



Safety Data Sheet

Electrical contact cleaner

SECTION 1. IDENTIFICATION

Product Identifier	Electrical contact cleaner
Part number	TNDS8007
Product Family	Mixture
Recommended Use	Cleaner.
Restrictions on Use	Not applicable.
Manufacturer	Shrader Canada Limited, 830 Progress Court, Oakville, ON, L6L 6K1, +1.905.847.0222, www.shradercanada.com
Emergency Phone No.	CANUTEC, +1.613.996.6666, Operation hours: 24/7

SECTION 2. HAZARDS IDENTIFICATION

GHS Classification

Flammable aerosol - Category 1; Gas under pressure - Compressed gas; Skin corrosion/irritation - Category 2; Serious eye damage/eye irritation - Category 2A; Specific target organ toxicity (single exposure) - Category 3; Aspiration hazard - Category 1

GHS Label Elements



Danger

Extremely flammable aerosol.
Contains gas under pressure; may explode if heated.
Pressurized container: may burst if heated.
May be fatal if swallowed and enters airways.
Causes skin irritation.
Causes serious eye irritation.
May cause respiratory irritation.
Pressurized container: Do not pierce or burn, even after use.
May cause drowsiness or dizziness.

Keep away from heat, sparks, open flames, and hot surfaces. – No smoking.
Do not spray on an open flame or other ignition source.
Wash hands and skin thoroughly after handling.
Avoid breathing vapours, spray.
Use only outdoors or in a well-ventilated area.
Wear eye protection/face protection.

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IF SWALLOWED: Immediately call a POISON CENTRE/doctor.
IF ON SKIN: Wash with plenty of water.
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 CENTRE/doctor if you feel unwell.
Do NOT induce vomiting.
If skin irritation occurs: Get medical advice/attention.
If eye irritation persists: Get medical advice/attention.
Take off contaminated clothing and wash it before reuse.

Store in a well-ventilated place. Keep container tightly closed.
Store locked up.
Protect from sunlight. Do not expose to temperatures exceeding 50 °C/122 °F.

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

SECTION 3. COMPOSITION/INFORMATION ON INGREDIENTS

Mixture:

Chemical Name	CAS No.	%	Other Identifiers
Heptane, branched, cyclic and linear	426260-76-6	60 - 100	
Isopropanol	67-63-0	1 - 5	
Carbon dioxide gas	124-38-9	1 - 5	

SECTION 4. FIRST-AID MEASURES

First-aid Measures

Inhalation

Move to fresh air. If not breathing, give artificial respiration, immediately call a poison centre.
Not a hazard under normal conditions of use.

Skin Contact

Immediately wash gently and thoroughly with lukewarm, gently flowing water and mild soap for 15-20 minutes. Take off immediately contaminated clothing, shoes and leather goods (e.g. watchbands, belts). If skin irritation occurs get medical advice/attention.

Eye Contact

Immediately rinse the contaminated eye(s) with lukewarm, gently flowing water for 15-20 minutes, while holding the eyelid(s) open. Remove contact lenses, if present and easy to do. If eye irritation persists, get medical advice/attention.

Ingestion

Do not induce vomiting. Never give anything by mouth if victim is rapidly losing consciousness, or is unconscious or convulsing. Do not induce vomiting. Drink two glasses of water. If vomiting occurs naturally, lie on your side in the recovery position. Rinse mouth with water again. Immediately call a Poison Centre or doctor.

First-aid Comments

Get medical advice/attention if you feel unwell or are concerned.

Most Important Symptoms and Effects, Acute and Delayed

None known.

Immediate Medical Attention and Special Treatment

Medical Conditions Aggravated by Exposure

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None known.

SECTION 5. FIRE-FIGHTING MEASURES

Extinguishing Media

Suitable Extinguishing Media

Small fire: carbon dioxide or dry chemical.

Unsuitable Extinguishing Media

Do not use a direct stream of water.

Specific Hazards Arising from the Chemical

Extremely flammable liquid and vapour. Can ignite at room temperature. Releases vapour that can form explosive mixture with air. sprayed product will project a flame on contact with an ignition source.

Do not use on vehicles unless cool.

containers may explode if heated.

Vapours are heavier than air. May travel a considerable distance to a source of ignition and flash back to a leak or open container.

Carbon oxides, and other unidentified organic compounds.

Special Protective Equipment and Precautions for Fire-fighters

Fight fire from a safe distance or a protected location.

SECTION 6. ACCIDENTAL RELEASE MEASURES

Personal Precautions, Protective Equipment, and Emergency Procedures

Use the personal protective equipment recommended in Section 8 of this safety data sheet.

Environmental Precautions

If the spill is inside a building, prevent product from entering drains, ventilation systems and confined areas. Do not allow into any sewer, on the ground or into any waterway.

Methods and Materials for Containment and Cleaning Up

Contain and soak up spill with absorbent that does not react with spilled product. Place used absorbent into suitable, covered, labelled containers for disposal.

Other Information

Report spills to local health, safety and environmental authorities, as required.

SECTION 7. HANDLING AND STORAGE

Precautions for Safe Handling

Do not spray on an open flame or other ignition source. Do not pierce or burn container, even after use. Eliminate heat and ignition sources such as sparks, open flames, hot surfaces and static discharge. Post "No Smoking" signs. Do not use on hot vehicles.

Containers of this material may contain hazardous residues when "emptied". Avoid breathing in this product. Avoid repeated or prolonged skin contact with product or with contaminated equipment/surfaces. Do not get in eyes, on skin or on clothing. Only use where there is adequate ventilation. Wash hands thoroughly after handling this material.

Conditions for Safe Storage

Store at temperatures not exceeding: 40°C.

Keep from freezing.

Keep away from children.

Store in an area that is: cool, dry, well-ventilated.

SECTION 8. EXPOSURE CONTROLS/PERSONAL PROTECTION

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Control Parameters

Chemical Name	ACGIH® TLV®		OSHA PEL	
	TWA	STEL [C]	TWA	Ceiling
Heptane, branched, cyclic and linear	400 ppm	500 ppm	2000 mg/m3	Not established
Isopropanol	200 ppm A4	400 ppm	980000 mg/m3	Not established
Carbon dioxide gas	5000 ppm	Not established	Not established	Not established

Appropriate Engineering Controls

Use local exhaust ventilation, if general ventilation is not adequate to control amount in the air. Provide eyewash and safety shower if contact or splash hazard exists.

Individual Protection Measures

Eye/Face Protection

Safety glasses with side shields.
Contact lenses should not be worn.

Skin Protection

Gloves made of: nitrile, neoprene.

Respiratory Protection

Not normally required if product is used as directed. If the TLV is exceeded, a NIOSH -approved respirator is advised.

SECTION 9. PHYSICAL AND CHEMICAL PROPERTIES

Basic Physical and Chemical Properties

Appearance	Clear colourless liquid.
Odour	Hydrocarbon
Odour Threshold	Not available
pH	Not applicable
Melting Point/Freezing Point	Not available (melting); Not available (freezing)
Initial Boiling Point/Range	Not available
Flash Point	-8 °C
Evaporation Rate	Not available
Flammability (solid, gas)	Extremely flammable aerosol
Upper/Lower Flammability or Explosive Limit	12.7% (upper); 2% (lower)
Vapour Pressure	Not available
Vapour Density (air = 1)	> 1
Relative Density (water = 1)	0.700 at 15 °C
Solubility	Insoluble in water
Partition Coefficient, n-Octanol/Water (Log Kow)	Not available
Auto-ignition Temperature	399 °C
Decomposition Temperature	Not available
Viscosity	< 14 centistokes at 40°C (kinematic)
Other Information	
VOC (%)	100
Flame projection	> 100 cm
NFPA Classification	Aerosol, Level 3

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SECTION 10. STABILITY AND REACTIVITY

Reactivity

Not reactive under normal conditions of use.

Chemical Stability

Normally stable.

Possibility of Hazardous Reactions

None expected under normal conditions of storage and use.

Conditions to Avoid

Open flames, sparks, static discharge, heat and other ignition sources.

Incompatible Materials

Increased risk of fire and explosion on contact with: strong oxidizing agents (e.g. perchloric acid).

Hazardous Decomposition Products

And other unidentified organic compounds.

SECTION 11. TOXICOLOGICAL INFORMATION

Reports have associated repeated and prolonged occupational overexposure to various organic solvents with internal organ, brain and nervous system damage.

Likely Routes of Exposure

Inhalation.

Skin contact.

Eye contact.

Ingestion.

Acute Toxicity

Chemical Name	LC50	LD50 (oral)	LD50 (dermal)
Heptane, branched, cyclic and linear	~ 25000 ppm (rat) (4-hour exposure)	> 15000 mg/kg (rat)	Not available
Isopropanol	17000 ppm (rat) (4-hour exposure)	4720 mg/kg (male rat)	12890 mg/kg (rabbit)

LC50: Not applicable.

LD50 (oral): Not applicable.

LD50 (dermal): Not applicable.

Skin Corrosion/Irritation

Moderate to severe irritant, depending on duration of exposure.

Serious Eye Damage/Irritation

Moderate to severe irritant.

STOT (Specific Target Organ Toxicity) - Single Exposure

Inhalation

High concentrations may cause respiratory irritation and central nervous system depression with results ranging from dizziness and headache to unconsciousness.

Skin Absorption

May cause defatting and produce dermatitis.

Ingestion

If large amounts are swallowed symptoms may include nausea, vomiting, stomach cramps and diarrhea.

Aspiration Hazard

May cause lung damage if aspirated based on physical properties (e.g. kinematic viscosity) and chemical family (hydrocarbon). Aspiration into the lungs during swallowing or subsequent vomiting may cause chemical pneumonitis,

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which can be fatal.

STOT (Specific Target Organ Toxicity) - Repeated Exposure

No information was located.

Respiratory and/or Skin Sensitization

Not known to be a respiratory sensitizer.

Not known to be a skin sensitizer.

Carcinogenicity

Chemical Name	ACGIH®	IARC	NTP	OSHA
Heptane, branched, cyclic and linear	Not Listed	Not evaluated	Not Listed	Not Listed
Isopropanol	A4	Group 3	Not Listed	Not Listed

No ingredients of this product have been evaluated for carcinogenicity by the International Agency for Research on Cancer (IARC), the American Conference of Governmental Industrial Hygienists (ACGIH®) or the US National Toxicology Program (NTP).

Other Information

synergistic products:

isopropanol increases the hepatotoxic effects of chlorinated aliphatic hydrocarbons,

No information was located for: LC50, LD50 (oral), LD50 (dermal), Development of Offspring, Sexual Function and Fertility, Effects on or via Lactation, Germ Cell Mutagenicity, Interactive Effects

SECTION 12. ECOLOGICAL INFORMATION

This section is not required by WHMIS. This section is not required by OSHA.

SECTION 13. DISPOSAL CONSIDERATIONS

Disposal Methods

Contents under pressure. The container for this product can present explosion or fire hazards, even when emptied. Do not cut, puncture, or weld on or near this container. Dispose of in accordance with municipal, provincial/state or federal regulations.

SECTION 14. TRANSPORT INFORMATION

Regulation	UN No.	Proper Shipping Name	Transport Hazard Class(es)	Packing Group
Canadian TDG	UN1950	Aerosols	2.1	---
IATA (Air)	UN1950	Aerosols, flammable	2.1	---
IMDG (Marine)	UN1950	Aerosols	2.1	---

Special Precautions for User Not applicable

Transport in Bulk According to Annex II of MARPOL 73/78 and the IBC Code

Not applicable

Emergency Response Guide No. 126 EmS F-D, S-U

Other Information ICAO/IATA PI Y203/203
Product may ship as LTD QTY if TDG, ICAO/IATA or IMDG Limited Quantity provisions are met.

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SECTION 15. REGULATORY INFORMATION

Safety, Health and Environmental Regulations

Canada

This product has been classified in accordance with the hazard criteria of the Controlled Products Regulations and the SDS contains all of the information required by the Controlled Products Regulations.

Domestic Substances List (DSL) / Non-Domestic Substances List (NDSL)

All ingredients are listed on the DSL/NDSL.

CEPA - National Pollutant Release Inventory (NPRI)

(Isopropanol) Part 1A.

USA

Toxic Substances Control Act (TSCA) Section 8(b)

All ingredients are listed on the TSCA Inventory.

Additional USA Regulatory Lists

CERCLA: Not applicable.

California Proposition 65: Not applicable.

SARA Title III - Section 302: Not applicable.

SARA Title III - Section 313. (Isopropanol)

Massachusetts Right To Know: Not applicable.

New Jersey Right To Know. (Isopropanol). (Carbon dioxide gas)

Pennsylvania Right To Know. (Isopropanol). (Carbon dioxide gas)

SECTION 16. OTHER INFORMATION

NFPA Rating	Health - 2	Flammability - 3	Instability - 0
	Based on	Heptane, branched, cyclic and linear	
SDS Prepared By	Regulatory Compliance		
Phone No.	905.847.0222		
Key to Abbreviations	ACGIH® = American Conference of Governmental Hygienists CANUTEC = Canadian Transport Emergency Centre CAS = Chemical Abstract Service CCOHS = Canadian Centre for Occupational Health & Safety CNS = Central nervous system GESTIS = GESTIS Substance Database HSDB® = Hazardous Substances Data Bank IARC = International Agency for Research on Cancer ICAO = International Civil Aviation Organization IMDG = International Maritime Dangerous Goods Code LC = Lethal concentration LC = Lethal dose NFPA = National Fire Protection Association NTP = National Toxicology Program OSHA = US Occupational Safety and Health Administration PPM = Parts per million RTECS® = Registry of Toxic Effects of Chemical Substances STEL = Short term exposure limit TDG = Transportation of Dangerous Goods Regulations (Canada) TWA = Time weighted average		
References	Material Safety Data Sheet from manufacturer. CHEMINFO database. Canadian Centre for Occupational Health and Safety (CCOHS). HSDB® database. US National Library of Medicine. Available from Canadian Centre for Occupational Health and Safety (CCOHS). ECHA - European Chemical Agency, Classification and Labelling Inventory		

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GESTIS Substance Database

Registry of Toxic Effects of Chemical Substances (RTECS®) database. Accelrys, Inc.

Available from Canadian Centre for Occupational Health and Safety (CCOHS).

OECD - The Global Portal to Information on Chemical Substances - eChemPortal, 2015.

Disclaimer

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