensitizers (contact and respiratory). The mixture is considered to be sensitizing.
- Mutagenicity** No ingredient present at concentrations >0.1% considered a suspected or confirmed mutagen.
- Carcinogenicity** No ingredient present at concentrations >0.1% considered a suspected or confirmed carcinogen.
- Reproductive** No ingredient present at concentrations >0.1% considered a reproductive or developmental toxicant or have any effects on or via lactation.
- Systemic** The mixture is considered to be a known or presumed target organ toxicant, because Diphenyl-4,4-diisocyanate present is known or presumed to be a target organ toxicant. Oligomers of Diphenyl-4,4-diisocyanate are also classified as 6.9A.

## **Section 12. Ecotoxicological Information**

No specific data is available for this product. Where available, ecotoxicological data has been researched and data for the mixture calculated. The results of these calculations are presented below. The product is considered to have the following ecotoxicity groups:

- Aquatic:** This substance is not considered harmful to fish and aquatic invertebrates.
- Degradability** Cured foam is not biodegradable, but may degrade if exposed to light (photodegradable).
- Bioaccumulation** This substance is not expected to bioaccumulate significantly.
- Soil** The mixture is not considered toxic to the soil environment-The substance may adsorb to soil and have low mobility.
- Terrestrial Vertebrate** This product is not considered toxic to terrestrial vertebrates. No LC50 (diet) data for ingredients are available and the classification is based on the LD50 (oral) - see section 11 - oral toxicity
- Terrestrial Invertebrate** The mixture is not considered harmful to terrestrial invertebrates.

## **Section 13. Disposal Considerations**

Disposal of this product must comply with the requirements of the Resource Management Act for which approval should be sought from the Regional Authority. The substance must be treated and therefore rendered non-hazardous before discharge to the environment.

Pressurised container: Do not puncture or incinerate containers. Send to landfill or similar. Dispose of large quantities as hazardous waste.

## **Section 14 Transport Information**

Classified as a Dangerous Good for transport

Road and Rail Transport (in NZ ; NZS 5433:2007)

Product Name: Foam Fomofill Item No: W99F75  
Date of MSDS: 10 January 2012

Issued by: Realcold Ltd  
Tel: 64 9 526 5700

UN No: 1950  
Class-primary 2.1  
Packing Group Non allocated  
Proper Shipping Name: AEROSOLS

Air Transport

UN No: 1950  
Class-primary 2.1  
Packing Group Non allocated  
Proper Shipping Name: AEROSOLS

Marine Transport

UN No: 1950  
Class-primary 2.1  
Packing Group Non allocated  
Proper Shipping Name: AEROSOLS

**Section 15 Regulatory Information**

ERMA Approval Code: Aerosols (Flammable) – HSR002515

HSNO Classification: 2.1.2A, 6.1D, 6.3B, 6.4A, 6.5A, 6.5B, 6.9A

HSNO Controls:  
Trigger quantities for this substance:

	<b>Trigger Quantity</b>
Approved Handler	3000 L awc
Location Certificate	3000 L awc
Tracking Trigger Quantities	Not applicable
Signage Trigger Quantities	3000 L awc (2.1.2A) or 10 000 L (6.1D)
Emergency Response Plan trigger Quantities	3000 L awc (2.1.2A) or 1 000 L (6.1D)

**Section 16 Other Information**

1. HSNO Approved Code of Practice: Preparation of Safety Data Sheets, September 2006.

Disclaimer

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