SAFETY DATA SHEET

1. Identification

Product number 5633

Product identifier RELEASE II

Company information Atco International

1401 Barclay Circle,SE Marietta, GA 30060

Company phone General Assistance 770-424-7550

Emergency telephone **US** 1-800-255-3524 Emergency telephone **outside** 1-813-248-0585

Version # 02

Recommended use Lubricant
Recommended restrictions None known.

2. Hazard(s) identification

Physical hazardsFlammable aerosolsCategory 1Health hazardsAspiration hazardCategory 1

Environmental hazards Not classified.

OSHA defined hazards Not classified.

Label elements



Signal word Danger

Hazard statement Extremely flammable aerosol. May be fatal if swallowed and enters airways.

Precautionary statement

Prevention Keep away from heat/sparks/open flames/hot surfaces. - No smoking. Do not spray on an open

flame or other ignition source. Pressurized container: Do not pierce or burn, even after use.

Response Wash hands after handling. If swallowed: Immediately call a poison center/doctor. Do NOT induce

omiting.

Storage Store locked up. Protect from sunlight. Do not expose to temperatures exceeding 50°C/122°F.

Disposal Dispose of waste and residues in accordance with local authority requirements. Dispose of

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

Hazard(s) not otherwise

classified (HNOC)

None known.

Supplemental information None.

3. Composition/information on ingredients

Mixtures

Chemical name	Common name and synonyms	CAS number	%
Distillates, Petroleum, Hydrotreated Middle		64742-46-7	20 - 40
White Mineral Oil (petroleum)		8042-47-5	20 - 40
Butane		106-97-8	2.5 - 10
Diethylene Glycol Monobutyl Ether		112-34-5	2.5 - 10
Propane		74-98-6	2.5 - 10
Other components below reportable leve	els		10 - 20

Product name: RELEASE II

Version #: 02 Issue date: 08-18-2017

#: This substance has workplace exposure limit(s).

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

4. First-aid measures

Inhalation If symptoms develop move victim to fresh air. Get medical attention if symptoms persist.

Take off immediately all contaminated clothing. Rinse skin with water/shower. Get medical Skin contact

attention if irritation develops and persists.

observation. Symptoms may be delayed.

Immediately flush eyes with plenty of water for at least 15 minutes. Remove contact lenses, if Eye contact

Aspiration may cause pulmonary edema and pneumonitis.

present and easy to do. Get medical attention if irritation develops and persists.

Rinse mouth. Get medical attention if symptoms occur. Ingestion

Most important

symptoms/effects, acute and

delayed

Indication of immediate medical attention and special

General information

treatment needed

Ensure that medical personnel are aware of the material(s) involved, and take precautions to protect themselves.

Provide general supportive measures and treat symptomatically. Keep victim under

5. Fire-fighting measures

Suitable extinguishing media

Unsuitable extinguishing media

Specific hazards arising from the chemical

Special protective equipment and precautions for firefighters

Fire-fighting equipment/instructions

Specific methods

General fire hazards

Water fog. Dry chemical powder. Dry chemicals. Carbon dioxide (CO2).

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

Contents under pressure. Pressurized container may explode when exposed to heat or

flame. During fire, gases hazardous to health may be formed.

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

Move containers from fire area if you can do so without risk. Cool containers exposed to heat with water spray and remove container, if no risk is involved. Containers should be cooled with water to prevent vapor pressure build up. For massive fire in cargo area, use unmanned hose holder or monitor nozzles, if possible. If not, withdraw and let fire burn out.

Use standard firefighting procedures and consider the hazards of other involved materials. Move containers from fire area if you can do so without risk. In the event of fire and/or explosion do not

breathe fumes.

Extremely flammable aerosol.

6. Accidental release measures

Personal precautions, protective equipment and emergency procedures

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 touch damaged containers or spilled material unless wearing appropriate protective clothing. Ventilate closed spaces before entering them. 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

Refer to attached safety data sheets and/or instructions for use. Eliminate all ignition sources (no smoking, flares, sparks, or flames in immediate area), Keep combustibles (wood, paper, oil, etc.) away from spilled material. Stop leak if you can do so without risk. Move the cylinder to a safe and open area if the leak is irreparable. Isolate area until gas has dispersed. Prevent entry into waterways, sewer, basements or confined areas. Wipe up with absorbent material (e.g. cloth, fleece). Clean surface thoroughly to remove residual contamination. For waste disposal, see section 13 of the SDS.

Environmental precautions

Avoid discharge into drains, water courses or onto the ground.

7. Handling and storage

Precautions for safe handling

Pressurized container: Do not pierce or burn, even after use. Do not use if spray button is missing or defective. Do not spray on a naked flame or any other incandescent material. Do not smoke while using or until sprayed surface is thoroughly dry. Do not cut, weld, solder, drill, grind, or expose containers to heat, flame, sparks, or other sources of ignition. All equipment used when handling the product must be grounded. Use non-sparking tools and explosion-proof equipment. Do not re-use empty containers. Avoid prolonged or repeated contact with skin. Avoid prolonged exposure. Provide adequate ventilation. Wear appropriate personal protective equipment. Wash hands thoroughly after handling. Observe good industrial hygiene practices.

Product name: RELEASE II

Conditions for safe storage, including any incompatibilities Level 3 Aerosol.

Store locked up. Pressurized container. Protect from sunlight and do not expose to temperatures exceeding 50°C/122 °F. Do not puncture, incinerate or crush. Do not handle or store near an open flame, heat or other sources of ignition. This material can accumulate static charge which may cause spark and become an ignition source. Refrigeration recommended. Store away from incompatible materials (see Section 10 of the SDS).

8. Exposure controls/personal protection

Occupational exposure limits

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

Components	Туре	Value	
Propane (CAS 74-98-6)	PEL	1800 mg/m3	
		1000 ppm	
US. ACGIH Threshold Limit Value	es		
Components	Туре	Value	Form
Butane (CAS 106-97-8)	STEL	1000 ppm	
Diethylene Glycol	TWA	10 ppm	Inhalable fraction and
Monobutyl Ether (CAS			vapor.
112-34-5)			
US. NIOSH: Pocket Guide to Che	mical Hazards		
Components	Туре	Value	
Butane (CAS 106-97-8)	TWA	1900 mg/m3	
		800 ppm	
Propane (CAS 74-98-6)	TWA	1800 mg/m3	
, ,		1000 ppm	

Biological limit values No biological exposure limits noted for the ingredient(s).

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.

Individual protection measures, such as personal protective equipment

Eye/face protection Face shield is recommended. Wear safety glasses with side shields (or goggles).

Hand protection Wear appropriate chemical resistant gloves.

Skin protection

Other Wear suitable protective clothing.

Respiratory protection If permissible levels are exceeded use NIOSH mechanical filter / organic vapor cartridge or an

air-supplied respirator.

Thermal hazards Wear appropriate thermal protective clothing, when necessary.

General hygiene considerations

When using do not 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 Gas. Form Aerosol. Color Not available. Odor Not available. **Odor threshold** Not available.

pΗ 6-7

Melting point/freezing point Not available.

Initial boiling point and boiling

583.11 °F (306.17 °C) estimated

range

Flash point -156.0 °F (-104.4 °C) Propellant estimated

Product name: RELEASE II Version #: 02 Issue date: 08-18-2017 Evaporation rate Not available. Flammability (solid, gas) Not available. Upper/lower flammability or explosive limits

Flammability limit - lower

1.1 % estimated

(%)

Flammability limit - upper

7.8 % estimated

(%)

Explosive limit - lower (%) Not available. Explosive limit - upper (%) Not available.

Vapor pressure Not available.

Vapor density Not available.

Relative density Not available.

Solubility(ies)

Solubility (water) Not available.

Partition coefficient Not available.

(n-octanol/water)

Auto-ignition temperature 702.59 °F (372.55 °C) estimated

Decomposition temperature Not available. Viscosity Not available.

Other information

Specific gravity 0.781 estimated

10. Stability and reactivity

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

Chemical stability Material is stable under normal conditions.

Possibility of hazardous

reactions

No dangerous reaction known under conditions of normal use. Hazardous polymerization does not

occur.

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

flash point. Contact with incompatible materials. Fire or intense heat may cause violent rupture

of packages.

Incompatible materials
Hazardous decomposition

products

Strong oxidizing agents. Nitrates. Fluorine. Chlorine. No hazardous decomposition products are known.

11. Toxicological information

Information on likely routes of exposure

Ingestion Expected to be a low ingestion hazard. Droplets of the product aspirated into the lungs through

ingestion or vomiting may cause a serious chemical pneumonia.

Inhalation Prolonged inhalation may be harmful.

Skin contact No adverse effects due to skin contact are expected.

Eye contact Not available.

Symptoms related to the physical, chemical and toxicological characteristics Aspiration may cause pulmonary edema and pneumonitis.

Information on toxicological effects

Acute toxicity May be fatal if swallowed and enters airways. Expected to be a low hazard for usual industrial or

commercial handling by trained personnel.

Product Species Test Results

TERAND PENETRATING LUBRICANT WITH PTFE (CAS Mixture)

Acute

Dermal

LD50 Rat 13593 mg/kg

Inhalation

LC50 Rat 1099 mg/l/4h

Product name: RELEASE II Version #: 02 Issue date: 08-18-2017

Species Test Results Components Butane (CAS 106-97-8)

Acute

Inhalation

LC50 Mouse 1237 mg/l, 120 Minutes

52 %, 120 Minutes

Rat 1355 mg/l

Diethylene Glycol Monobutyl Ether (CAS 112-34-5)

Acute Dermal

LD50 Rabbit 2764 mg/kg, 24 Hours

> Rat 2021 mg/kg

Inhalation

LC50 Rat 74 mg/l/4h

Oral

LD100 Rabbit 4000 mg/kg 2000 mg/kg **LD50** Guinea pig Mouse 2410 mg/kg

> Rabbit 2500 - 3000 mg/kg

Rat 3306 mg/kg

Distillates, Petroleum, Hydrotreated Middle (CAS 64742-46-7)

Acute

Dermal

LD50 Rabbit > 2000 mg/kg, 24 Hours

Inhalation

7640 mg/m3, 4 Hours LC50 Rat

1.72 mg/l, 4 Hours

Propane (CAS 74-98-6)

Acute Inhalation

LC50 1237 mg/l, 120 Minutes Mouse

52 %, 120 Minutes

Rat 1355 mg/l

658 mg/l/4h

White Mineral Oil (petroleum) (CAS 8042-47-5)

Acute

Dermal

LD50 Rabbit > 2000 mg/kg, 24 Hours

Inhalation

LC50 Rat 2.18 mg/l, 4 Hours

* Estimates for product may be based on additional component data not shown.

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

Serious eye damage/eye

irritation

Not available.

Respiratory or skin sensitization

Respiratory sensitization Not a respiratory sensitizer.

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 Risk of cancer cannot be excluded with prolonged exposure. OSHA Specifically Regulated Substances (29 CFR 1910.1001-

1050) Not listed.

Reproductive toxicity This product is not expected to cause reproductive or developmental effects.

Specific target organ toxicity -

single exposure

Not classified.

Specific target organ toxicity -

repeated exposure

Not classified.

Aspiration hazard May be fatal if swallowed and enters airways.

Chronic effects Prolonged inhalation may be harmful. Prolonged exposure may cause chronic effects.

12. Ecological information

Ecotoxicity The product is not classified as environmentally hazardous. However, this does not exclude the

possibility that large or frequent spills can have a harmful or damaging effect on the environment.

Product		Species	Test Results
TERAND PENETRAT	ING LUBRICANT W	/ITH PTFE (CAS Mixture)	
Aquatic			
Crustacea	EC50	Daphnia	28147 mg/L, 48 Hours
Fish	LC50	Fish	6246 mg/L, 96 Hours
Components		Species	Test Results
Diethylene Glycol Mo	onobutyl Ether (CA	S 112-34-	
5) Aquatic			
Crustacea	EC50	Daphnia	2803 mg/L, 48 Hours
Fish	LC50	Bluegill (Lepomis macrochirus)	1300 mg/l, 96 hours
		Fish	1304 mg/L, 96 Hours

^{*} Estimates for product may be based on additional component data not shown.

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

Bioaccumulative potential No data available.

Partition coefficient n-octanol / water (log Kow)
Butane
Diethylene Glycol Monobutyl Ether

Propane 2.36

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. Contents

under pressure. Do not puncture, incinerate or crush. Dispose of contents/container in

accordance with local/regional/national/international regulations.

2.89

0.56

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.

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. Do not re-use empty containers.

14. Transport information

DOT

UN number UN1950

UN proper shipping name Aerosols, flammable

Transport hazard class(es)
Class 2.1

Version #: 02 Issue date: 08-18-2017

Subsidiary risk -Label(s) 2.1

Packing group Not applicable.

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

Special provisions N82
Packaging exceptions 306
Packaging non bulk None
Packaging bulk None

This product meets the exception requirements of section 173.306 as a limited quantity and may be shipped as a limited quantity. Until 12/31/2020, the "Consumer Commodity - ORM-D" marking may still be used in place of the new limited quantity diamond mark for packages of UN 1950 Aerosols. Limited quantities require the limited quantity diamond mark on cartons after 12/31/20 and may be used now in place of the "Consumer Commodity ORM-D" marking and both may be displayed concurrently.

IATA

UN number UN1950

UN proper shipping name Aerosols, flammable

Transport hazard class(es)

Class 2.1 Subsidiary risk -Label(s) 2.1

Packing group Not applicable.

Environmental hazards No. ERG Code 10L

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

handling. Other information

Passenger and cargo Allowed.

aircraft

Cargo aircraft only Allowed.

Packaging Exceptions LTD QTY

IMDG

UN number UN1950 UN proper shipping name AEROSOLS

Transport hazard class(es)

Class 2.1 Subsidiary risk -Label(s) 2.1

Packing group Not applicable.

Environmental hazards

Marine pollutant No.

EmS Not available.

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

Packaging Exceptions LTD QTY
Transport in bulk according to Not applicable.

Annex II of MARPOL 73/78 and

the IBC Code

DOT





15. Regulatory information

US federal regulations

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

Standard, 29 CFR 1910.1200.

CERCLA/SARA Hazardous Substances - Not applicable.

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)

Not listed

SARA 304 Emergency release notification

Not regulated.

OSHA Specifically Regulated Substances (29 CFR 1910.1001-1050)

Not listed.

Superfund Amendments and Reauthorization Act of 1986 (SARA)

Hazard categories Immediate Hazard - Yes

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

Hazard - No

SARA 302 Extremely hazardous substance

Not listed.

SARA 311/312 Hazardous No

chemical

SARA 313 (TRI reporting)

Chemical name	CAS number	% by wt.
2-butoxyethanol	111-76-2	0.1 - 1

Other federal regulations

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

Not regulated.

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

Butane (CAS 106-97-8) Propane (CAS 74-98-6)

Safe Drinking Water Act

(SDWA)

Not regulated.

US state regulations

This product does not contain a chemical known to the State of California to cause cancer, birth

defects or other reproductive harm.

US. Massachusetts RTK - Substance List

Butane (CAS 106-97-8) Propane (CAS 74-98-6)

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

Butane (CAS 106-97-8) Propane (CAS 74-98-6)

US. Pennsylvania Worker and Community Right-to-Know Law

Butane (CAS 106-97-8) Propane (CAS 74-98-6)

Product name: RELEASE II

US. Rhode Island RTK

Butane (CAS 106-97-8) Propane (CAS 74-98-6)

US. California Proposition 65

California Safe Drinking Water and Toxic Enforcement Act of 1986 (Proposition 65): This material is not known to contain any chemicals currently listed as carcinogens or reproductive toxins.

International Inventories

Country(s) or region	Inventory name	On inventory (yes/no)*
Australia	Australian Inventory of Chemical Substances (AICS)	No
Canada	Domestic Substances List (DSL)	No
Canada	Non-Domestic Substances List (NDSL)	No
China	Inventory of Existing Chemical Substances in China (IECSC)	No
Europe	European Inventory of Existing Commercial Chemical Substances (EINECS)	No

Europe European List of Notified Chemical Substances (ELINCS) No Japan Inventory of Existing and New Chemical Substances (ENCS) No Korea **Existing Chemicals List (ECL)** No **New Zealand New Zealand Inventory** No **Philippines** Philippine Inventory of Chemicals and Chemical Substances No (PICCS)

United States & Puerto Rico Toxic Substances Control Act (TSCA) Inventory

Yes

*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).

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

10-13-2015 **Issue date**

Version #

Disclaimer The information provided in this Safety Data Sheet is correct to the best of our knowledge,

information and belief at the date of its publication. The information given is designed only as a guidance for safe handling, use, processing, storage, transportation, disposal and release and is not to be considered a warranty or quality specification. The information relates only to the specific material designated and may not be valid for such material used in combination with

any other materials or in any process, unless specified in the text.