SAFETY DATA SHEET

Issue Date 4/30/2015 **Revision Date** 4/30/2015 **Version** 1

1. IDENTIFICATION

Product identifier
Product Name: Safety Solvent II

Other means of identification
Product code: F-870
Synonyms: None

Recommended use of the chemical and restrictions on use
Recommended Use: Lubricant.
Uses advised against: No information available

Details of the supplier of the safety data sheet
Supplier Address
FRONTIER PERFORMANCE LUBRICANTS INC
PO BOX 1777
LODI, CA 95241
Phone: (800)-807-4496
Fax: (209)-334-6408

Emergency telephone number
Emergency Telephone: PERS (800)-633-8253

2. HAZARDS IDENTIFICATION

Physical Hazard Classification: Flammable Aerosols, Category 1

Warning

Physical Hazard Precautionary Statements:

Contains gas under pressure; may explode if heated.

Health Hazard Classification(s):

Acute Toxicity - Oral - Level 4	Warning
Acute Toxicity – Dermal – Level 4	Warning
Acute Toxicity - Inhalation - Level 4	Warning
Skin Corrosion/Irritation -Level 3	Warning
Eye Damage/Irritation -Level 2B	Warning
Aspiration Hazard - Level 2	Warning

Health Hazard Statements:

Harmful if swallowed.
Harmful in contact with skin.
Causes skin irritation.
Causes serious eye irritation.
Harmful if inhaled.
May cause cancer.

3. COMPOSITION/INFORMATION ON INGREDIENTS

	CAS #	% Range	PEL	TLV
CARBON DIOXIDE	124-38-9	1%-5%	5,000 PPM	5,000 PPM; 30,000 PPM, 15
DICHLOROMETHANE *	75-09-2	40%-50%	TWA 25 PPM	ACGIH 50 PPM
TETRACHLOROETHYLENE *	127-18-4	40%-50%	25 PPM	25 PPM

Specific chemical identity and exact percentages are withheld as Trade Secret.

4. FIRST AID MEASURES

IF SWALLOWED: Immediately call a POISON CENTER/doctor/physician.
IF SWALLOWED: Call a POISON CENTER/doctor if you feel unwell.
IF ON SKIN: Wash with plenty of water.
IF INHALED: Call a POISON CENTER or doctor/physician if you feel unwell.
IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing.
If exposed or concerned: Get medical advice/attention.
Call a POISON CENTER/doctor/physician if you feel unwell. See section 12 if specific treatment is applicable.
See Section 12 if specific treatment is applicable.
If skin irritation occurs: Get medical advice/attention.
If eye irritation persists: Get medical advice/attention.
Take off contaminated clothing.
Wash contaminated clothing before reuse.

GENERAL: This material is an aspiration hazard and defats the skin. Breathing vapors of high concentrations may cause CNS depression.

EYE CONTACT: Slightly irritating but does not injure eye tissue.

SKIN CONTACT: Low order of toxicity. Frequent or prolonged contact may irritate and cause dermatitis. Skin contact may aggravate an existing dermatitis condition.

INHALATION: High vapor/aerosol concentrations (greater than approximately 100 ppm) are irritating to the eyes and the respiratory tract, may cause headaches, dizziness, anesthesia, drowsiness, unconsciousness, and other central nervous system effects, including death.

INGESTION: Small amounts of this product aspirated into the respiratory system during ingestion or vomiting may cause mild to severe pulmonary injury, possibly minimal toxicity.

FIRST AID

EYE CONTACT: Flush eyes with large amounts of water until irritation subsides. If irritation persists, get medical attention.

SKIN CONTACT: Flush with large amounts of water; use soap if available. Remove grossly contaminated clothing, including shoes, and launder before reuse.

INHALATION: Using proper respiratory protection, immediately remove the affected victim from exposure. Administer artificial respiration if breathing is stopped. Keep at rest. Call for prompt medical attention

INGESTION: If swallowed, DO NOT induce vomiting. Keep at rest. Get prompt medical attention.

PRECAUTIONS

SPECIAL PRECAUTIONS: Health studies have shown that many hydrocarbons pose potential human health risks which may vary from person to person. As a precaution, exposure to liquids, vapors, mists or fumes should be minimized.

PERSONAL PROTECTION: For open systems where contact is likely, wear safety glasses with side shields, long sleeves, and chemical resistant gloves. Where concentrations in air may exceed the limits, work practice or other means of exposure reduction are not adequate, NIOSH/MSHA approved respirators may be necessary to prevent overexposure by inhalation.

VENTILATION: The use of mechanical dilution ventilation is recommended whenever this product is used in a confined space, is heated above ambient temperatures, or is agitated.

5. FIRE-FIGHTING MEASURES

FIRE AND EXPLOSION HAZARDS: This product releases Flammable Vapors at well below ambient temperatures and readily forms flammable mixtures with air exposed to an ignition source. It will burn in the open or be explosive in confined spaces. Its vapors are heavier than air and may travel long distances to a point of ignition, and then flash back. Alkaline/chlorine gas mixtures have produced explosions.

EXTINGUISHING MEDIA: Dry Chemical. CO2. Halogenated Extinguishing Agent. Stop Gas Flow.

SPECIAL FIREFIGHTING PROCEDURES: Gas fires should not be extinguished unless the gas flow can be stopped immediately. Allow the fire to burn itself out. If the source cannot be shut off immediately, all equipment and surfaces exposed to the fire should be cooled with water to prevent over-heating flash- backs, or explosions. Control fire until gas supply can be shut off. Use proper protective equipment. Use fresh air respirator when exposure to hazardous concentrations of toxic gases is possible.

FIRE FIGHTING: Use water spray to cool fire exposed surfaces and to protect personnel. Isolate "fuel" supply from fire. Use foam, dry chemical, or water spray to extinguish fire. Avoid spraying water directly into storage containers due to danger of boiling over. This liquid is volatile and gives off invisible vapors. Either the liquid or vapor may settle in low areas or travel some distance along the ground or surface to ignition sources where they may ignite or explode.

6. ACCIDENTAL RELEASE MEASURES

STEPS TO BE TAKEN IN CASE CONTAINER IS PUNCTURED AND MATERIAL IS RELEASED:
Clean up area by mopping or with absorbent materials and place in closed container for disposal. Consult Federal, State, and local disposal authorities.

WASTE DISPOSAL METHOD: Consult local authorities for proper waste disposal procedures. Empty de-pressurized containers cannot be reused. Cans which are pressurized or contain liquid must be disposed of in a permitted waste management facility. Consult Federal, State, and local disposal authorities for approved procedures.

7. HANDLING AND STORAGE

Use Personal protective equipment as required.
Store locked up.

VENTILATION REQUIREMENT:	Use adequate level exhaust ventilation. Note: Where carbon monoxide may be generated, special ventilation may be required. Local exhaust recommended when appropriate to control employee exposure.
RESPIRATORY PROTECTION:	Based on contamination level and working limits of the respirator, use a respirator approved by NIOSH/MSHA.
EYES:	Face shield and goggles or chemical goggles should be worn.
GLOVES:	Impervious gloves should be worn. Gloves contaminated with the product should be discarded. Polyfluorinated polyethylene has been suggested.
OTHER CLOTHING EQUIPMENT:	Standard work clothing. Standard work shoes; discard if shoes cannot be decontaminated. Store contaminated clothing in well ventilated cabinets or closed containers. Wash contaminated clothing and dry before reuse.
RESPIRATORY PROTECTION:	In situations where vapor concentrations exceed the recommended exposure limits, a NIOSH approved organic vapor cartridge or air-supplying respirator should be worn.

8. EXPOSURE CONTROLS/PERSONAL PROTECTION

Obtain special instructions before use.
Do not handle until all safety precautions have been read and understood.
Avoid breathing dust/fume/gas/mist/vapors/spray.
Wash hands and exposed areas thoroughly after handling.

Do not eat, drink or smoke when using this product.
Use only outdoors or in a well-ventilated area.
Wear protective gloves/protective clothing/eye protection/face protection.
Use personal protective equipment as required.

VENTILATION REQUIREMENT:	Use adequate level exhaust ventilation. Note: Where carbon monoxide may be generated, special ventilation may be required. Local exhaust recommended when appropriate to control employee exposure.
RESPIRATORY PROTECTION:	Based on contamination level and working limits of the respirator, use a respirator approved by NIOSH/MSHA.
EYES:	Face shield and goggles or chemical goggles should be worn.
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OTHER CLOTHING EQUIPMENT:	Standard work clothing. Standard work shoes; discard if shoes can not be decontaminated. Store contaminated clothing in well ventilated cabinets or closed containers. Wash contaminated clothing and dry before reuse.
RESPIRATORY PROTECTION:	In situations where vapor concentrations exceed the recommended exposure limits, a NIOSH approved organic vapor cartridge or air-supplying respirator should be worn.

9. PHYSICAL AND CHEMICAL PROPERTIES

Flash Point (CCP):	N/A
Boiling Point for Product:	Liquid: 185°C
Vapor Pressure for Product:	8 mm Hg @ 20°C
Vapor Density for Product:	>1
Specific Gravity:	1.44
V.O.C.:	0 g/l
Water Solubility:	Nil
Appearance:	Clear Solvent Spray

10. STABILITY AND REACTIVITY

STABILITY: Stable

CONDITIONS TO AVOID: Temperatures above 130 degree F.

HAZARDOUS POLYMERIZATION: Will not occur

MATERIALS AND CONDITIONS TO AVOID INCOMPATIBILITY: Strong oxidizing agents

HAZARDOUS DECOMPOSITION PRODUCTS: None

11. TOXICOLOGICAL INFORMATION

DICHLOROMETHANE * 75-09-2
Oral rat LD50: 1600 mg/kg; inhalation rat LC50: 52 gm/m3; investigated as a tumorigen, mutagen, reproductive effector.

TETRACHLOROETHYLENE * 127-18-4
Acute oral toxicity (LD50): 2629 mg/kg [Rat]. Acute dermal toxicity (LD50): >3228 mg/kg [Rabbit]. Acute toxicity of the vapor (LC50): 5200 4 hours [Mouse].
Chronic Effects on Humans:
CARCINOGENIC EFFECTS: Classified A3 (Proven for animal.) by ACGIH. Classified 2A (Probable for human.) by IARC, 2 (Some evidence.) by NTP. MUTAGENIC EFFECTS: Mutagenic for bacteria and/or yeast. May cause damage to the following

organs: kidneys, liver, peripheral nervous system, upper respiratory tract, skin, central nervous system (CNS).
Other Toxic Effects on Humans:
Hazardous in case of skin contact (irritant), of inhalation. Slightly hazardous in case of skin contact (permeator), of ingestion. Special Remarks on Toxicity to Animals:
Lowest Published Lethal Dose/Conc: LDL [Rabbit] - Route: Oral; Dose: 5000 mg/kg LDL [Dog] - Route: Oral; Dose: 4000 mg/kg LDL [Cat] - Route: Oral; Dose: 4000 mg/kg
Special Remarks on Chronic Effects on Humans:
May cause adverse reproductive effects and birth defects (teratogenic). May affect genetic material (mutagenic). May cause cancer.
Special Remarks on other Toxic Effects on Humans:
Acute Potential Health Effects: Skin: Causes skin irritation with possible dermal blistering or burns. Symptoms may include redness, itching, pain, and possible dermal blistering or burns. It may be absorbed through the skin with possible systemic effects. A single prolonged skin exposure is not likely to result in the material being absorbed in harmful amounts. Eyes: Contact causes transient eye irritation, lacrimation. Vapors cause eye/conjunctival irritation. Symptoms may include redness and pain. Inhalation: The main route to occupational exposure is by inhalation since it is readily absorbed through the lungs. It causes respiratory tract irritation, . It can affect behavior/central nervous system (CNS depressant and anesthesia ranging from slight inebriation to death, vertigo, somnolence, anxiety, headache, excitement hallucinations, muscle incoordination, dizziness, light headiness, disorientation, seizures, emotional instability, stupor, and coma). It may cause pulmonary edema
Ingestion: It can cause nausea, vomiting, anorexia, diarrhea, bloody stool. It may affect the liver, urinary system (proteinuria, hematuria, renal failure, and renal tubular disorder), heart (arrhythmias). It may affect behavior/central nervous system with symptoms similar to that of inhalation. Chronic Potential Health Effects: Skin: Prolonged or repeated skin contact may result in excessive drying of the skin, and irritation. Ingestion/Inhalation: Chronic exposure can affect the liver (hepatitis, fatty liver degeneration), kidneys, spleen, and heart (irregular heartbeat/arrhythmias, cardiomyopathy, abnormal EEG), brain, behavior/central nervous system/peripheral nervous system (impaired memory, numbness of extremities, peripheral neuropathy).

12. ECOLOGICAL INFORMATION

DICHLOROMETHANE * 75-09-2
Environmental Fate:
When released into the soil, this material may leach into groundwater. When released into the soil, this material is expected to quickly evaporate. When released into water, this material may biodegrade to a moderate extent. When released to water, this material is expected to quickly evaporate. This material has a log octanol-water partition coefficient of less than 3.0. This material is not expected to significantly bio accumulate. When released into the air, this material may be moderately degraded by reaction with photochemically produced hydroxyl radicals. When released into the air, this material is expected to have a half-life of greater than 30 days. When released into the air, this material may be removed from the atmosphere to a moderate extent by wet deposition.
Environmental Toxicity:
The LC50/96-hour values for fish are over 100 mg/l. This material is not expected to be toxic to aquatic life.

TETRACHLOROETHYLENE * 127-18-4
Ecotoxicity:
Ecotoxicity in water (LC50): 18.4 mg/l 96 hours [Fish (Fatthead Minnow)]. 18 mg/l 48 hours [Daphnia (daphnia)]. 5 mg/l 96 hours [Fish (Rainbow Trout)]. 13 mg/l 96 hours [Fish (Bluegill sunfish)].
Products of Biodegradation:
Possibly hazardous short term degradation products are not likely. However, long term degradation products may arise.
Toxicity of the Products of Biodegradation:
The product itself and its products of degradation are not toxic.

If applicable, IARL, NPT and OSHA carcinogens and chemicals subject to the reporting requirements of SARA Title III, Section 313 are identified in Section III with an "*". Additional ecological information is Not Determined.

13. DISPOSAL CONSIDERATIONS

Dispose of contents/container in accordance with local regulations.

WASTE DISPOSAL METHOD: Consult local authorities for proper waste disposal procedures. Empty de-pressurized containers cannot be reused. Cans which are pressurized or contain liquid must be disposed of in a permitted waste management facility. Consult Federal, State, and local disposal authorities for approved procedures.

14. TRANSPORT INFORMATION

DOT Proper Shipping Name: UN1950
Aerosols, flammable, (each not exceeding 1L capacity) 2.2 Limited Quantity

15. REGULATORY INFORMATION

	CAS#	PEL	TLV
CARBON DIOXIDE	124-38-9	5,000 PPM	5,000 ppm; 30,000 ppm, 15
DICHLOROMETHANE *	75-09-2	TWA 25 ppm	ACGIH 50 ppm
TETRACHLOROETHYLENE *	127-18-4	25 PPM	25 PPM

State of California SAFE DRINKING WATER AND TOXIC ENFORCEMENT ACT OF 1986.
WARNING: IN ACCORDANCE WITH PROP 65, THIS PRODUCT CONTAINS A CHEMICAL(S) KNOWN TO THE STATE OF CALIFORNIA TO CAUSE CANCER, BIRTH DEFECTS AND OTHER REPRODUCTIVE HARM.

If applicable, IARL, NPT and OSHA carcinogens and chemicals subject to the reporting requirements of SARA Title III, Section 313 are identified above with an "*"

16. OTHER INFORMATION

Consumer Product Safety Act Certification.
This product was evaluated by Frontier Lubricants and is certified to be in compliance with the provisions of the Consumer Product Safety Act, the Federal Hazardous Substances Act, and the Poison Prevention Packaging Act, as applicable. This product was manufactured at the location identified on the SDS. The date of manufacture is stamped on the product container. No testing is required to certify compliance with the above mentioned regulation.

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Revision Date 4/30/2015
Revision Note Not applicable

Disclaimer
The information provided in this Material 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.

End of Safety Data Sheet