

LOG AND GROUND MARKER

SECTION 1 – IDENTIFICATION OF THE MATERIAL AND SUPPLIER

Product Name:	LOG AND GROUND MARKER - All Colours
Product Use:	Log and ground marker aerosol for all marking applications. Suitable for wet weather use.
Supplier:	Vertex Lubricants NZ 22 Marphona Crescent Takanini 2105 Phone: 09/640 0004 Email: info@vertexlubricants.co.nz
Emergency Number:	0800 353 645
Chemical Nature:	Ethanol Denatured, Acetone, Heptanes, Hydrocarbon propellant (LPG - Propane, Butane)
Issue Date:	4 September 2024 and is valid for 5 years from this date.

SECTION 2 – HAZARDS IDENTIFICATION

Classification of the product

Considered a hazardous substance according to the Hazardous Substance (Minimum Degrees of Hazard) Regulations NZ.

Classified as a dangerous goods for transport purposes.

GHS Classifications:

Aerosol Category 1

Eye irritation Category 2

Aquatic toxicity (Chronic) Category 2



Signal Words: Danger

Hazard Statements

H222	Extremely flammable aerosol.
H229	Pressurised container: May burst if heated.
H319	Causes serious eye irritation.
H411	Toxic to aquatic life with long lasting effects.

HSNO Classifications:

2.1.2A Extremely flammable aerosol

6.4A Irritating to the eye

9.1B Ecotoxic in the aquatic environment with lasting effects

SECTION 3 – COMPOSITION / INFORMATION ON INGREDIENTS

Hazardous Ingredients	CAS No.	Proportion, % m/m
Ethanol Denatured	64-17-5, 67-56-1	10 - 30
Acetone	67-64-1	10 - 30
Heptanes	64742-49-0	10 - 30
Hydrocarbon propellant (LPG - Propane, Butane)	68476-85-7	30 - 60
Other Ingredients determined not to be hazardous	-	to 100

SECTION 4 – FIRST AID MEASURES

If medical advice is needed, have product container or label at hand.

If exposed or if you feel unwell: Call a POISON CENTRE or doctor.

Eye contact: IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing. If eye irritation persists: Get medical advice/attention.

Skin contact: IF ON SKIN: Wash with plenty of soap and water. Direct contact may cause irritation in sensitive individuals. If skin irritation or rash occurs: Get medical advice/ attention.

Inhalation: IF INHALED: If breathing is difficult, remove to fresh air and keep at rest in a position comfortable for breathing. If experiencing respiratory symptoms: Call a POISON CENTRE or doctor.

Ingestion: IF SWALLOWED: Immediately call a POISON CENTRE or doctor. Do NOT induce vomiting. Where there is risk of vomiting, lean person forward or place on left side to avoid aspiration of product into lungs. Obtain immediate medical attention.

Notes to physician: Treat symptomatically and supportively. No specific antidote.

SECTION 5 – FIRE FIGHTING MEASURES

General fire hazards: Pressurised, extremely flammable aerosol.

Specific hazards: Containers can build up pressure if exposed to heat and/or fire and may explode. Vapours may form an explosive mixture with air. Vapours can travel to a source of ignition and flash back. May float and be reignited on surface water.

Further advice: On burning may emit toxic fumes including those of carbon monoxide and carbon dioxide. Fire fighters to wear self-contained breathing apparatus if risk of exposure to products of combustion.

Extinguishing media: Use water spray, fog, or foam. Use water spray to cool fire-exposed containers. Water may be ineffective. Do NOT use straight streams of water. Do not discharge extinguishing waters into the aquatic environment.

Protective equipment: Firefighters must use standard protective equipment including flame retardant coat, helmet with face shield, gloves, rubber boots, and in enclosed spaces, SCBA.

Firefighting instructions: In the event of fire, cool containers with water spray to prevent vapour pressure build up. Move containers from fire area if you can do so without risk. Runoff can cause environmental damage.

Hazchem Code: 2YE

SECTION 6 – ACCIDENTAL RELEASE MEASURES

Minor spills: Clean up all spills immediately. Remove all sources of ignition. If safe to do, damaged cans should be placed in a container outdoors, away from all ignition sources, until pressure has dissipated. Undamaged cans should be gathered and stowed safely. Provide ventilation. Wash with water.

Major spills: Evacuate the spill area. Call the Fire Brigade. Remove all sources of ignition. If safe to do so, prevent spillage from entering drains or water courses. If material enters drains, advise emergency services. Use absorbent (soil, sand or other inert material). Collect and seal in properly labeled containers for disposal.

SECTION 7 – HANDLING AND STORAGE

Handling Read product label before use. Keep out of reach of children. This product is highly flammable.

Precautions: Keep away from heat and open flames/hot surfaces. No smoking. Do not spray on an open flame or other ignition source. Pressurised container: Do not pierce or burn, even after use.

Storage: Use in a well-ventilated area. Avoid breathing spray. Wash hands with soap and water after handling. Protect from Sunlight. Do not expose to temperatures exceeding 50 °C. Store in a well-ventilated, cool, dry place. Keep away from heat, sparks, and flame. Store locked up.

SECTION 8 – EXPOSURE CONTROLS AND PERSONAL PROTECTION

Exposure Limits: No value assigned for product. Exposure standards for constituents (NZ WES);

Material	TWA, mg/m ³	STEL, mg/m ³
Ethanol Denatured	1,880	-
Acetone	1,185	2,375
Heptanes	1,200	1,600
LPG (Liquefied petroleum gas – butane, propane)	1,800	-

Additional Information: Wash hands before eating, drinking and smoking. Beware: Deliberately sniffing or inhaling concentrated contents can be harmful or fatal. Avoid breathing spray.

Engineering Controls: No controls generally required when handling small quantities. Use with adequate ventilation. Larger quantities: General exhaust is adequate under normal operating conditions. Exhaust ventilation should be designed to prevent accumulation and recirculation in the workplace. Ventilation equipment and lighting should be explosion-resistant.

Protective Equipment: General protective gloves are recommended. In an industrial environment: chemical protective gloves, safety glasses or chemical goggles are recommended. Wash contaminated clothing before reuse. Contaminated work clothing should not be allowed out of the workplace. In case of inadequate ventilation wear respiratory protection. If TWA is exceeded, wear an approved respirator with a type A filter.

SECTION 9 – PHYSICAL AND CHEMICAL PROPERTIES

Physical state: Coloured liquid spray with characteristic odour.

pH: Not applicable.

Vapour Density: > 1 (Air =1)

Vapour Pressure, kPa: 300 - 600

Boiling Point, °C: Not applicable.

Melting Point, °C: Not applicable.

Specific Gravity: About 0.90

Flash Point, °C: < 0 (propellant)

Explosion Limit, % v/v: LEL 1.2% UEL 9.5%

Autoignition Temp, °C: Not applicable.

Solubility: Not soluble in water.

SECTION 10 – STABILITY AND REACTIVITY

Stability: Stable under normal conditions of use. Not reactive. Avoid oxidisers. Avoid elevated temperatures.

SECTION 11 – TOXICOLOGICAL INFORMATION

Basis for Assessment: Information given is based on product testing, and/or similar products, and/or components.
Acute Oral Toxicity: LD₅₀ estimated to be > 5,000 mg/kg (based on component mixture, excluding propellant).
Acute Dermal Toxicity: LD₅₀ estimated to be > 5,000mg/kg (based on component mixture, excluding propellant).
Acute Inhalation Toxicity: LC₅₀ estimated to be > 20 mg/L, Rat 4 hour (based on component mixture).
Beware: Deliberately sniffing or inhaling concentrated contents can be harmful or fatal.
Skin Irritation: May cause skin irritation. Prolonged/repeated contact may cause defatting of the skin and dermatitis.
Eye Irritation: Spray may be seriously irritating to the eye.
Inhalation: May cause drowsiness or dizziness.
Respiratory Irritation: Inhalation of vapours or mists may cause irritation to the respiratory system.
Sensitisation: Product is not expected to be a contact or respiratory sensitiser.
Mutagenicity: Not expected to be mutagenic.
Carcinogenicity: Not expected to be carcinogenic.
Reproductive toxicity: Not expected to be a human reproductive or developmental toxicant.
STOT (Narcotic): Prolonged inhalation of vapours may be narcotic and cause drowsiness or dizziness.
Repeated Dose Toxicity: Repeated, prolonged exposure by inhalation may cause damage to organs.
Additional Information: None of the components present in this material at concentrations equal to or greater than 0.1% are listed by IARC, NTP, OSHA or ACGIH as being carcinogens.

SECTION 12 – ECOLOGICAL INFORMATION

Ecotoxicity: Large quantities may be ecotoxic in the aquatic environment with long lasting effects.
Mobility: Product is largely volatile and will rapidly evaporate to the air.
Persistence/degradability: Some components may be persistent and may bioaccumulate.

SECTION 13 – DISPOSAL CONSIDERATION

Material Disposal: Product wastes should be disposed of in accordance with applicable regulations. Do not dispose into the environment, in drains or in water courses. Large quantities should be degassed by an aerosol recycler. Do not dispose of large quantities of pressurised aerosols in landfills. Incineration in an authorised facility is suggested.
Container Disposal: Recycle empty container if possible. Product containers are also considered wastes of the same class of the contents and should be disposed of in accordance with applicable regulations.

SECTION 14 – TRANSPORT INFORMATION

Transport:	Classified as a Dangerous Good for transport purposes. Class 2.1 should not be loaded on the same vehicle as Classes 1, 3 (where both are in bulk), 4, 5, and 7. They may be loaded with Classes 3, 6, 8, 9, foodstuffs and foodstuff empties.
Proper Shipping Name:	Aerosols
UN Number:	1950
Dangerous Goods Class:	2.1
Transport Labels Required:	Class 2 Flammable



Subsidiary Risk:	Not applicable
Packing Group:	Not applicable
Marine Pollutant:	No
EMS Number	F-D, S-U (UN 1950 Flammable aerosols)
DG Segregation:	This product is classified as a Dangerous Goods. Please consult the Land Transport Rule: Dangerous Goods 2005, and NZS 5433:2012 Transport of Dangerous Goods on Land for information.

SECTION 15 – REGULATORY INFORMATION

Inventory Listing	NZIOC (New Zealand Inventory of Chemicals); All components of this product are listed.
SDS regulations	This Safety Data Sheet was prepared in accordance with the EPA Hazardous Substances (Safety Data Sheets) Notice July 2017.
EPA Approval Number:	HSR002515 Aerosols (Flammable) Group Standard 2020.
EPA Hsno Controls:	Refer to www.epa.govt.nz for information on Controls. This substance is to be managed using the conditions specified in an applicable Group Standard.

SECTION 16 – OTHER INFORMATION

Additional information:	Health Effects from Exposure: It should be noted that the effects from exposure to this product will depend on several factors including: frequency and duration of use; quantity used; effectiveness of control measures; protective equipment used and method of application. Given that it is impractical to prepare a report which would encompass all possible scenarios, it is anticipated that users will assess the risks and apply control methods where appropriate.										
Abbreviations	<table> <tr> <td>CAS</td> <td>Chemical Abstract Service number</td> </tr> <tr> <td>EMS</td> <td>Emergency Response Procedures for Ships Carrying Dangerous Goods</td> </tr> <tr> <td>EPA</td> <td>Environmental Protection Agency</td> </tr> <tr> <td>GHS</td> <td>Globally Harmonized System</td> </tr> <tr> <td>IARC</td> <td>International Agency for Research on Cancer</td> </tr> </table>	CAS	Chemical Abstract Service number	EMS	Emergency Response Procedures for Ships Carrying Dangerous Goods	EPA	Environmental Protection Agency	GHS	Globally Harmonized System	IARC	International Agency for Research on Cancer
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IATA	International Air Transport Association
IMDG	International Maritime Dangerous Goods
LC ₅₀	Lethal Concentration, 50% / Median Lethal Concentration
LD ₅₀	Lethal Dose, 50% / Median Lethal Dose
LEL	Lower Explosion Limit
mg/m ³	Milligrams per Cubic Metre
NZIoC	New Zealand Inventory of Chemicals
N.O.S.	Not otherwise specified
OEL	Occupational Exposure Limit
PEL	Permissible Exposure Limit
STEL	Short-Term Exposure Limit
STOT-RE	Specific target organ toxicity (repeated exposure)
STOT-SE	Specific target organ toxicity (single exposure)
TLV	Threshold Limit Value
TWA	Time Weighted Average
UEL	Upper Explosion Limit

Date of issue/Date of revision

Current Version: 4 September 2024

This MSDS contains only safety-related information. For other data see product literature.

MSDS SUMMARISES OUR BEST KNOWLEDGE OF THE HEALTH AND SAFETY HAZARD INFORMATION OF THE PRODUCT AND HOW TO SAFELY HANDLE AND USE THE PRODUCT IN THE WORKPLACE. EACH USER MUST REVIEW THIS MSDS IN THE CONTEXT OF HOW THE PRODUCT WILL BE HANDLED AND USED IN THE WORKPLACE.

IF CLARIFICATION OR FURTHER INFORMATION IS NEEDED TO ENSURE THAT AN APPROPRIATE RISK ASSESSMENT CAN BE MADE, THE USER SHOULD CONTACT THIS COMPANY SO WE CAN ATTEMPT TO OBTAIN ADDITIONAL INFORMATION FROM OUR SUPPLIERS. OUR RESPONSIBILITY FOR PRODUCTS SOLD IS SUBJECT TO OUR STANDARD TERMS AND CONDITIONS, A COPY OF WHICH IS SENT TO OUR CUSTOMERS AND IS ALSO AVAILABLE ON REQUEST.

Please read all labels carefully before using product.