

BRODI SPECIALTY PRODUCTS LTD
3175 14th AVENUE, UNIT 1
MARKHAM; ONTARIO; L3R 0H1
CANADA

PRODUCT: 0290-X303 PROBE CONTACT CLEANER 453G**Section 01: CHEMICAL PRODUCT AND COMPANY IDENTIFICATION**

MANUFACTURER Brodi Specialty Products Ltd.
3175 14th Avenue, Unit 1
Markham,
Ontario
Canada
L3R 0H1
905-475-6084

PRODUCT NAME..... 0290-X303 PROBE CONTACT CLEANER 453G
CHEMICAL FAMILY..... HALOGENATED HYDROCARBONS.
MOLECULAR WEIGHT..... NOT APPLICABLE.
CHEMICAL FORMULA..... NOT APPLICABLE.
TRADE NAMES & SYNONYMS..... 0290-X303 PROBE CONTACT CLEANER 453G
PRODUCT USES..... CLEANER.
FORMULA/LAB BOOK #..... F 10-214.

Section 02: COMPOSITION/INFORMATION INGREDIENTS

Hazardous Ingredients	%	Exposure Limit	C.A.S.#	LD/50, Route,Species	LC/50 Route,Species
N-PROPYL BROMIDE	10-30	10 ppm	106-94-5	2950mg/Kg ACUTE INTRAPERITONEAL RAT	NOT AVAILABLE
n-PROPANOL	1-5	200 ppm	71-23-8	1870 mg/kg ORAL-RAT	NOT AVAILABLE
1,1,1,2-TETRAFLUOROETHANE	60-100	1000 ppm	811-97-2	NOT AVAILABLE	567000 ppm (4hr) INHAL - RAT

Section 03: HAZARDS IDENTIFICATION

ROUTE OF ENTRY:
INGESTION..... MAY CAUSE ABDOMINAL DISCOMFORT.
INHALATION..... PROPELLANT IS A SIMPLE ASPHYXIANT.
EYE CONTACT..... MAY CAUSE IRRITATION.
SKIN ABSORPTION..... NO DATA AVAILABLE FOR THIS PRODUCT MIXTURE.
SKIN CONTACT..... MAY CAUSE IRRITATION.
EFFECTS OF ACUTE EXPOSURE..... DIZZINESS, NAUSEA. IRRITATION TO SKIN & EYES.
EFFECTS OF CHRONIC EXPOSURE..... NONE KNOWN.
EXPOSURE LIMIT OF MATERIAL..... SEE SECTION 2.

Section 04: FIRST AID MEASURES

EMERGENCY FIRST AID PROCEDURE IN CASE OF EYE CONTACT, FLUSH IMMEDIATELY WITH PLENTY OF WATER FOR AT LEAST 15 MINUTES AND GET MEDICAL ATTENTION. FOR SKIN, WASH THOROUGHLY WITH SOAP AND WATER. IF AFFECTED BY INHALATION OF VAPOUR OR SPRAY MIST, REMOVE TO FRESH AIR. IF SWALLOWED; DO NOT INDUCE VOMITING, GET MEDICAL ATTENTION.

Section 05: FIRE FIGHTING MEASURES

AUTO IGNITION TEMPERATURE (°C)..... NOT APPLICABLE.
SPECIAL PROCEDURES..... WATER FROM FOGGING NOZZLES MAY BE USED TO COOL CLOSED CONTAINERS TO PREVENT BUILD-UP IF EXPOSED TO EXTREME TEMPERATURES. FULL PROTECTIVE EQUIPMENT INCLUDING SELF CONTAINED BREATHING APPARATUS SHOULD BE WORN IN A FIRE INVOLVING THIS MATERIAL.

FLAMMABILITY..... NOT A FLAMMABLE PRODUCT (AS PER CANADIAN AEROSOL REGULATIONS).
IF YES, UNDER WHICH CONDITIONS?..... EXCESSIVE HEAT, SPARKS AND OPEN FLAME.
EXTINGUISHING MEDIA..... WATER, CARBON DIOXIDE, DRY CHEMICAL, FOAM.
UPPER FLAMMABLE LIMIT..... 7.8.
(% BY VOLUME)
LOWER FLAMMABLE LIMIT..... 2.4.
(% BY VOLUME)

EXPLOSION DATA
SENSITIVITY TO STATIC DISCHARGE..... NOT APPLICABLE.
SENSITIVITY TO IMPACT..... NOT APPLICABLE.

HAZARDOUS COMBUSTION PRODUCTS..... HYDROCARBON FUMES AND SMOKE. CARBON MONOXIDE WHERE COMBUSTION IS INCOMPLETE.

AEROSOL FLAME PROJECTION
CLASSIFIED AS:..... 0 cm.
FLASHBACK..... NONE.
FLASH POINT(°C), TAG CLOSED-CUP NONE.
(CONCENTRATE)

PRODUCT: 0290-X303 PROBE CONTACT CLEANER 453G**Section 06: ACCIDENTAL RELEASE MEASURES**

LEAK/SPILL..... REMOVE ALL SOURCES OF IGNITION. USE AN INERT ABSORBENT MATERIAL, AND NON-SPARKING TOOLS. VENTILATE AREA. PREVENT FROM ENTERING A WATERCOURSE.

Section 07: HANDLING AND STORAGE

STORAGE NEEDS..... KEEP AWAY FROM HEAT, SPARKS, AND OPEN FLAMES.
 ENGINEERING CONTROLS..... VENTILATION - LOCAL (MECHANICAL IF USED INDOORS ON A CONTINUOUS BASIS).
 HANDLING PROCEDURES AND EQUIPMENT..... STORE IN A COOL, WELL VENTILATED AREA NOT TO EXCEED 50 DEG C.
 SYNERGISTIC MATERIALS..... NONE KNOWN.

Section 08: EXPOSURE CONTROLS/PERSONAL PROTECTION

GLOVES/ TYPE..... WEAR CHEMICAL RESISTANT GLOVES.
 RESPIRATORY/TYPE..... IF USED INDOORS ON A CONTINUOUS BASIS, USE OF A CARTRIDGE TYPE RESPIRATOR (NIOSH/MSHATC 23C OR EQUIVALENT) IS RECOMMENDED.
 EYE/TYPE..... SAFETY GLASSES.
 FOOTWEAR/TYPE..... NOT NORMALLY REQUIRED.
 OTHER/TYPE..... NOT REQUIRED.

Section 09: PHYSICAL AND CHEMICAL PROPERTIES

PHYSICAL STATE..... AEROSOL.
 APPEARANCE..... COLOURLESS.
 ODOR..... SWEET.
 ODOR THRESHOLD..... NOT AVAILABLE.
 VAPOUR PRESSURE(PSIG)-AEROSOL..... 60 - 70.
 @ 20 C
 BOILING POINT (°C)(CONC)..... 97.2-204.4.
 EVAPORATION RATE..... NOT AVAILABLE.
 n-BUTYL ACETATE = 1
 VAPOUR DENSITY (AIR=1)..... GREATER THAN 1.
 (BY WEIGHT)
 SOLUBILITY IN WATER g/L (20°C)..... 0.15.
 pH..... NOT APPLICABLE.
 SPECIFIC GRAVITY (LIQUID)..... 1.21-1.25.
 COEFFICIENT OF WATER/OIL DIST..... NOT AVAILABLE.
 FREEZING POINT: (°C)..... -110.
 AEROSOL PERCENT VOLATILE..... 100.
 (BY WEIGHT).

Section 10: STABILITY AND REACTIVITY

HAZARDOUS PRODUCTS OF DECOMPOSITION..... HYDROCARBON FUMES AND SMOKE. CARBON MONOXIDE WHERE COMBUSTION IS INCOMPLETE.
 CHEMICAL STABILITY:
 YES..... UNDER NORMAL CONDITIONS.
 NO, WHICH CONDITIONS?..... NOT APPLICABLE.
 COMPATIBILITY WITH OTHER SUBSTANCES:
 NO, WHICH ONES?..... STRONG OXIDIZING AGENTS.
 REACTIVITY CONDITIONS?..... NOT APPLICABLE.
 HAZARDOUS POLYMERIZATION..... WILL NOT OCCUR.

Section 11: TOXICOLOGICAL INFORMATION

REPRODUCTIVE EFFECTS..... NO INFORMATION IS AVAILABLE AND NO ADVERSE REPRODUCTIVE EFFECTS ARE ANTICIPATED. (INHALATIONS STUDIES OF SOLVENT) BIRTH DEFECTS, INCREASED FETAL LETHALITY, AND DELAYED FETAL DEVELOPMENT OBSERVED IN OFFSPRING OF ANIMALS EXPOSED DURING PREGNANCY.
 IRRITANCY OF MATERIAL..... SKIN/EYE IRRITANT.
 SENSITIZING CAPABILITY OF MATERIAL..... UNKNOWN.
 CARCINOGENICITY OF MATERIAL..... THE INGREDIENTS OF THIS PRODUCT ARE NOT LISTED AS CARCINOGENS BY NTP, (NATIONAL TOXICOLOGY PROGRAM), NOT REGULATED AS CARCINOGENS BY OSHA, (OCCUPATIONAL SAFETY AND HEALTH ADMINISTRATION), AND HAVE NOT BEEN EVALUATED BY IARC,(INTERNATIONAL AGENCY FOR RESEARCH ON CANCER), NOR BY ACGIH (AMERICAN CONFERENCE OF GOVERNMENTAL INDUSTRIAL HYGIENISTS).
 TERATOGENICITY..... NO INFORMATION IS AVAILABLE AND NO ADVERSE TERATOGENIC EFFECTS ARE ANTICIPATED.
 MUTAGENICITY..... NO INFORMATION IS AVAILABLE AND NO ADVERSE MUTAGENIC EFFECTS ARE ANTICIPATED.

Section 12: ECOLOGICAL CONSIDERATIONS

ENVIRONMENTAL..... n-PROPYL BROMIDE- HARMFUL TO AQUATIC LIFE AT LOW CONCENTRATIONS. ENVIRONMENTAL FATE: NOT READILY BIODEGRADABLE. LOW BIOACCUMULATION POTENTIAL. CAN BE DANGEROUS IF ALLOWED TO ENTER DRINKING WATER INTAKES. DO NOT CONTAMINATE DOMESTIC OR IRRIGATION WATER SUPPLIES, LAKES, STREAMS, PONDS, OR RIVERS.

PRODUCT: 0290-X303 PROBE CONTACT CLEANER 453G**Section 13: DISPOSAL CONSIDERATIONS**

WASTE DISPOSAL..... DO NOT PUNCTURE OR INCINERATE CONTAINERS, EVEN WHEN EMPTY. DISPOSE OF IN ACCORDANCE WITH LOCAL, PROVINCIAL AND FEDERAL REGULATIONS.

Section 14: TRANSPORTATION INFORMATION

D.O.T. CLASSIFICATION..... CONSUMER COMMODITY, ORM-D.
T.D.G. CLASSIFICATION..... CONSUMER COMMODITY (AEROSOLS, UN1950, CLASS 2.2).

Section 15: REGULATORY INFORMATION**CANADIAN REGULATIONS:**

WHMIS CLASSIFICATION..... A,D2B.
CNFC SECTION 3.3.5..... LEVEL 1.
CEPA (Canadian Environmental Protection Act) ALL SUBSTANCES IN THIS PRODUCT ARE LISTED ON THE CANADIAN DOMESTIC SUBSTANCES LIST (DSL) OR ARE NOT REQUIRED TO BE LISTED.

U.S. REGULATIONS:

HMIS RATING HEALTH..... 1 SLIGHT HAZARD.
HMIS RATING FLAMMABILITY..... 0 MINIMAL HAZARD.
HMIS RATING REACTIVITY..... 1 SLIGHT HAZARD.
HMIS RATING PERSONAL PROTECTION..... B.
NFPA CODE 30B..... LEVEL 1.
SARA 313 INFORMATION: THIS PRODUCT CONTAINS NO INGREDIENTS SUBJECT TO THE REPORTING REQUIREMENTS OF SECTION 313 OF THE EMERGENCY PLANNING AND COMMUNITY RIGHT-TO-KNOW ACT OF 1986 AND OF 40 CFR 372.
CAS #: CHEMICAL NAME:
N/A.
CALIFORNIA PROPOSITION 65: THE FOLLOWING STATEMENT IS MADE IN ORDER TO COMPLY WITH THE CALIFORNIA SAFE DRINKING WATER AND TOXIC ENFORCEMENT ACT OF 1986:
WARNING: THIS PRODUCT DOES NOT INTENTIONALLY CONTAIN ANY CHEMICALS KNOWN TO THE STATE OF CALIFORNIA TO CAUSE CANCER, BIRTH DEFECTS OR OTHER REPRODUCTIVE HARM.
. CAS #: CHEMICAL NAME:
. N/A.
TSCA (Toxic Substances Control Act)..... ALL COMPONENT OF THIS PRODUCT ARE LISTED ON THE TSCA INVENTORY. ANY IMPURITIES PRESENT IN THIS PRODUCT ARE EXEMPT FROM LISTING.
VOC (w/w%)..... 25.

Section 16: OTHER INFORMATION

NOTICE FROM BRODI SPECIALTY PRODUCTS LTD. THE INFORMATION ON THIS MATERIAL SAFETY DATA SHEET IS PROVIDED BY BRODI SPECIALTY PRODUCTS LTD. FREE OF CHARGE. WHILE BELIEVED TO BE RELIABLE, IT IS INTENDED FOR USE BY SKILLED PERSONS AT THEIR OWN RISK. BRODI SPECIALTY PRODUCTS LTD. ASSUMES NO RESPONSIBILITY FOR EVENTS RESULTING OR DAMAGES INCURRED FROM ITS USE. THE INFORMATION ON THIS MATERIAL SAFETY DATA SHEET RELATES ONLY TO THE SPECIFIC MATERIAL DESIGNATED HEREIN AND DOES NOT RELATE TO USE IN COMBINATION WITH ANY OTHER MATERIAL OR IN ANY PROCESS.

PREPARED BY..... TECHNICAL SERVICES
PREPARATION DATE May04/10