

NRP

MATERIAL SAFETY DATA SHEET

PRODUCT IDENTIFICATION

PRODUCT: **CIRCULATING OIL, 2.5-35 WATT MOTORS** HMIS CODES: H F R
PRODUCT CODE: **NRP 5111 - NRP 256V**
MANUFACTURER: **LG CALTEX OIL CORP.**
ADDRESS: **LG KANGNAM TOWER 679 YOKSAM-DONG,**
KANGNAM-GU SEOUL, KOREA 135-080
INFORMATION: **+82-2-2005-6142** EMERGENCY: **CHEMTREC 800-424-9300**
DATE: **5/2003** PREPARER: **R. Madariaga**
DISTRIBUTOR: **NATIONAL REFRIGERATION PRODUCTS**
2900 SAMUEL DRIVE · BENSALEM, PA 19020-7306
1-800-352-6951

COMPOSITION, INFORMATION ON INGREDIENTS

Components	CAS No.	Range in %
Solvent dewaxed heavy paraffinic distillate	64742650	> 99
Additives which may include detergent, pour point depressant, antifoam agent, or rust and oxidation inhibitor		< 1

HAZARDS IDENTIFICATION

Warning Statements: NO SIGNIFICANT HAZARD.

Eyes: Expected to cause no more than minor eye irritation characterized by tearing or a burning sensation.

Oral: If more than several mouthfuls are swallowed, abdominal discomfort, nausea, and diarrhea may occur.

Inhalation: Breathing the vapor or mist may cause respiratory irritation, discomfort, or other pulmonary effects.

Skin: Expected to cause no more than minor skin irritation. Prolonged or frequently repeated contact may cause more severe irritation or may cause the skin to become cracked or dry from the defatting action of this material.

Long Term Toxic Effects: May cause skin discoloration following prolonged or repeated contact. The base oil component(s) are not expected to be carcinogenic based on IARC criteria. This product has not been tested as a whole for chronic health effects.
See Section 11 for additional information.

FIRST AID MEASURES

Eyes:	Flush eyes immediately with fresh water for at least 15 minutes while holding the eyelids open. If irritation persists, see a doctor.
Skin:	Wash skin thoroughly with soap and water. Launder contaminated clothing.
Ingestion:	If swallowed and person is conscious, give water or milk. DO NOT make person vomit except on advice of medical personnel. If advice cannot be obtained, take person with container and label to nearest emergency treatment center. Never give anything by mouth to an unconscious person.
Inhalation:	If respiratory irritation or any signs or symptoms as described in this MSDS occur, move the person to fresh air. If any of these effects continue, see a doctor.
Advice to Doctor:	None Applicable.

FIRE FIGHTING MEASURES

Ignition Temp. (degrees C):	Not Determined
Flammable Limits (% by volume):	Not Determined
Flash Point (degrees C):	> 190 (COC)
Fire Extinguishing Agents:	According to the U.S. National Fire Protection Association Guide, use water fog, dry chemical, foam, or carbon dioxide. Water or foam may cause frothing. Use water to cool fire-exposed containers. If a leak or spill has not ignited, use water spray to disperse the vapors and to provide protection for persons attempting to stop the leak.
Explosion Hazards:	For fires involving this material, do not enter any enclosed or confined space without self-contained breathing apparatus to protect against the hazardous effects of combustion products or oxygen deficiency.

ACCIDENTIAL RELEASE MEASURES

In Case of Spill:	Stop the source of the leak or release and contain spill if possible. Ventilate area. Use respirator and protective clothing as discussed in this MSDS. Cover spill with a generous amount of inert absorbent. Use a stiff broom to mix thoroughly. Sweep up and place in a disposable container. Scrub contaminated area with detergent and water using a stiff broom. Pick up liquid with additional absorbent and place in a disposable container. Prevent contamination of groundwater or surface water.
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HANDLING AND STORAGE

Minimum feasible handling temperatures should be maintained. Periods of exposure to high temperatures should be minimized. Water contamination should be avoided.

Misuse of empty containers can be hazardous. DO NOT cut, weld, heat or drill container. Residue may ignite with explosive violence if heated sufficiently. Do not pressurize or expose to open flame or heat. Keep container closed and drum bungs in place.

EXPOSURE CONTROLS, PERSONAL PROTECTION

Eyes:	No special eye protection is usually necessary. Safety glasses, chemical type goggles, or face shield appropriate where splashing or misting is expected during routine operations or spill clean-up.
Skin:	Exposed employees should exercise reasonable personal cleanliness; this includes cleansing exposed skin several times daily with soap and water, and laundering or dry cleaning soiled work clothing at least weekly.
Inhalation:	Respiratory protection is normally not required. However, if operating conditions create airborne concentrations that are excessive and may exceed the recommended exposure standard(s), the use of an approved respirator is recommended. Wear approved respiratory protection such as a toxic dust, mist and fume respirator.
Ventilation:	Use adequate ventilation to keep the airborne concentrations of this material below the ACGIH TLV for mineral oil mists. Local exhaust ventilation and/or enclosure of the process is preferred in these cases.
Exposure Limits:	The ACGIH TLV for mineral oil mists is 5 mg/m ³ for a daily 8-hour exposure. A short term exposure limit (STEL) of 10 mg/m ³ is recommended.
Respirator Information:	Where local approval authority is absent, respirator users can refer to U.S. NIOSH, European Standard EU-149, or joint Australia-New Zealand AS/NZS 1715/1716 for guidance.

PHYSICAL AND CHEMICAL PROPERTIES

NOTE: The following data may represent a range of approximate or typical values for products in the same family. Precise technical information is provided in Product Bulletins and can be obtained from your Marketing Representative.

Appearance & Odor:	Yellowish brown liquid
Boiling Point (deg. C):	Not Determined
Vapor Pr. (mmHg @ 25 deg. C):	Not Determined
Density (kg/l at 15 deg. C):	0.8 - 0.9
Vapor Density (air = 1):	Not Determined
pH of Undiluted Product:	Not Applicable
Solubility (water):	Negligible
Percent Volatile by Volume:	Not Determined
Evaporation:	Not Determined
Viscosity (All Product Grades):	19 - 100 mm ² /s @ 40 deg. C

STABILITY AND REACTIVITY

Hazardous Polymerizations:	DO NOT OCCUR
Products of Combustion:	Carbon monoxide, carbon dioxide, and aldehydes and ketones, combustion products of nitrogen or sulfur.
Conditions to Avoid:	Strong oxidizers such as chlorates, nitrates, peroxides, etc.

TOXICOLOGICAL INFORMATION

General:	This product contains petroleum base oils which may be refined by various processes including severe solvent extraction, hydrocracking and hydrotreating. These oils have not been listed in the U.S. National Toxicology Program (NTP) Annual Report nor have they been classified by the International Agency for Research on Cancer (IARC) as carcinogenic or probably carcinogenic to humans.
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ECOLOGICAL INFORMATION

Environmental Effects:	No specific ecotoxicity data on this product are available. This material may present environmental risks common to oil spills.
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DISPOSAL CONSIDERATIONS

Waste Disposal: Place contaminated materials in disposable containers and dispose of in a manner consistent with applicable regulations. Contact local environmental or health authorities for approved disposal of this material.

Remarks: This material may present environmental risks common to oil spills. Contact your local oil spill response group and applicable government agencies if a spill occurs.

TRANSPORT INFORMATION

Transport of Dangerous

Goods:

UN Number: Not Applicable
Dangerous Goods Class: Not Applicable
Proper Shipping Name: Not Applicable
Hazchem Code (Australia/NZ): Not Applicable
Additional Information: None Determined.

DISCLAIMER

INFORMATION AND RECOMMENDATIONS CONTAINED HEREIN ARE BELIEVED TO BE ACCURATE AT THE TIME OF PREPARATION. NO WARRANTY IS MADE CONCERNING THE ACCURACY AND NO LIABILITY SHALL BE MADE FOR CLAIMS FOR USE OR RELIANCE OF THE RECOMMENDATIONS CONTAINED HEREIN.