

Product Name: Tacrine hydrochloride hydrate

Revision Date: 5/30/2020

Safety Data Sheet(SDS)

I. PRODUCT AND COMPANY IDENTIFICATION

Product Name: Tacrine hydrochloride hydrate

Product Catalog Number: C6449

CAS Number: 206658-92-6

Company: APExBIO Technology

7505 Fannin street, Suite 410,

Houston, TX 77054, USA

+1-832-696-8203 TEL

+1-832-641-3177 FAX

+1-855-577-7998 EMERGENCY PHONE

II. HAZARDS IDENTIFICATION

Emergency Overview

OSHA Hazards:

Acute toxicity,oral(Category 3),H301 Acute toxicity,dermal(Category 3),H311 Skin corrosion/irritation(Category 2),H315 Serious eye damage/eye irritation(Category 2A),H319

Acute toxicity,inhalation(Category 3),H331 Specific target organ toxicity, single exposure; Respiratory tract irritation(Category 3),H335

Carcinogenicity(Category 2),H351

III. COMPOSITION/DATA ON COMPONENTS

Formula: C13H14N2.xHCl.xH2O

Molecular Weight: 198.26(free bases)

©COPYRIGHT 2018 BY APEXBIO TECHNOLOGY

IV. FIRST AID MEASURES

After Inhalation: If inhaled, remove to fresh air; if breathing is

difficult, give oxygen; if breathing stops, give

artificial respiration.

After skin contact: Flush with copious amounts of water; remove

contaminated clothing and shoes; call a physician;

Take victim to hospital immediately; call a

physician.

After eye contact: Check for and remove contact lenses and flush

with copious amounts of water; assure adequate flushing by separating the eyelids with fingers;

call a physician.

After swallowing: If swallowed, wash out mouth with copious

amounts of water; call a physician

V. FIRE FIGHTING MEASURES

Conditions of flammability: Not flammable or combustible.

Suitable extinguishing media: Use water spray, alcohol-resistant foam, dry

chemical or carbon dioxide.

Special protective equipment for

firefighters:

Wear self contained breathing apparatus for fire

fighting if necessary.

Hazardous combustion products: Hazardous decomposition products formed under

fire conditions. - Carbon oxides, nitrogen oxides

(NOx), Sulphur oxides.

VI. ACCIDENTAL RELEASE MEASURES

Personal precautions: Wear respiratory protection. Avoid dust

formation. Avoid breathing vapors, mist or gas.

Environmental precautions: Do not let product enter drains. Prevent further

leakage or spillage if safe to do so.

Methods and materials for containment and cleaning up:

Pick up and arrange disposal without creating dust. Sweep up and shovel. Keep in suitable, closed containers for disposal.

VII. HANDLING AND STORAGE

Precautions for safe handling: Avoid contact with skin and eyes. Avoid formation

of dust and aerosols.

Provide appropriate exhaust ventilation at places

where dust is formed.

Conditions for safe storage: Keep container tightly closed in a dry and

well-ventilated place.

Recommended storage temperature: Store at

-20°C

Keep in a dry place.

VIII. EXPOSURE CONTROLS AND PERSONAL PROTECTION

Personal protective equipment as follows:

Respiratory protection:

Contains no substances with occupational exposure limit values.

Where risk assessment shows air-purifying respirators are appropriate use a full-face particle respirator type N99 (US) or type P2 (EN 143) respirator cartridges as a backup to engineering controls. If the respirator is the sole means of protection, use a full-face supplied air respirator. Use respirators and components tested and approved under appropriate government standards such as NIOSH (US) or CEN (EU).

Hand 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.

Use equipment for eye protection tested and

Eye protection:

approved under appropriate government standards such as NIOSH (US) or EN 166(EU).

Skin and body protection: Choose body protection in relation to its type, to

the concentration and amount of dangerous substances, and to the specific work-place. The type of protective equipment must be selected according to the concentration and amount of

the dangerous substance at the specific

workplace.

Hygiene measures: General industrial hygiene practice.

IX. PHYSICAL AND CHEMICAL PROPERTIES

Information on basic physical and chemical properties

a) Appearance No data available

b) Odour No data available

c) Odour Threshold No data available

d) pH No data available

e) Melting point/freezing point

No data available

f) Initial boiling point and No data available

boiling range

g) Flash point No data available

h) Evaporation rate No data available

i) Flammability (solid, gas) No data available

j) Upper/lower flammability or No data available

explosive limits

k) Vapour pressure No data available

I) Vapour density No data available

m) Relative density

No data available

n) Water solubility

No data available

o) Partition coefficient

No data available

p) Auto-ignition temperature

No data available

q) Decomposition temperature

No data available

r) Viscosity

No data available

s) Explosive properties

No data available

t) Oxidizing properties

No data available

Other safety information

No data available

X. STABILITY AND REACTIVITY

Chemical stability: Stable under recommended storage conditions.

Possibility of hazardous reactions: No data available.

Conditions to avoid: No data available.

Materials to avoid: Strong acids, Strong bases.

XI. TOXICOLOGICAL INFORMATION

Carcinogenicity

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.

ACGIH: No component of this product present at levels

greater than or equal to 0.1% is identified as a

carcinogen or potential carcinogen by ACGIH.

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.

No component of this product present at levels greater than or equal to 0.1% is identified as a carcinogen or potential carcinogen by OSHA.

OSHA:

XII. ECOLOGICAL INFORMATION

General notes: No data available.

XIII. DISPOSAL CONSIDERATION

General notes: Dispose of in accordance with prevailing

country, federal, state and local regulations

XIV. TRANSPORT INFORMATION

DOT (US): This substance is considered to be non-hazardous

for transport.

IMDG: UN number: 3077

Class: 9

Packing group: III EMS-No: F-A, S-F

Proper shipping name: Environmentally

hazardous substance, solid, n.o.s. Marine pollutant: Marine pollutant

UN number: 3077

Class: 9

Packing group: III

Proper shipping name: Environmentally

hazardous substance, solid, n.o.s.

XV. REGULATIONS

IATA:

SARA 302 Components: SARA 302: No chemicals in this material are

subject to the reporting requirements of SARA

Title III, Section 302.

SARA 313 Components: SARA 313: 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 No components are subject to the Massachusetts

Components: Right to Know Act.

Pennsylvania Right To Know No components are subject to the New Jersey

Components: Right to Know Act.

New Jersey Right To Know No components are subject to the New Jersey

Components: Right to Know Act.

California Prop. 65 Components: This product does not contain any chemicals

known to State of California to cause cancer, birth

defects, or any other reproductive harm.

XVI. OTHER INFORMATION

Copyright 2018 APExBIO License granted to make unlimited paper copies for internal use only. The above information is believed to be correct but does not purport to be all inclusive and shall be used only as a guide. The information in this document is based on the present state of our knowledge and is applicable to the product with regard to appropriate safety precautions. It does not represent any guarantee of the properties of the product. APExBIO Corporation and its Affiliates shall not be held liable for any damage resulting from handling or from contact with the above product. See www. apexbt.com and/or the reverse side of invoice or packing slip for additional terms and conditions of sale.