

Safety Data Sheet

according to Federal Register / Vol. 77, No. 58 / Monday, March 26, 2012 / Rules and Regulations Revision Date: 05/01/15 Date of issue: 05/01/15

SECTION 1: IDENTIFICATION

Product Identifier

Product Name: Crude Tall Oil J-29

Synonyms: CTO; Tall oil

<u>Intended Use of the Product</u> Feedstock for tall oil refineries

Name, Address, and Telephone of the Responsible Party

Manufacturer

CHEMTRADE LOGISTICS INC. 155 Gordon Baker Road

Suite 300

Toronto, Ontario M2H 3N5 For MSDS Info: (416) 496-5856 www.chemtradelogistics.com

Emergency Telephone Number

Emergency number : Canada: CANUTEC +1-613-996-6666 / US: CHEMTREC +1-800-424-9300

Chemtrade Emergency Contact: (866) 416-4404

Version: 1.0

For Chemical Emergency, Spill, Leak, Fire, Exposure, or Accident, call CHEMTREC - Day or Night

SECTION 2: HAZARDS IDENTIFICATION

Classification of the Substance or Mixture

Classification (GHS-US)

Resp. Sens. 1 H334 Skin Sens. 1 H317 Aquatic Acute 2 H401 Aquatic Chronic 2 H411

Label Elements

GHS-US Labeling

Hazard Pictograms (GHS-US)



GH508



Signal Word (GHS-US) : Danger

Hazard Statements (GHS-US) : H317 - May cause an allergic skin reaction

H334 - May cause allergy or asthma symptoms or breathing difficulties if inhaled

H401 - Toxic to aquatic life

H411 - Toxic to aquatic life with long lasting effects

Precautionary Statements (GHS-US): P261 - Avoid breathing mist, spray, vapors

P272 - Contaminated work clothing should not be allowed out of the workplace

P273 - Avoid release to the environment

P280 - Wear eye protection, protective clothing, protective gloves

P284 - Wear respiratory protection

P302+P352 - IF ON SKIN: Wash with plenty of soap and water

P304+P340 - IF INHALED: Remove person to fresh air and keep at rest in a position

comfortable for breathing

P321 - Specific treatment (see Section 4)

P333+P313 - If skin irritation or rash occurs: Get medical advice/attention P342+P311 - If experiencing respiratory symptoms: Call a POISON CENTER or

doctor/physician

P362+P364 - Take off contaminated clothing and wash it before reuse

P391 - Collect spillage

05/01/15 EN (English US) SDS#: CHE-1060S 1/7

Safety Data Sheet

according to Federal Register / Vol. 77, No. 58 / Monday, March 26, 2012 / Rules and Regulations

P501 - Dispose of contents/container according to local, regional, national, and international regulations

Other Hazards

Other Hazards Not Contributing to the Classification: Product may release Hydrogen Sulphide: a specific assessment of inhalation risks from the presence of hydrogen sulphide in tank headspaces, confined spaces, product residue, tank waste and waste water, and unintentional releases should be made to help determine controls appropriate to local circumstances.

Unknown Acute Toxicity (GHS-US) Not available

SECTION 3: COMPOSITION/INFORMATION ON INGREDIENTS

Substances

Name	Product identifier	% (w/w)	Classification (GHS-US)
Tall oil fatty acids	(CAS No) 61790-12-3	25 - 45	Skin Sens. 1, H317
Tall-oil pitch	(CAS No) 8016-81-7	25 - 50	Not classified
Rosin	(CAS No) 8050-09-7	20 - 35	Resp. Sens. 1, H334 Skin Sens. 1, H317 Aquatic Acute 2, H401
			Aquatic Chronic 2, H411

Full text of H-phrases: see section 16

SECTION 4: FIRST AID MEASURES

Description of First Aid Measures

General: Never give anything by mouth to an unconscious person. If you feel unwell, seek medical advice (show the label where possible).

Inhalation: When symptoms occur: go into open air and ventilate suspected area. 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 CENTER or doctor/physician. **Skin Contact:** Remove contaminated clothing. Drench affected area with water for at least 15 minutes. Wash with plenty of soap and

Eye Contact: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing. **Ingestion:** Rinse mouth. Do NOT induce vomiting.

water. If skin irritation or rash occurs: Get medical advice/attention. Wash contaminated clothing before reuse.

Most Important Symptoms and Effects Both Acute and Delayed

General: May cause sensitization by inhalation and by skin contact.

Inhalation: May cause allergy or asthma symptoms or breathing difficulties if inhaled.

Skin Contact: May cause an allergic skin reaction.

Eye Contact: Direct contact with the eyes is likely irritating.

Ingestion: Ingestion is likely to be harmful or have adverse effects.

Chronic Symptoms: None known.

Indication of Any Immediate Medical Attention and Special Treatment Needed

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

SECTION 5: FIRE-FIGHTING MEASURES

Extinguishing Media

Suitable Extinguishing Media: Alcohol foam, carbon dioxide, dry chemical. Use extinguishing media appropriate for surrounding fire.

Unsuitable Extinguishing Media: Do not use water jet. Use of heavy stream of water may spread fire.

Special Hazards Arising From the Substance or Mixture

Fire Hazard: Not considered flammable but will burn at high temperatures.

Explosion Hazard: Product is not explosive.

Reactivity: Hazardous reactions will not occur under normal conditions. Under heated conditions or on contact with acids will produce the toxic gas sulfur dioxide. May release poisonous hydrogen sulfide.

Advice for Firefighters

Precautionary Measures Fire: Not available

Firefighting Instructions: Exercise caution when fighting any chemical fire.

Protection During Firefighting: Do not enter fire area without proper protective equipment, including respiratory protection.

05/01/15 EN (English US) SDS#: CHE-1060S 2/7

Safety Data Sheet

according to Federal Register / Vol. 77, No. 58 / Monday, March 26, 2012 / Rules and Regulations

Reference to Other Sections

Refer to section 9 for flammability properties.

SECTION 6: ACCIDENTAL RELEASE MEASURES

Personal Precautions, Protective Equipment and Emergency Procedures

General Measures: Avoid all eyes and skin contact and do not breathe vapor and mist. Do not allow product to spread into the environment.

For Non-Emergency Personnel

Protective Equipment: Use appropriate personal protection equipment (PPE).

Emergency Procedures: Evacuate unnecessary personnel.

For Emergency Personnel

Protective Equipment: Equip cleanup crew with proper protection.

Emergency Procedures: Ventilate area.

Environmental Precautions

Prevent entry to sewers and public waters. Avoid release to the environment.

Methods and Material for Containment and Cleaning Up

For Containment: Contain any spills with dikes or absorbents to prevent migration and entry into sewers or streams. Do not use combustible absorbents such as: saw dust or cellulosic materials.

Methods for Cleaning Up: Collect spillage. Clear up spills immediately and dispose of waste safely.

Reference to Other Sections

See heading 8, Exposure Controls and Personal Protection.

SECTION 7: HANDLING AND STORAGE

Precautions for Safe Handling

Hygiene Measures: Handle in accordance with good industrial hygiene and safety procedures. Wash hands and other exposed areas with mild soap and water before eating, drinking, or smoking and again when leaving work. Contaminated work clothing should not be allowed out of the workplace. Wash contaminated clothing before reuse.

Conditions for Safe Storage, Including Any Incompatibilities

Technical Measures: Product may release Hydrogen Sulphide: a specific assessment of inhalation risks from the presence of hydrogen sulphide in tank headspaces, confined spaces, product residue, tank waste and waste water, and unintentional releases should be made to help determine controls appropriate to local circumstances.

Storage Conditions: Store in a dry, cool and well-ventilated place. Keep container closed when not in use.

Incompatible Materials: Strong oxidizers.

Specific End Use(s) Feedstock for tall oil refineries

SECTION 8: EXPOSURE CONTROLS/PERSONAL PROTECTION

Control Parameters

Rosin (8050-09-7)		
Mexico	OEL TWA (mg/m³)	0.1 mg/m³
Québec	VEMP (mg/m³)	0.1 mg/m³

Exposure Controls

Appropriate Engineering Controls: Emergency eye wash fountains should be available in the immediate vicinity of any potential exposure. Provide exhaust ventilation or other engineering controls to keep the airborne concentrations of vapor or mists below the applicable workplace exposure limits. Ensure all national/local regulations are observed.

Personal Protective Equipment: Protective goggles. Gloves. Protective clothing. Insufficient ventilation: wear respiratory protection. **Materials for Protective Clothing:** Chemically resistant materials and fabrics.

Hand Protection: Wear chemically resistant protective gloves.

Eye Protection: Chemical goggles or safety glasses.

Skin and Body Protection: Not available

Respiratory Protection: If exposure limits are exceeded or irritation is experienced, NIOSH approved respiratory protection should

be worn.

Other Information: When using, do not eat, drink or smoke.

05/01/15 EN (English US) SDS#: CHE-1060S 3/7

Safety Data Sheet

according to Federal Register / Vol. 77, No. 58 / Monday, March 26, 2012 / Rules and Regulations

SECTION 9: PHYSICAL AND CHEMICAL PROPERTIES

Information on Basic Physical and Chemical Properties

Physical State : Liquid

Appearance: Viscous,BrownOdor: Not availableOdor Threshold: Not available

pH : 2 - 4

Relative Evaporation Rate (butylacetate=1): Not availableMelting Point: Not availableFreezing Point: Not availableBoiling Point: 121.1 °C (250°F)

Flash Point : 195 °C (379.4°F) (ASTM D93)

Auto-ignition Temperature Not available **Decomposition Temperature** Not available Flammability (solid, gas) Not available **Lower Flammable Limit** Not available **Upper Flammable Limit** Not available Not available **Vapor Pressure** Relative Vapor Density at 20 °C Not available **Relative Density** Not available **Specific Gravity** 0.95 - 1.0

Solubility : Water: Insoluble in Water (Not Volatile)

Partition coefficient: n-octanol/water : Not available Viscosity : Not available

Explosion Data – Sensitivity to Mechanical Impact : Not expected to present an explosion hazard due to mechanical impact.

Explosion Data – Sensitivity to Static Discharge : Not expected to present an explosion hazard due to static discharge.

SECTION 10: STABILITY AND REACTIVITY

Reactivity: Hazardous reactions will not occur under normal conditions. Under heated conditions or on contact with acids will produce the toxic gas sulfur dioxide. May release poisonous hydrogen sulfide.

Chemical Stability: Stable at standard temperature and pressure.

Possibility of Hazardous Reactions: Hazardous polymerization will not occur. **Conditions to Avoid:** Sparks, heat, open flame and other sources of ignition.

Incompatible Materials: Strong oxidizers. Strong acids.

Hazardous Decomposition Products: Carbon oxides (CO, CO2).

SECTION 11: TOXICOLOGICAL INFORMATION

Information on Toxicological Effects - Product

Acute Toxicity: Not classified LD50 and LC50 Data: Not available Skin Corrosion/Irritation: Not classified

pH: 2 - 4

Serious Eye Damage/Irritation: Not classified

pH: 2 - 4

Respiratory or Skin Sensitization: May cause allergy or asthma symptoms or breathing difficulties if inhaled. May cause an allergic

skin reaction.

Germ Cell Mutagenicity: Not classified

Teratogenicity: Not available **Carcinogenicity:** Not classified

Specific Target Organ Toxicity (Repeated Exposure): Not classified

Reproductive Toxicity: Not classified

05/01/15 EN (English US) SDS#: CHE-1060S 4/7

Safety Data Sheet

according to Federal Register / Vol. 77, No. 58 / Monday, March 26, 2012 / Rules and Regulations

Specific Target Organ Toxicity (Single Exposure): Not classified

Aspiration Hazard: Not classified

Symptoms/Injuries After Inhalation: May cause allergy or asthma symptoms or breathing difficulties if inhaled.

Symptoms/Injuries After Skin Contact: May cause an allergic skin reaction.

Symptoms/Injuries After Eye Contact: Direct contact with the eyes is likely irritating.

Symptoms/Injuries After Ingestion: Ingestion is likely to be harmful or have adverse effects.

Chronic Symptoms: None known.

Information on Toxicological Effects - Ingredient(s)

LD50 and LC50 Data:

Tall oil fatty acids (61790-12-3)	
LD50 Oral Rat	7600 mg/kg
Rosin (8050-09-7)	
LD50 Dermal Rabbit	> 2500 mg/kg
Tall-oil pitch (8016-81-7)	
LD50 Oral Rat	> 3200 mg/kg

SECTION 12: ECOLOGICAL INFORMATION

Toxicity

Ecology - General: Toxic to aquatic life with long lasting effects. Toxic to aquatic life.

Rosin (8050-09-7)		
EC50 Daphnia 1	3.8 - 5.4 mg/l (Exposure time: 48 h - Species: Daphnia magna)	
Tall-oil pitch (8016-81-7)		
LC50 Fish 1	> 400 mg/l (Exposure time: 96 h - Species: Brachydanio rerio [static])	
EC50 Daphnia 1	> 2000 mg/l (Exposure time: 48 h - Species: Daphnia magna)	

Persistence and Degradability

Crude Tall Oil J-29	
Persistence and Degradability	Not established. May cause long-term adverse effects in the environment.

Bioaccumulative Potential

Crude Tall Oil J-29	
Bioaccumulative Potential	Not established.
Tall oil fatty acids (61790-12-3)	
Log Pow	4.89 - 5.98 (at 25 °C)
Tall-oil pitch (8016-81-7)	
Log Pow	4.3 - 6.9 (at 25 °C)

Mobility in Soil Not available

Other Adverse Effects

Other Information: Avoid release to the environment.

SECTION 13: DISPOSAL CONSIDERATIONS

Waste Disposal Recommendations: Dispose of waste material in accordance with all local, regional, national, provincial, territorial and international regulations.

Ecology – Waste Materials: This material is hazardous to the aquatic environment. Keep out of sewers and waterways.

SECTION 14: TRANSPORT INFORMATION

14.1 In Accordance with DOT Not regulated for transport

14.2 In Accordance with IMDG Not regulated for transport

14.3 In Accordance with IATA Not regulated for transport

14.4 In Accordance with TDG Not regulated for transport

SECTION 15: REGULATORY INFORMATION

US Federal Regulations

05/01/15 EN (English US) SDS#: CHE-1060S 5/7

Safety Data Sheet

according to Federal Register / Vol. 77, No. 58 / Monday, March 26, 2012 / Rules and Regulations

Tall oil fatty acids (61790-12-3)		
Listed on the United States TSCA (Toxic Substa	nces Control Act) inventory	
EPA TSCA Regulatory Flag	Y2 - Y2 - indicates an exempt polymer that is a polyester and is made only from reactants included in a specified list of low concern reactants that comprises one of the eligibility criteria for the exemption rule.	
Rosin (8050-09-7)		
Listed on the United States TSCA (Toxic Substa	nces Control Act) inventory	
Tall-oil pitch (8016-81-7)		
Listed on the United States TSCA (Toxic Substances Control Act) inventory		

US State Regulations

The product and/or its components does not appear on any state Right to Know lists.

Canadian Regulations

Crude Tall Oil J-29	
WHMIS Classification	Class D Division 2 Subdivision A - Very toxic material causing other toxic effects
	Class D Division 2 Subdivision B - Toxic material causing other toxic effects
$\overline{(T)}$	
Tall oil fatty acids (61790-	12-3) L (Domestic Substances List) inventory.
WHMIS Classification Uncontrolled product according to WHMIS classification criteria	
Rosin (8050-09-7)	
Listed on the Canadian DSI	_ (Domestic Substances List) inventory.
WHMIS Classification	Class D Division 2 Subdivision A - Very toxic material causing other toxic effects
Tall-oil pitch (8016-81-7)	

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

SECTION 16: OTHER INFORMATION, INCLUDING DATE OF PREPARATION OR LAST REVISION

Revision date : 05/01/15

Listed on the Canadian DSL (Domestic Substances List) inventory.

Other Information : This document has been prepared in accordance with the SDS requirements of the OSHA

Hazard Communication Standard 29 CFR 1910.1200.

GHS Full Text Phrases:

Aquatic Acute 2	Hazardous to the aquatic environment - Acute Hazard Category 2	
Aquatic Chronic 2	Hazardous to the aquatic environment - Chronic Hazard Category 2	
Resp. Sens. 1	Respiratory sensitisation Category 1	
Skin Sens. 1	Skin sensitization Category 1	
H317	May cause an allergic skin reaction	
H334	May cause allergy or asthma symptoms or breathing difficulties if inhaled	
H401	Toxic to aquatic life	
H411	Toxic to aquatic life with long lasting effects	

Party Responsible for the Preparation of This Document

CHEMTRADE LOGISTICS, INC. For MSDS Info: (416) 496-5856

05/01/15 EN (English US) SDS#: CHE-1060S 6/7

Safety Data Sheet

according to Federal Register / Vol. 77, No. 58 / Monday, March 26, 2012 / Rules and Regulations

Handle product with due care and avoid unnecessary contact. This information is supplied under U.S. OSHA'S "Right to Know" (29 CFR 1910.1200) and Canada's WHMIS regulations. Although certain hazards are described herein, we cannot guarantee these are the only hazards that exist. The information contained herein is based on data available to us and is believed to be true and accurate but it is not offered as a product specification. No warranty, expressed or implied, regarding the accuracy of this data, the hazards connected with the use of the product, or the results to be obtained from the use thereof, is made and Chemtrade and its affiliates assume no responsibility. Chemtrade is a member of the CIAC (Chemistry Industry Association of Canada) and adheres to the codes and principles of Responsible Care™.



Chemtrade North America SDS Template

05/01/15 EN (English US) SDS#: CHE-1060S 7/7