



Safety Data Sheet

1. PRODUCT AND COMPANY IDENTIFICATION

Dyna-Plex 21C Rust-Tek 262

Rust preventative

Product Code: 14899

Miller Industrial Fluids, A PetroChoice Company

1751 W. Raymond Street

Indianapolis, Indiana 46221

Website: www.petrochoice.com

1-317-634-7300 Telephone

1-800-424-9300 US, Canada, Puerto Rico, Virgin Island - Emergency telephone (CHEMTREC)

+1-703-527-3887 International / Maritime Emergency telephone (CHEMTREC)

1-317-634-7300 Emergency telephone, after hours (CHEMTREC)

2. HAZARDS IDENTIFICATION

OSHA/HCS Status:

This material is considered hazardous by the OSHA Hazard Communication Standard (29 CFR 1910.1200).

Classification of the substance or mixture:

Flammable Liquids – Category 4

Acute Toxicity: Inhalation – Category 4

Skin Corrosion/Irritation – Category 1C

Serious Eye Damage/Eye Irritation – Category 1

Specific Target Organ Toxicity (Single Exposure) [Narcotic Effects] – Category 3

Aspiration Hazard – Category 1

GHS Label Elements

Hazard Pictogram:



Signal Word:

DANGER

Hazard Statement: H227 – Combustible liquid.
H332 – Harmful if inhaled.
H315 – Causes skin irritation.
H304 – May be fatal if swallowed and enters airways.
H336 – May cause drowsiness and dizziness.

Precautionary Statements

Prevention: Wear protective gloves. Wear eye or face protection. Keep away from flames and hot surfaces. - No smoking. Use only outdoors or in a well-ventilated area. Avoid breathing vapor. Wash hands thoroughly after handling.

Response: IF INHALED: Remove victim to fresh air and keep at rest in a position comfortable for breathing. Call a POISON CENTER or physician if you feel unwell. IF SWALLOWED: Immediately call a POISON CENTER or physician. Do NOT induce vomiting. IF ON SKIN: Wash with plenty of soap and water. Take off contaminated clothing. Wash contaminated clothing before reuse. If skin irritation occurs: Get medical attention. 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 attention.

Storage: Store locked up. Store in a well-ventilated place. Keep cool.

Disposal: Dispose of contents and container in accordance with all local, regional, national and international regulations.

Other Hazards: None known

3. COMPOSITION/INFORMATION ON INGREDIENTS

Chemical Name: None

Formula: Mixture

Other means of identification: None

CAS Number/other identifiers: None

Component	CAS Number	Concentration %
Petroleum distillates, hydrotreated light	64742-47-8	80-95
Petroleum distillates, hydrotreated heavy naphthenic	64742-52-5	5-10
Naphthalenesulfonic acid, dinonyl-, calcium salt (2:1)	57855-77-3	1-5

Any concentration shown as a range is to protect confidentiality or is due to process variation. Occupational exposure limits, if available, are listed in Section 8.

4. FIRST AID MEASURES

Eye contact

Immediately flush eyes with plenty of water, occasionally lifting the upper and lower eyelids. Check for and remove any contact lenses. Continue to rinse for at least 10 minutes. Get medical attention.

Inhalation

Remove victim to fresh air and keep at rest in a position comfortable for breathing. If it is suspected that gas or vapor is still present, the rescuer should wear an appropriate mask or self-contained breathing apparatus. If not breathing, if breathing is irregular or if respiratory arrest occurs, provide artificial respiration or oxygen by trained personnel. It may be dangerous to the person providing aid to give mouth-to-mouth resuscitation. Get medical attention. If necessary, call a poison center or physician. If unconscious, place in recovery position and get medical attention immediately. Maintain an open airway. Loosen tight clothing such as a collar, tie, belt or waistband.

Skin contact

Flush contaminated skin with plenty of water. Remove contaminated clothing and shoes. Continue to rinse for at least 10 minutes. Get medical attention. Wash clothing before reuse. Clean shoes thoroughly before reuse.

Ingestion

Get medical attention immediately. Call a poison center or physician. Wash out mouth with water. Remove dentures if any. Remove victim to fresh air and keep at rest in a position comfortable for breathing. Aspiration hazard if swallowed. Can enter lungs and cause damage. Do not induce vomiting. If vomiting occurs, the head should be kept low so that vomit does not enter the lungs. Never give anything by mouth to an unconscious person. If unconscious, place in recovery position and get medical attention immediately. Maintain an open airway. Loosen tight clothing such as a collar, tie, belt or waistband.

Most Important Symptoms/Effects, Acute:

Potential acute health effects

Eye Contact: Causes eye irritation.

Inhalation: Harmful if inhaled. Can cause central nervous system (CNS) depression. May cause drowsiness and dizziness.

Skin Contact: Causes skin irritation.

Ingestion: Can cause central nervous system (CNS) depression. May be fatal if swallowed and enters airways. Irritating to mouth, throat and stomach.

Over-exposure signs/symptoms

Eye Contact: Adverse symptoms may include the following: pain or irritation, watering, redness

Inhalation: Adverse symptoms may include the following: nausea or vomiting, headache, drowsiness/fatigue, dizziness/vertigo, unconsciousness

Skin Contact: Adverse symptoms may include the following: irritation, redness

Ingestion: Adverse symptoms may include the following: nausea or vomiting

Indication of any immediate medical attention and special treatment needed, if necessary:

Notes to physician

If ingested, this material presents a significant aspiration and chemical pneumonitis hazard. Induction of emesis is not recommended. Consider activated charcoal and/or gastric lavage. If patient is obtunded, protect the airway by cuffed endotracheal intubation or by placement of the body in a Trendelenburg and left lateral decubitus position.

Specific Treatments

Treat symptomatically and supportively.

Protection of first-aiders

No action shall be taken involving any personal risk or without suitable training. If it is suspected that gas or vapor is still present, the rescuer should wear an appropriate mask or self-contained breathing apparatus. It may be dangerous to the person providing aid to give mouth-to-mouth resuscitation.

5. FIREFIGHTING MEASURES

Specific hazards arising from the chemical

Combustible liquid. In a fire or if heated, a pressure increase will occur and the container may burst, with the risk of a subsequent explosion. The vapor/gas is heavier than air and will spread along the ground. Vapors may accumulate in low or confined areas or travel a considerable distance to a source of ignition and flash back. Runoff to sewer may create fire or explosion hazard.

Extinguishable media

Suitable extinguishing media

Use dry chemical, foam, carbon dioxide (CO₂) or water spray or water fog.

Unsuitable extinguishing media

Do not use water jet.

Hazardous thermal decomposition products

Decomposition products may include the following materials: carbon dioxide, carbon monoxide

Special protective actions for fire-fighters

Promptly isolate the scene by removing all persons from the vicinity of the incident if there is a fire. No action shall be taken involving any personal risk or without suitable training. Move containers from fire area if this can be done without risk. Use water spray to keep fire-exposed containers cool.

Special protective equipment for fire-fighters

Fire-fighters should wear appropriate protective equipment and self-contained breathing apparatus (SCBA) with a full face-piece operated in positive pressure mode.

6. ACCIDENTAL RELEASE MEASURES

Personal precautions, protective equipment, emergency procedures:

For non-emergency personnel

No action shall be taken involving any personal risk or without suitable training. Evacuate surrounding areas. Keep unnecessary and unprotected personnel from entering. Do not touch or walk through spilled material. Shut off all ignition sources. No flares, smoking or flames in hazard area. Avoid breathing vapor or mist. Provide adequate ventilation. Wear appropriate respirator when ventilation is inadequate. Put on appropriate personal protective equipment.

For emergency responders

If specialized clothing is required to deal with the spillage, take note of any information in Section 8 on suitable and unsuitable materials. See also the information in "For non-emergency personnel".

Environmental precautions

Avoid dispersal of spilled material and runoff and contact with soil, waterways, drains and sewers. Inform the relevant authorities if the product has caused environmental pollution (sewers, waterways, soil or air).

Methods and materials for containment and cleaning up

Small spill

Stop leak if without risk. Move containers from spill area. Use spark-proof tools and explosion-proof equipment. Dilute with water and mop up if water-soluble. Alternatively, or if water-insoluble, absorb with an inert dry material and place in an appropriate waste disposal container. Dispose of via a licensed waste disposal contractor.

Large spill

Stop leak if without risk. Move containers from spill area. Use spark-proof tools and explosion-proof equipment. Approach release from upwind. Prevent entry into sewers, water courses, basements or confined areas. Wash spillages into an effluent treatment plant or proceed as follows. Contain and collect spillage with non-combustible, absorbent material e.g. sand, earth, vermiculite or diatomaceous earth and place in container for disposal according to local regulations (see Section 13). Dispose of via a licensed waste disposal contractor. Contaminated absorbent material may pose the same hazard as the spilled product. Note: see Section 1 for emergency contact information and Section 13 for waste disposal.

7. HANDLING AND STORAGE

Precautions for safe handling

Protective measures

Put on appropriate personal protective equipment (see Section 8). Do not swallow. Avoid contact with eyes, skin and clothing. Avoid breathing vapor or mist. Use only with adequate ventilation. Wear appropriate respirator when ventilation is inadequate. Do not enter storage areas and confined spaces unless adequately ventilated. Keep in the original container or an approved alternative made from a compatible material, kept tightly closed when not in use. Store and use away from heat, sparks, open flame or any other ignition source. Use explosion-proof electrical (ventilating, lighting and material handling) equipment. Use only non-

sparkling tools. Empty containers retain product residue and can be hazardous. Do not reuse container. Non equilibrium conditions may increase the fire hazard associated with this product. Always bond receiving containers to the fill pipe before and during loading. Always confirm that receiving container is properly grounded. Bonding and grounding alone may be inadequate to eliminate fire and explosion hazards. Carefully review operations that may increase the risks such as tank and container filling, tank cleaning, sampling, gauging, loading, filtering, mixing, agitation, etc. In addition to bonding and grounding, efforts to mitigate the hazards may include, but are not limited to, ventilation, inerting and/or reduction of transfer velocities. Always keep nozzle in contact with the container throughout the loading process. Do NOT fill any portable container in or on a vehicle.

Advice on general occupational hygiene

Eating, drinking and smoking should be prohibited in areas where this material is handled, stored and processed. Workers should wash hands and face before eating, drinking and smoking. Remove contaminated clothing and protective equipment before entering eating areas. See also Section 8 for additional information on hygiene measures.

Conditions for safe storage, including any incompatibilities

Store in accordance with local regulations. Store in a segregated and approved area. Store in original container protected from direct sunlight in a dry, cool and well-ventilated area, away from incompatible materials (see Section 10) and food and drink. Store locked up. Eliminate all ignition sources. Separate from oxidizing materials. Keep container tightly closed and sealed until ready for use. Containers that have been opened must be carefully resealed and kept upright to prevent leakage. Do not store in unlabeled containers. Use appropriate containment to avoid environmental contamination.

Bulk Storage Conditions: Maintain all storage tanks in accordance with applicable regulations. Use necessary controls to monitor tank inventories. Inspect all storage tanks on a periodic basis. Test tanks and associated piping for tightness. Maintain the automatic leak detection devices to assure proper working condition.

8. EXPOSURE CONTROLS/PERSONAL PROTECTION

Control parameters

Occupational Exposure Limits

Ingredient name	Exposure limits
Petroleum distillates, hydrotreated light	ACGIH TLV (United States) TWA: 400 ppm 8 hours.
Petroleum distillates, hydrotreated heavy naphthenic	TWA: 5mg/m ³

Appropriate Engineering Controls

Use only with adequate ventilation. Use process enclosures, local exhaust ventilation or other engineering controls to keep worker exposure to airborne contaminants below any recommended or statutory limits. The engineering controls also need to keep gas, vapor or dust concentrations below any lower explosive limits. Use explosion-proof ventilation equipment.

Environmental Exposure Controls

Emissions from ventilation or work process equipment should be checked to ensure they comply with the requirements of environmental protection legislation. In some cases, vapor controls, filters or engineering modifications to the process equipment will be necessary to reduce emissions to acceptable levels.

Individual protection measures

Hygiene measures

Wash hands, forearms and face thoroughly after handling chemical products, before eating, smoking and using the lavatory and at the end of the working period. Appropriate techniques should be used to remove potentially contaminated clothing. Wash contaminated clothing before reusing. Ensure that eyewash stations and safety showers are close to the workstation location.

Eye/face protection

Safety glasses equipped with side shields are recommended as minimum protection in industrial settings. If contact is possible, the following protection should be worn, unless the assessment indicates a higher degree of protection: Splash goggles. Safety eyewear complying with an approved standard should be used when a risk assessment indicates this is necessary to avoid exposure to liquid splashes, mists, gases or dusts. chemical splash goggles. If inhalation hazards exist, a full-face respirator may be required instead.

Skin protection

Hand protection

Chemical-resistant gloves complying with an approved standard should be worn at all times when handling chemical products if a risk assessment indicates this is necessary. Considering the parameters specified by the glove manufacturer, check during use that the gloves are still retaining their protective properties. It should be noted that the time to breakthrough for any glove material may be different for different glove manufacturers.

Body protection

Personal protective equipment for the body should be selected based on the task being performed and the risks involved and should be approved by a specialist before handling this product.

Other skin protection

Appropriate footwear and any additional skin protection measures should be selected based on the task being performed and the risks involved and should be approved by a specialist before handling this product.

Respiratory protection

Use a properly fitted, air-purifying or supplied-air respirator complying with an approved standard if a risk assessment indicates this is necessary. Respirator selection must be based on known or anticipated exposure levels, the hazards of the product and the safe working limits of the selected respirator.

9. PHYSICAL AND CHEMICAL PROPERTIES

Appearance: Light brown

Physical state: Liquid

Odor: Characteristic hydrocarbon solvent odor

pH: Not available

Melting point/freezing point: -58°C (-72.4°F)

Initial boiling point and boiling range: 175 to 270°C (347 to 518°F)

Flash point (Closed Cup): 80°C (176°F) [Tagliabue (ASTM D56)]

Evaporation rate: <1 (n-butyl acetate = 1)

Lower and upper explosive (flammable) limits:

Flammability Limit

Lower %: 0.6%

Upper %: 5.5%

Vapor pressure: 0.03 to 0.06 kPa (0.225 to 0.45 mm Hg) [room temperature]

Vapor density: 4.5 [Air = 1]

Relative density: 0.819

Density lbs/gal: 6.79 lbs/gal

Gravity, °API: Estimated 41 @ 60°F

Solubility: Very slightly soluble in the following materials: cold water

Solubility in water: Insoluble

Auto-ignition Temperature: 456.8°F (236°C)

10. STABILITY AND REACTIVITY

Reactivity: Not expected to be Explosive, Self-Reactive, Self-Heating, or an Organic Peroxide under US GHS Definition(s).

Chemical stability: The product is stable.

Possibility of hazardous reactions: Under normal conditions of storage and use, hazardous reactions will not occur

Conditions to avoid: Avoid all possible sources of ignition (spark or flame). Do not pressurize, cut, weld, braze, solder, drill, grind or expose containers to heat or sources of ignition. Do not allow vapor to accumulate in low or confined areas.

Incompatible materials: Reactive or incompatible with the following materials: oxidizing materials

Hazardous decomposition products: Under normal conditions of storage and use, hazardous decomposition products should not be produced.

11. TOXICOLOGICAL INFORMATION

Information on toxicological effects

Acute toxicity

Conclusion/Summary

Petroleum distillates, hydrotreated light: In animal studies utilizing mineral spirits containing up to 22% aromatics indicated that the acute central nervous system effects are reversible. Based on existing animal studies, the potential for persistent effects is not clear.

Irritation/Corrosion

Product/ingredient name	Result	Species	Score	Exposure	Observation
Petroleum distillates, hydrotreated light	Skin – Mild irritant	Rabbit	-	24 hours 500 microfilters	-

Skin

Primary dermal irritation studies (four hour exposure) in rabbits utilizing mineral spirits containing less than 2% aromatics resulted in slight to moderate skin irritation. In humans, mineral spirits have produced slight to moderate skin irritation particularly with evaporation from the skin is prevented.

Eyes

No additional information

Respiratory

Animal studies have demonstrated that mineral spirits produced mild respiratory tract irritation at elevated concentrations. Also, sensory respiratory tract irritation was evident by reduced breathing rates in the test animals in certain studies.

Sensitization

Skin

In animal studies utilizing mineral spirits containing up to 18%, aromatics skin sensitization is not evident.

Respiratory

No additional information

Mutagenicity

Conclusion/Summary

In vivo and in vitro studies on mineral spirits containing up to 22 % aromatics indicate that these products are not genotoxic.

Carcinogenicity

Conclusion/Summary

The National Toxicology Program (NTP) conducted two-year carcinogenicity studies in rats and mice with Stoddard Solvent IIC (less than 2% aromatics). The studies indicated that there was some evidence of carcinogenic activity in male rats (adrenal medulla neoplasms and renal tubule adenoma) but no evidence of carcinogenic activity in female rats. Further, there was equivocal evidence of carcinogenic activity in female mice (hepatocellular adenoma) but no evidence of carcinogenic activity in male mice. A low carcinogenic potential is suggested by a lack of genotoxic potential identified in in vivo and in vitro genetic toxicity tests (with and without metabolic activation).

Reproductive toxicity

Conclusion/Summary

There were no treatment-related effects on pregnancy rate, mortality or gross post mortem observations in animal studies utilizing mineral spirits containing less than 2% aromatics.

Teratogenicity

Conclusion/Summary

There were no treatment-related effects on pregnancy rate, mortality or gross post mortem observations in animal studies utilizing mineral spirits containing less than 2% aromatics.

Specific target organ toxicity (single exposure)

Name	Category	Route of exposure	Target organs
Petroleum distillates, hydrotreated light	Category 3	Not applicable.	Narcotic effects

Specific target organ toxicity (repeated exposure)

Not available

Aspiration hazard

Name	Result
Petroleum distillates, hydrotreated light	ASPIRATION HAZARD - Category 1

Information on Likely Routes of Exposure: Routes of entry anticipated: Oral, dermal, inhalation

Potential acute health effects

Ingestion: Can cause central nervous system (CNS) depression. May be fatal if swallowed and enters airways. Irritating to mouth, throat and stomach.

Inhalation: Harmful if inhaled. Can cause central nervous system (CNS) depression. May cause drowsiness and dizziness.

Skin Contact: Causes skin irritation

Eye Contact: Causes eye irritation.

Symptoms Related to the Physical, Chemical and Toxicological Characteristics:

Eye contact: Adverse symptoms may include the following: pain or irritation, watering, redness

Inhalation: Adverse symptoms may include the following: nausea or vomiting, headache, drowsiness/fatigue, dizziness/vertigo, unconsciousness

Skin contact: Adverse symptoms may include the following: irritation, redness

Ingestion: Adverse symptoms may include the following: nausea or vomiting

Potential chronic health effects

General: No known significant effects or critical hazards.

Carcinogenicity: No known significant effects or critical hazards.

Mutagenicity: No known significant effects or critical hazards.

Teratogenicity: No known significant effects or critical hazards.

Developmental effects: No known significant effects or critical hazards.

Fertility effects: No known significant effects or critical hazards.

12. ECOLOGICAL INFORMATION

Toxicity

Product/ingredient name	Result	Species	Exposure
Petroleum distillates, hydrotreated light	Acute LC50 2200 µg/l Fresh water	Fish - Lepomis macrochirus	4 days
	Acute LC50 2600 µg/l Fresh water	Fish - Oncorhynchus mykiss	4 days
	Acute LC50 2900 µg/l Fresh water	Fish - Oncorhynchus mykiss	96 hours

Conclusion/Summary: Not available

Persistence and Degradability: Not available

Conclusion/Summary: Not available

Bioaccumulative Potential:

Product/ingredient name	LogP _{ow}	BCF	Potential
Petroleum distillates, hydrotreated light	2.8 to 6.5	99 to 5780	High

Mobility in Soil: Not available

Other Adverse Effects: No known significant effects or critical hazards

13. DISPOSAL CONSIDERATIONS

Waste Disposal methods

The generation of waste should be avoided or minimized wherever possible. Disposal of this product, solutions and any by-products should at all times comply with the requirements of environmental protection and waste disposal legislation and any regional local authority requirements. Dispose of surplus and non-recyclable products via a licensed waste disposal contractor. Waste should not be disposed of untreated to the sewer unless fully compliant with the requirements of all authorities with jurisdiction. Waste packaging should be recycled. This material and its container must be disposed of in a safe way. Care should be taken when handling emptied containers that have not been cleaned or rinsed out. Empty containers or liners may retain some product residues. Vapor from product residues may create a highly flammable or explosive atmosphere inside the container. Do not cut, weld or grind used containers unless they have been cleaned thoroughly internally. Avoid dispersal of spilled material and runoff and contact with soil, waterways, drains and sewers.

14. TRANSPORT INFORMATION

	DOT Classification	IMDG	IATA
UN number	NA 1993	Not regulated	Not regulated
UN proper shipping name	NA 1993, Combustible Liquid, n.o.s. (Naphtha Solvent) Combustible Liquid	-	-
Transport hazard class(es)	Combustible liquid	-	-
Packing group	Combustible liquid	-	-
Environmental hazards	No	No	No
Additional information	<u>Packing instruction</u> Passenger aircraft Quantity limitation: 60 L Packing instructions: 203 (non-bulk) Cargo aircraft Quantity limitation: 220 L Packing instructions: 203 (non-bulk), 241 (bulk)	-	-

Special precautions for user:

Transport within user's premises: Always transport in closed containers that are upright and secure. Ensure that persons transporting the product know what to do in the event of an accident or spillage.

15. REGULATORY INFORMATION

U.S. Federal Regulations

United States Inventory (TSCA 8b): All components are listed or exempted.

SARA 302/304:

Composition/Information on Ingredients

SARA 304 RQ: Not applicable

SARA Hazard Categories (311/312)

Classification: Fire hazard, Immediate (acute) health hazard

Composition/information on ingredients

Name	Fire hazard	Sudden release of pressure	Reactive	Immediate (acute) health hazard	Delayed (chronic) health hazard
Petroleum distillates, hydrotreated light	Yes	No	No	Yes	No
Petroleum distillates, hydrotreated heavy naphthenic	No	No	No	Yes	No

State Regulations

Massachusetts: None of the components are listed

New York: None of the components are listed

New Jersey: None of the components are listed

Pennsylvania: None of the components are listed

California Safe Drinking Water and Toxic Enforcement Act (Proposition 65)

WARNING: This product contains less than 0.1% of a chemical known to the State of California to cause cancer.

WARNING: This product contains less than 1.0% of a chemical known to the State of California to cause cancer.

Ingredient Name	%	Cancer	Reproductive	No significant risk level	Maximum acceptable dosage level
Toluene	<0.001	No	Yes	No	7000 µg/day (ingestion)
Benzene	<0.001	Yes	Yes	6.4 µg/day (ingestion) 13 µg/day (inhalation)	24 µg/day (ingestion) 49 µg/day (inhalation)
Naphthalene	<0.0001	Yes	No	Yes	No
Ethylbenzene	<0.0001	Yes	No	41 µg/day (ingestion) 54 µg/day (inhalation)	No

International regulations

International lists

Australia inventory (AICS): All components are listed or exempted.

China inventory (IECSC): All components are listed or exempted.

Japan inventory: Not determined

Korea inventory: All components are listed or exempted.

Malaysia inventory (EHS Register): All components are listed or exempted

New Zealand Inventory of Chemicals (NZIoC): All components are listed or exempted

Philippines inventory (PICCS): All components are listed or exempted

Taiwan inventory (CSNN): Not determined

Canada inventory: All components are listed or exempted

EU inventory: All components are listed or exempted

WHMIS (Canada): Class B-3: Combustible liquid with a flash point between 37.8°C (100°F) and 93.3°C (200°F).

16. OTHER INFORMATION

NFPA Hazard Classification

Health: 1
Flammability: 2
Reactivity: 0



The information and recommendations contained within this document are believed by PetroChoice to be accurate and reliable as of the date prepared. The information and recommendations are offered for the user's consideration and analysis and in no way guarantee the chemical specifications for the specified product. It is solely the responsibility of the user to determine safe conditions for use of this product and to assume liability for any loss, damage or expense arising out of the product's improper use. The user should consider the information in this document in the context of how the selected product will be handled and used in conjunction with other products. It is the user's responsibility to determine that the product is suitable for the intended use.

Appropriate warnings and safe-handling procedures should be provided to all handlers and users. PetroChoice assumes no responsibility for any damage or injury resulting from abnormal use or from any failure to adhere to recommended practices within this document.

Rev. Date: 8/10/2017