

TCI AMERICA SAFETY DATA SHEET

Revision number: 1 Revision date: 07/06/2018

1. IDENTIFICATION

Product name: 4-Nitrobenzoyl Chloride

Product code: N0176

Product use:For laboratory research purposes.Restrictions on use:Not for drug or household use.

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Emergency telephone number:

Chemical Emergencies:

TCI America (8:00am - 5:00pm) PST

+1-503-286-7624

Transportation Emergencies:

Chemtrec 24-Hour

+1-800-424-9300 (U.S.A.) +1-703-527-3887 (International)

Responsible department:

TCI America

Environmental Health Safety and Security

+1-503-286-7624

2. HAZARD(S) IDENTIFICATION

OSHA Haz Com: CFR 1910.1200:

WHMIS 2015:

Eye Damage/Irritation [Category 1] Germ Cell Mutagenicity [Category 2] Corrosive to Metals [Category 1] Skin Corrosion/Irritation [Category 1B]

Signal word: Danger!

Hazard Statement(s): May be corrosive to metals

Causes severe skin burns and eye damage Suspected of causing genetic defects

Pictogram(s) or Symbol(s):





Precautionary Statement(s):

[Prevention]

[Storage]

[Disposal]

Obtain special instructions before use. Do not handle until all safety precautions have been read and understood. Keep only in original container. Do not breathe dusts or mists. Wash hands and face

thoroughly after handling. Wear protective gloves, protective clothing, face protection.

[Response] If swallowed skin (or hair)

If swallowed: Rinse mouth. Do NOT induce vomiting. Immediately call a poison center or doctor. If on skin (or hair): Take off immediately all contaminated clothing. Rinse skin with water or shower. Immediately call a poison center or doctor. Wash contaminated clothing before reuse. If inhaled: Remove person to fresh air and keep comfortable for breathing. Immediately call a poison center or doctor. If in eyes: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing. Immediately call a poison center or doctor. If exposed or concerned:

Get medical advice or attention. Absorb spillage to prevent material damage.

Store in corrosive resistant bottle or metal container with a resistant inner liner. Store locked up.

Dispose of contents and container in accordance with local, regional, national regulations (e.g. US: 40

CFR Part 261, EU:91/156/EEC, JP: Waste Disposal and Cleaning Act, etc.).

Hazards not otherwise classified: [HNOC]

Lachrymator

4-Nitrobenzoyl Chloride **TCI AMERICA** Page 2 of 5

3. COMPOSITION/INFORMATION ON INGREDIENTS

Substance/mixture: Substance

Components: 4-Nitrobenzoyl Chloride

Percent: >98.0%(GC)(T) CAS RN: 122-04-3 Molecular Weight: 185.56 **Chemical Formula:** C7H4CINO3

4. FIRST-AID MEASURES

Description of first aid measures

Inhalation: Remove victim to fresh air and keep at rest in a position comfortable for breathing. Immediately call a

POISON CENTER or doctor/physician.

Skin contact: Remove/Take off immediately all contaminated clothing. Gently wash with plenty of soap and water.

Immediately call a POISON CENTER or doctor/physician.

Eye contact: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do.

Continue rinsing.Immediately call a POISON CENTER or doctor/physician.

Ingestion: Immediately call a POISON CENTER or doctor/physician. Rinse mouth. Do NOT induce vomiting.

Symptoms/effects:

Pain. Redness. Acute: No data available Delayed:

Indication of any immediate medical attention:

Not available. Notes to physician: No data available

5. FIRE-FIGHTING MEASURES

Suitable extinguishing media: Dry chemical, carbon dioxide.

Unsuitable extinguishing media: Water

Specific hazards arising from the

chemical:

Hazardous combustion products:

Other specific hazards:

WARNING: Highly toxic HCl gas is produced during combustion.

Advice for firefighters: Wear self-contained breathing apparatus if possible.

6. ACCIDENTAL RELEASE MEASURES

Personal precautions, protective equipment and emergency procedures: **Environmental precautions:**

Methods and materials for containment

and cleaning up:

Prevention of secondary hazards:

Use personal protective equipment. Keep people away from and upwind of spill/leak. Entry to non-involved personnel should be controlled around the leakage area by roping off, etc.

Prevent product from entering drains.

Sweep dust to collect it into an airtight container, taking care not to disperse it. Adhered or collected material should be promptly disposed of, in accordance with appropriate laws and regulations. Do not allow contact with water. Remove all sources of ignition. Fire-extinguishing devices should be

Take care as it may decompose upon combustion or in high temperatures to generate poisonous fume.

prepared in case of a fire. Use spark-proof tools and explosion-proof equipment.

These products include: Carbon oxides Nitrogen oxides Halogenated compounds

7. HANDLING AND STORAGE

Precautions for safe handling: Handling is performed in a well ventilated place. Wear suitable protective equipment. Prevent

dispersion of dust. Wash hands and face thoroughly after handling.

Use a closed system if possible. Use a local exhaust if dust or aerosol will be generated.

Avoid all contact!

May develop pressure. Open carefully. Use corrosive resistant equipment.

Conditions for safe storage, including any incompatibilities

Storage conditions: Keep container tightly closed. Store in a cool and dark place.

Store under inert gas. Protect from moisture. Store locked up. Store away from incompatible materials such as oxidizing agents.

Moisture-sensitive

Comply with laws. Keep only in original container. Packaging material:

4-Nitrobenzoyl Chloride TCI AMERICA Page 3 of 5

8. EXPOSURE CONTROLS / PERSONAL PROTECTION

Appropriate engineering controls: Follow safe industrial engineering/laboratory practices when handling any chemical. Install a closed

system or local exhaust. Also install safety shower and eye bath.

Personal protective equipment

Respiratory protection: Dust respirator, self-contained breathing apparatus(SCBA), supplied air respirator, etc. Use respirators

approved under appropriate government standards and follow local and national regulations.

Hand protection: Impervious gloves.

Eye protection: Safety goggles. A face-shield, if the situation requires.

Skin and body protection: Impervious protective clothing. Protective boots, if the situation requires.

9. PHYSICAL AND CHEMICAL PROPERTIES

Physical state (20°C): Solid

Form: Crystal - Powder

Colour: Slightly pale yellow - Yellow

Odour: Pungent

Odor threshold:
Odour threshold:
No data available
No data available

Melting point/freezing point: 73°C (163°F) No data available pH: 128°C \(^/0.5kPa\) (262°F) Boiling point/range: No data available. Vapour pressure: **Decomposition temperature:** No data available Vapour density: No data available No data available **Dynamic Viscosity:** Relative density: No data available

Kinematic viscosity: No data available

Log Pow: No data available Evaporation rate(Butyl No data available

Acetate=1):

Flash point: No data available Autoignition temperature: No data available

Flammability(solid, gas): No data available Flammability or explosive limits:

Lower: No data available
Upper: No data available

Solubility(ies):

[Water] No data available

[Other solvents]

Soluble: Ether, Benzene, Acetone, Toluene, Pyridine

10. STABILITY AND REACTIVITY

Reactivity: No data available

Chemical stability: Stable under proper conditions.

Possibility of hazardous reactions: Decomposes in contact with water and liberates toxic gases.

Conditions to avoid: Moisture

Incompatible materials: Oxidizing agents, Bases

Hazardous decomposition products: Carbon dioxide, Carbon monoxide, Nitrogen oxides (NOx), Hydrogen chloride

4-Nitrobenzoyl Chloride **TCI AMERICA** Page 4 of 5

11. TOXICOLOGICAL INFORMATION

RTECS Number: DM6651000

Acute Toxicity:

orl-mus LD50:3440 mg/kg orl-rat LD50:5600 mg/kg

orl-rbt LD50:4750 mg/kg

Skin corrosion/irritation:

No data available

Serious eye damage/irritation:

No data available

Respiratory or skin sensitization:

No data available

Germ cell mutagenicity:

mmo-sat 3 ug/plate (+S9)

Carcinogenicity: No data available

> IARC: No data available NTP: No data available OSHA: No data available

Reproductive toxicity:

ihl-mam TCLo:11830 ug/m³/4H (16W male)

No data available Target organ(s):

12. ECOLOGICAL INFORMATION

Ecotoxicity:

Fish: No data available Crustacea: No data available Algae: No data available

Persistence / degradability: Bioaccumulative potential(BCF):

Mobility in soil

No data available No data available

Soil adsorption (Koc):

Henry's Law (PaM 3/mol):

Log Pow:

No data available No data available No data available

13. DISPOSAL CONSIDERATIONS

Disposal of product: Recycle to process if possible. It is the generator's responsibility to comply with Federal, State and

Local rules and regulations. You may be able to dissolve or mix material with a combustible solvent and burn in a chemical incinerator equipped with an afterburner and scrubber system. This section is intended to provide assistance but does not replace these laws, nor does compliance in accordance with this section ensure regulatory compliance according to the law. US EPA guidelines for

Identification and Listing of Hazardous Waste are listed in 40 CFR Parts 261. The product should not

be allowed to enter the environment, drains, water ways, or the soil. Dispose of as unused product. Do not re-use empty containers. Disposal of container:

Other considerations: Observe all federal, state and local regulations when disposing of the substance. 4-Nitrobenzoyl Chloride TCI AMERICA Page 5 of 5

14. TRANSPORT INFORMATION

DOT (US)

UN number: Proper Shipping Name: Class or Division: Packing Group:

UN3261 Corrosive solid, acidic, organic, n.o.s 8 Corrosive material I

<u>IATA</u>

UN number: Proper Shipping Name: Class or Division: Packing Group:

UN3261 Corrosive solid, acidic, organic, n.o.s 8 Corrosive material I

<u>IMDG</u>

er:

UN UN3261 Proper Shipping Name: Class or Division: Packing Group:

numb Corrosive solid, acidic, organic, n.o.s 8 Corrosive material II

EmS number: F-A, S-B

15. REGULATORY INFORMATION

Toxic Substance Control Act (TSCA 8b.):

This product is ON the EPA Toxic Substances Control Act (TSCA) inventory.

US Federal Regulations

CERCLA Hazardous substance and Reportable Quantity:

SARA 313: Not Listed SARA 302: Not Listed

State Regulations

State Right-to-Know

MassachusettsNot ListedNew JerseyNot ListedPennsylvaniaNot ListedCalifornia Proposition 65:Not Listed

Other Information

NFPA Rating:HMIS Classification:Health:3Health:3Flammability:1Flammability:1Instability:0Physical:0

International Inventories

Canada: DSL On DSL **EC-No:** 204-517-4

16. OTHER INFORMATION

Revision date: 07/06/2018 Revision number: 1

TCI chemicals are for research purposes only and are NOT intended for use as drugs, food additives, households, or pesticides. The information herein is believed to be correct, but does not claim to be all inclusive and should be used only as a guide. Neither the above named supplier nor any of its affiliates or subsidiaries assumes any liability whatsoever for the accuracy or completeness of the information contained herein. Final determination of suitability of any material is the sole responsibility of the user. All chemical reagents must be handled with the recognition that their chemical, physiological, toxicological, and hazardous properties have not been fully investigated or determined. All chemical reagents should be handled only by individuals who are familiar with their potential hazards and who have been fully trained in proper safety, laboratory, and chemical handling procedures. Although certain hazards are described herein, we can not guarantee that these are the only hazards which exist. Our SDS are based only on data available at the time of shipping and are subject to change without notice as new information is obtained. Avoid long storage periods since the product is subject to degradation with age and may become more dangerous or hazardous. It is the responsibility of the user to request updated SDS for products that are stored for extended periods. Disposal of unused product must be undertaken by qualified personnel who are knowledgeable in all applicable regulations and follow all pertinent safety precautions including the use of appropriate protective equipment (e.g. protective goggles, protective clothing, breathing equipment, face mask, fume hood). For proper handling and disposal, always comply with federal, state and local regulations.