

# *Chem-Impex International Inc.*

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## SAFETY DATA SHEET

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### SECTION 1. CHEMICAL IDENTIFICATION

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CATALOG #: 41826

NAME: 2-Diphenylacetyl-1,3-indandione-1-hydrazone

SYNONYMS:

24 HOUR EMERGENCY  
TELEPHONE: (800) 535-5053(USA)  
352-323-3500 (INTERNATIONAL)

TO REQUEST AN MSDS: (800) 869-9290

CUSTOMER  
SERVICE: (630) 766-2112

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### SECTION 2. HAZARDS IDENTIFICATION

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#### CLASSIFICATION OF THE SUBSTANCE OR MIXTURE

#### GHS CLASSIFICATION IN ACCORDANCE WITH 29 CFR 1910 (OSHA HCS)

ACUTE TOXICITY, ORAL (CATEGORY 3), H301

SHORT-TERM (ACUTE) AQUATIC HAZARD (CATEGORY 1), H400

LONG-TERM (CHRONIC) AQUATIC HAZARD (CATEGORY 1), H410

FOR THE FULL TEXT OF THE H-STATEMENTS MENTIONED IN THIS SECTION, SEE SECTION 16.

**GHS LABEL ELEMENTS, INCLUDING PRECAUTIONARY STATEMENTS  
PICTOGRAM**



SIGNAL WORD DANGER

**HAZARD STATEMENT(S)**

H301 TOXIC IF SWALLOWED.  
H410 VERY TOXIC TO AQUATIC LIFE WITH LONG LASTING EFFECTS.

**PRECAUTIONARY STATEMENT(S)**

P264 WASH SKIN THOROUGHLY AFTER HANDLING.  
P270 DO NOT EAT, DRINK OR SMOKE WHEN USING THIS PRODUCT.  
P273 AVOID RELEASE TO THE ENVIRONMENT.  
P301 + P310 + P330 IF SWALLOWED: IMMEDIATELY CALL A POISON CENTER/ DOCTOR. RINSE MOUTH.  
P391 COLLECT SPILLAGE.  
P405 STORE LOCKED UP.  
P501 DISPOSE OF CONTENTS/ CONTAINER TO AN APPROVED WASTE DISPOSAL PLANT.

**HAZARDS NOT OTHERWISE CLASSIFIED (HNOC) OR NOT COVERED BY GHS** NONE

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**SECTION 3. COMPOSITION/INFORMATION ON INGREDIENTS**

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MF:  $C_{23}H_{18}N_2O_2$   
MW: 354.40  
CAS-NO. 5102-79-4  
PURITY:  $\geq 98\%$  (TLC)

| COMPONENT  | CLASSIFICATION   | CONCENTRATION |
|--|--|---------------|
| <b>2-Diphenylacetyl-1,3-indandione-1-hydrazone</b> | ACUTE TOX. 3; AQUATIC ACUTE 1; AQUATIC CHRONIC 1; H301, H400, H410<br>M-FACTOR - AQUATIC ACUTE: 10<br>M-FACTOR - AQUATIC CHRONIC: 10 | $\leq 100\%$  |

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FOR THE FULL TEXT OF THE H-STATEMENTS MENTIONED IN THIS SECTION, SEE SECTION 16.

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#### **SECTION 4. FIRST-AID MEASURES**

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##### **DESCRIPTION OF FIRST AID MEASURES**

|   |   |
|---|---|
| <b>GENERAL ADVICE</b>   | SHOW THIS MATERIAL SAFETY DATA SHEET TO THE DOCTOR IN ATTENDANCE.   |
| <b>IF INHALED</b>   | AFTER INHALATION: FRESH AIR.  |
| <b>IN CASE OF SKIN CONTACT</b>  | IN CASE OF SKIN CONTACT: TAKE OFF IMMEDIATELY ALL CONTAMINATED CLOTHING. RINSE SKIN WITH WATER/ SHOWER.   |
| <b>IN CASE OF EYE CONTACT</b>   | AFTER EYE CONTACT: RINSE OUT WITH PLENTY OF WATER. REMOVE CONTACT LENSES.   |
| <b>IF SWALLOWED</b>   | IF SWALLOWED: GIVE WATER TO DRINK (TWO GLASSES AT MOST). SEEK MEDICAL ADVICE IMMEDIATELY. IN EXCEPTIONAL CASES ONLY, IF MEDICAL CARE IS NOT AVAILABLE WITHIN ONE HOUR, INDUCE VOMITING (ONLY IN PERSONS WHO ARE WIDE AWAKE AND FULLY CONSCIOUS), ADMINISTER ACTIVATED CHARCOAL (20 - 40 G IN A 10% SLURRY) AND CONSULT A DOCTOR AS QUICKLY AS POSSIBLE. |
| <b>MOST IMPORTANT SYMPTOMS AND EFFECTS, BOTH ACUTE AND DELAYED</b>                | THE MOST IMPORTANT KNOWN SYMPTOMS AND EFFECTS ARE DESCRIBED IN THE LABELLING (SEE SECTION 2.2) AND/OR IN SECTION 11   |
| <b>INDICATION OF ANY IMMEDIATE MEDICAL ATTENTION AND SPECIAL TREATMENT NEEDED</b> | NO DATA AVAILABLE   |

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#### **SECTION 5. FIRE AND EXPLOSION DATA**

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##### **EXTINGUISHING MEDIA**

|                                     |   |
|-------------------------------------|---|
| <b>SUITABLE EXTINGUISHING MEDIA</b> | SUITABLE EXTINGUISHING MEDIA<br>WATER FOAM CARBON DIOXIDE (CO <sub>2</sub> ) DRY POWDER |
|                                     | UNSUITABLE EXTINGUISHING MEDIA  |

FOR THIS SUBSTANCE/MIXTURE NO LIMITATIONS OF EXTINGUISHING AGENTS ARE GIVEN.

|  |  |
|--|--|
| <b>SPECIAL HAZARDS ARISING FROM THE SUBSTANCE OR MIXTURE</b> | CARBON OXIDES<br>NITROGEN OXIDES (NOX)<br>COMBUSTIBLE.<br>DEVELOPMENT OF HAZARDOUS COMBUSTION GASES OR VAPOURS POSSIBLE IN THE EVENT OF FIRE.                  |
| <b>ADVICE FOR FIREFIGHTERS</b>                               | STAY IN DANGER AREA ONLY WITH SELF-CONTAINED BREATHING APPARATUS. PREVENT SKIN CONTACT BY KEEPING A SAFE DISTANCE OR BY WEARING SUITABLE PROTECTIVE CLOTHING.  |
| <b>FURTHER INFORMATION</b>                                   | SUPPRESS (KNOCK DOWN) GASES/VAPORS/MISTS WITH A WATER SPRAY JET. PREVENT FIRE EXTINGUISHING WATER FROM CONTAMINATING SURFACE WATER OR THE GROUND WATER SYSTEM. |

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## **SECTION 6. ACCIDENTAL RELEASE MEASURES**

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|  |   |
|--|---|
| <b>PERSONAL PRECAUTIONS, PROTECTIVE EQUIPMENT AND EMERGENCY PROCEDURES</b> | ADVICE FOR NON-EMERGENCY PERSONNEL: AVOID INHALATION OF DUSTS. AVOID SUBSTANCE CONTACT. ENSURE ADEQUATE VENTILATION. EVACUATE THE DANGER AREA, OBSERVE EMERGENCY PROCEDURES, CONSULT AN EXPERT.<br>FOR PERSONAL PROTECTION SEE SECTION 8. |
| <b>ENVIRONMENTAL PRECAUTIONS</b>   | DO NOT LET PRODUCT ENTER DRAINS.  |
| <b>METHODS AND MATERIALS FOR CONTAINMENT AND CLEANING UP</b>               | COVER DRAINS. COLLECT, BIND, AND PUMP OFF SPILLS. OBSERVE POSSIBLE MATERIAL RESTRICTIONS (SEE SECTIONS 7 AND 10). TAKE UP CAREFULLY. DISPOSE OF PROPERLY. CLEAN UP AFFECTED AREA. AVOID GENERATION OF DUSTS.                              |
| <b>REFERENCE TO OTHER SECTIONS</b>   | FOR DISPOSAL SEE SECTION 13.  |

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## **SECTION 7. HANDLING AND STORAGE**

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|   |  |
|---|--|
| <b>PRECAUTIONS FOR SAFE HANDLING</b>                                | FOR PRECAUTIONS SEE SECTION 2.2.   |
| <b>CONDITIONS FOR SAFE STORAGE, INCLUDING ANY INCOMPATIBILITIES</b> | TIGHTLY CLOSED. DRY. KEEP IN A WELL-VENTILATED PLACE. KEEP LOCKED UP OR IN AN AREA ACCESSIBLE ONLY TO QUALIFIED OR AUTHORIZED PERSONS. |

Store at RT

**SPECIFIC END USE(S)**

APART FROM THE USES MENTIONED IN SECTION 1.2 NO OTHER SPECIFIC USES ARE STIPULATED.

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**SECTION 8. EXPOSURE CONTROLS/PERSONAL PROTECTION**

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**CONTROL PARAMETERS**

**COMPONENTS WITH  
WORKPLACE CONTROL  
PARAMETERS**

CONTAINS NO SUBSTANCES WITH OCCUPATIONAL EXPOSURE LIMIT VALUES.

**EXPOSURE CONTROLS**

**APPROPRIATE  
ENGINEERING  
CONTROLS**

CHANGE CONTAMINATED CLOTHING. PREVENTIVE SKIN PROTECTION RECOMMENDED. WASH HANDS AFTER WORKING WITH SUBSTANCE.

**PERSONAL PROTECTIVE EQUIPMENT**

**EYE/FACE PROTECTION**

USE EQUIPMENT FOR EYE PROTECTION TESTED AND APPROVED UNDER APPROPRIATE GOVERNMENT STANDARDS SUCH AS NIOSH (US) OR EN 166(EU). SAFETY GLASSES

**SKIN PROTECTION**

HANDLE WITH GLOVES. GLOVES MUST BE INSPECTED PRIOR TO USE. USE PROPER GLOVE REMOVAL TECHNIQUE (WITHOUT TOUCHING GLOVE'S OUTER SURFACE) TO AVOID SKIN CONTACT WITH THIS PRODUCT. DISPOSE OF CONTAMINATED GLOVES AFTER USE IN ACCORDANCE WITH APPLICABLE LAWS AND GOOD LABORATORY PRACTICES. WASH AND DRY HANDS.

## FULL CONTACT

MATERIAL: NITRILE RUBBER  
MINIMUM LAYER THICKNESS: 0.11 MM  
BREAK THROUGH TIME: 480 MIN  
MATERIAL TESTED:DERMATRIL (KCL 740, SIZE M)

## SPLASH CONTACT

MATERIAL: NITRILE RUBBER  
MINIMUM LAYER THICKNESS: 0.11 MM  
BREAK THROUGH TIME: 480 MIN  
MATERIAL TESTED:DERMATRIL (KCL 740, SIZE M)

IF USED IN SOLUTION, OR MIXED WITH OTHER SUBSTANCES, AND UNDER CONDITIONS WHICH DIFFER FROM EN 374, CONTACT THE SUPPLIER OF THE EC APPROVED GLOVES. THIS RECOMMENDATION IS ADVISORY ONLY AND MUST BE EVALUATED BY AN INDUSTRIAL HYGIENIST AND SAFETY OFFICER FAMILIAR WITH THE SPECIFIC SITUATION OF ANTICIPATED USE BY OUR CUSTOMERS. IT SHOULD NOT BE CONSTRUED AS OFFERING AN APPROVAL FOR ANY SPECIFIC USE SCENARIO.

**BODY PROTECTION**

PROTECTIVE CLOTHING

**RESPIRATORY PROTECTION**

REQUIRED WHEN DUSTS ARE GENERATED. OUR RECOMMENDATIONS ON FILTERING RESPIRATORY PROTECTION ARE BASED ON THE FOLLOWING STANDARDS: DIN EN 143, DIN 14387 AND OTHER ACCOMPANYING STANDARDS RELATING TO THE USED RESPIRATORY PROTECTION SYSTEM.

**CONTROL OF ENVIRONMENTAL EXPOSURE**

DO NOT LET PRODUCT ENTER DRAINS.

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**SECTION 9. PHYSICAL AND CHEMICAL PROPERTIES**

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**INFORMATION ON BASIC PHYSICAL AND CHEMICAL PROPERTIES**

|                 |                                    |
|-----------------|------------------------------------|
| APPEARANCE      | Yellow or brown powder or crystals |
| ODOUR           | NO DATA AVAILABLE                  |
| ODOUR THRESHOLD | NO DATA AVAILABLE                  |

|  |                     |
|--|---------------------|
| PH   | NO DATA AVAILABLE   |
| MELTING POINT/FREEZING POINT                 | 241 - 243 °C (Lit.) |
| INITIAL BOILING POINT AND BOILING RANGE      |                     |
| FLASH POINT                                  |                     |
| EVAPORATION RATE                             | NO DATA AVAILABLE   |
| FLAMMABILITY (SOLID, GAS)                    | NO DATA AVAILABLE   |
| UPPER/LOWER FLAMMABILITY OR EXPLOSIVE LIMITS | NO DATA AVAILABLE   |
| VAPOUR PRESSURE                              | NO DATA AVAILABLE   |
| VAPOUR DENSITY                               | NO DATA AVAILABLE   |
| RELATIVE DENSITY                             |                     |
| WATER SOLUBILITY                             | NO DATA AVAILABLE   |
| PARTITION COEFFICIENT: N- OCTANOL/WATER      | LOG POW: 3.743      |
| AUTO-IGNITION TEMPERATURE                    | NO DATA AVAILABLE   |
| DECOMPOSITION TEMPERATURE                    | NO DATA AVAILABLE   |
| VISCOSITY                                    | NO DATA AVAILABLE   |
| EXPLOSIVE PROPERTIES                         | NO DATA AVAILABLE   |
| OXIDIZING PROPERTIES                         | NO DATA AVAILABLE   |

**OTHER SAFETY INFORMATION**

NO DATA AVAILABLE

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**SECTION 10. STABILITY AND REACTIVITY**

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|   |   |
|---|---|
| <b>REACTIVITY</b>                         | THE FOLLOWING APPLIES IN GENERAL TO FLAMMABLE ORGANIC SUBSTANCES AND MIXTURES: IN CORRESPONDINGLY FINE DISTRIBUTION, WHEN WHIRLED UP A DUST EXPLOSION POTENTIAL MAY GENERALLY BE ASSUMED. |
| <b>CHEMICAL STABILITY</b>                 | THE PRODUCT IS CHEMICALLY STABLE UNDER STANDARD AMBIENT CONDITIONS  |
| <b>POSSIBILITY OF HAZARDOUS REACTIONS</b> | NO DATA AVAILABLE   |
| <b>CONDITIONS TO AVOID</b>                | NO DATA AVAILABLE   |
| <b>INCOMPATIBLE MATERIALS</b>             | STRONG OXIDIZING AGENTS, STRONG BASES   |

**HAZARDOUS  
DECOMPOSITION  
PRODUCTS**

IN THE EVENT OF FIRE: SEE SECTION 5

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**SECTION 11. TOXICOLOGICAL INFORMATION**

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**INFORMATION ON TOXICOLOGICAL EFFECTS**

|   |   |
|---|---|
| <b>ACUTE TOXICITY</b>   | LD50 ORAL - 100 MG/KG<br><br>INHALATION: NO DATA AVAILABLE<br><br>DERMAL: NO DATA AVAILABLE<br><br>NO DATA AVAILABLE                                    |
| <b>SKIN<br/>CORROSION/IRRITATION</b>                              | NO DATA AVAILABLE   |
| <b>SERIOUS EYE<br/>DAMAGE/EYE IRRITATION</b>                      | NO DATA AVAILABLE   |
| <b>RESPIRATORY OR SKIN<br/>SENSITISATION</b>                      | NO DATA AVAILABLE   |
| <b>GERM CELL<br/>MUTAGENICITY</b>                                 | NO DATA AVAILABLE   |
| <b>CARCINOGENICITY</b>  |   |
| IARC:   | NO COMPONENT OF THIS PRODUCT PRESENT AT LEVELS GREATER THAN OR EQUAL TO 0.1% IS IDENTIFIED AS PROBABLE, POSSIBLE OR CONFIRMED HUMAN CARCINOGEN BY IARC. |
| NTP:  | NO COMPONENT OF THIS PRODUCT PRESENT AT LEVELS GREATER THAN OR EQUAL TO 0.1% IS IDENTIFIED AS A KNOWN OR ANTICIPATED CARCINOGEN BY NTP.                 |
| OSHA:   | NO COMPONENT OF THIS PRODUCT PRESENT AT LEVELS GREATER THAN OR EQUAL TO 0.1% IS ON OSHA S LIST OF REGULATED CARCINOGENS.                                |
| <b>REPRODUCTIVE TOXICITY</b>                                      | NO DATA AVAILABLE   |
| <b>SPECIFIC TARGET ORGAN<br/>TOXICITY - SINGLE<br/>EXPOSURE</b>   | NO DATA AVAILABLE   |
| <b>SPECIFIC TARGET ORGAN<br/>TOXICITY - REPEATED<br/>EXPOSURE</b> | NO DATA AVAILABLE   |



|                               |   |
|-------------------------------|---|
| <b>ASPIRATION HAZARD</b>      | NO DATA AVAILABLE   |
| <b>ADDITIONAL INFORMATION</b> | RTECS: NOT AVAILABLE<br><br>TO THE BEST OF OUR KNOWLEDGE, THE CHEMICAL, PHYSICAL, AND TOXICOLOGICAL PROPERTIES HAVE NOT BEEN THOROUGHLY INVESTIGATED. |

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**SECTION 12. ECOLOGICAL INFORMATION**

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|   |  |
|---|--|
| <b>TOXICITY</b>                           | NO DATA AVAILABLE  |
| <b>PERSISTENCE AND DEGRADABILITY</b>      | NO DATA AVAILABLE  |
| <b>BIOACCUMULATIVE POTENTIAL</b>          | NO DATA AVAILABLE  |
| <b>MOBILITY IN SOIL</b>                   | NO DATA AVAILABLE  |
| <b>RESULTS OF PBT AND VPVB ASSESSMENT</b> | PBT/VPVB ASSESSMENT NOT AVAILABLE AS CHEMICAL SAFETY ASSESSMENT NOT REQUIRED/NOT CONDUCTED |
| <b>OTHER ADVERSE EFFECTS</b>              | NO DATA AVAILABLE  |

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**SECTION 13. DISPOSAL CONSIDERATIONS**

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**WASTE TREATMENT METHODS**

|                               |  |
|-------------------------------|--|
| <b>PRODUCT</b>                | WASTE MATERIAL MUST BE DISPOSED OF IN ACCORDANCE WITH THE NATIONAL AND LOCAL REGULATIONS. LEAVE CHEMICALS IN ORIGINAL CONTAINERS. NO MIXING WITH OTHER WASTE. HANDLE UNCLEANED CONTAINERS LIKE THE PRODUCT ITSELF. |
| <b>CONTAMINATED PACKAGING</b> | DISPOSE OF AS UNUSED PRODUCT.  |

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**SECTION 14. TRANSPORT INFORMATION**

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**DOT (US)**

PROPER SHIPPING NAME: TOXIC SOLID, ORGANIC, N.O.S. ( 2-Diphenylacetyl-1,3-indandione-1-hydrazone )  
UN NUMBER: 2811  
CLASS: 6.1  
PACKING GROUP: III  
REPORTABLE QUANTITY (RQ):  
POISON INHALATION HAZARD: NO

**IMDG**

PROPER SHIPPING NAME: TOXIC SOLID, ORGANIC, N.O.S. ( 2-Diphenylacetyl-1,3-indandione-1-hydrazone )  
UN NUMBER: 2811  
CLASS: 6.1  
PACKING GROUP: III  
EMS-NO: F-A, S-A  
MARINE POLLUTANT: YES

**IATA**

PROPER SHIPPING NAME: TOXIC SOLID, ORGANIC, N.O.S. ( 2-Diphenylacetyl-1,3-indandione-1-hydrazone )  
UN NUMBER: 2811  
CLASS: 6.1  
PACKING GROUP: III

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**SECTION 15. REGULATORY INFORMATION**

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**SARA 302 COMPONENTS** THIS MATERIAL DOES NOT CONTAIN ANY COMPONENTS WITH A SECTION 302 EHS TPQ.

**SARA 313 COMPONENTS** THIS MATERIAL DOES NOT CONTAIN ANY CHEMICAL COMPONENTS WITH KNOWN CAS NUMBERS THAT EXCEED THE THRESHOLD (DE MINIMIS) REPORTING LEVELS ESTABLISHED BY SARA TITLE III, SECTION 313.

**SARA 311/312 HAZARDS** ACUTE HEALTH HAZARD

**MASSACHUSETTS RIGHT TO KNOW COMPONENTS**

NO COMPONENTS ARE SUBJECT TO THE MASSACHUSETTS RIGHT TO KNOW ACT.

**PENNSYLVANIA RIGHT TO KNOW COMPONENTS**

|   | CAS-NO.   | REVISION DATE |
|---|-----------|---------------|
| 2-Diphenylacetyl-1,3-indandione-1-hydrazone | 5102-79-4 |               |

**NEW JERSEY RIGHT TO KNOW COMPONENTS**

|   | CAS-NO.   | REVISION DATE |
|---|-----------|---------------|
| 2-Diphenylacetyl-1,3-indandione-1-hydrazone | 5102-79-4 |               |

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## SECTION 16. OTHER INFORMATION

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### FULL TEXT OF H-STATEMENTS REFERRED TO UNDER SECTIONS 2 AND 3.

|      |   |
|------|---|
| H301 | TOXIC IF SWALLOWED.                                   |
| H410 | VERY TOXIC TO AQUATIC LIFE WITH LONG LASTING EFFECTS. |

### MSDS LEGEND

|        |  |
|--------|--|
| MW:    | MOLECULAR WEIGHT   |
| MF:    | MOLECULAR FORMULA  |
| VOC:   | VOLATILE ORGANIC COMPOUNDS                               |
| ACGIH: | AMERICAN CONFERENCE OF GOVERNMENTAL INDUSTRIAL HYGINISTS |
| CAS:   | CHEMICAL ABSTRACTS SERIVE REGISTRY NUMBER                |
| OSHA:  | OCCUPATIONAL SAFETY AND HEALTH ADMINISTRATION            |
| PEL:   | PERMISSIBLE EXPOSURE LIMIT (OSHA)                        |
| TLV:   | THRESHOLD LIMIT VALUE (ACGIH)                            |

### IMPORTANT:

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