

1. IDENTIFICATION OF THE SUBSTANCE/MIXTURE AND OF THE COMPANY/UNDERTAKING

1.1 Product identifiers

Product name : Luperox® 224, 2,4-Pentanedione peroxide solution

1.2 Relevant identified uses of the substance or mixture and uses advised against

Identified uses : Laboratory chemicals, Manufacture of substances

2. HAZARDS IDENTIFICATION

2.1 Classification of the substance or mixture

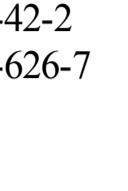
Classification according to EU Directives 67/548/EEC or 1999/45/EC

May cause fire. May cause harm to the unborn child. Causes burns. Irritating to respiratory system.

2.2 Label elements

According to European Directive 67/548/EEC as amended.

Hazard symbol(s)



R-phrase(s)

R61 May cause harm to the unborn child.

R7 May cause fire.

R34 Causes burns.

R37 Irritating to respiratory system.

S-phrase(s)

S53 Avoid exposure - obtain special instructions before use.

S 3/7 Keep container tightly closed in a cool place.

S14 Keep away from easily oxidizable materials.

S26 In case of contact with eyes, rinse immediately with plenty of water and seek medical advice.

S36/37/39 Wear suitable protective clothing, gloves and eye/face protection.

S45 In case of accident or if you feel unwell, seek medical advice immediately (show the label where possible).

Restricted to professional users.

2.3 Other hazards - none

3. COMPOSITION/INFORMATION ON INGREDIENTS

3.2 Mixtures

Synonyms : 2,4-Pentanedione peroxide

Formula : C10H14O6

Component

Classification

Concentration

2,4-Pentanedione, peroxide

CAS-No. 37187-22-7

Skin Corr. 1B; H314

34 %

EC-No. 253-384-9

O, C, R 7 - R34

4-Hydroxy-4-methylpentan-2-one

CAS-No. 123-42-2

Flam. Liq. 3; Acute Tox. 3; Eye 31 %

EC-No. 204-626-7

Dam. 1; H226, H318, H331

Xi, R36

N-methyl-2-pyrrolidone

CAS-No. 872-50-4

Repr. 1B; Eye Irrit. 2; STOT

14 %

EC-No. 212-828-1

SE 3; Skin Irrit. 2; H360D,

Registration number 01-2119472430-46-XXXX

H319, H335, H315

T, Repr. Cat.2, R61 -

R36/37/38

Hydrogen peroxide

CAS-No. 7722-84-1

Ox. Liq. 1; Acute Tox. 4; Skin

1%

EC-No. 231-765-0

Corr. 1A; H271, H302, H314,

H332

O, C, R 5 - R 8 - R20/22 - R35

Diethylene glycol

CAS-No. 111-46-6

Acute Tox. 4; H302

8%

EC-No. 203-872-2

Xn, R22

Acetylacetone

CAS-No. 123-54-6

Flam. Liq. 3; Acute Tox. 4;

2%

EC-No. 204-634-0

H226, H302

Xn, R10 - R22

Acetic acid

CAS-No. 64-19-7

Flam. Liq. 3; Skin Corr. 1A;

1%

EC-No. 200-580-7

H226, H314

C, R10 - R35

Water

CAS-No. 7732-18-5

-

9%

EC-No. 231-791-2

For the full text of the H-Statements and R-Phrases mentioned in this Section, see Section 16

4. FIRST AID MEASURES

4.1 Description of first aid measures

If inhaled

If breathed in, move person into fresh air. If not breathing, give artificial respiration.

In case of skin contact

Wash off with soap and plenty of water.

In case of eye contact

Flush eyes with water as a precaution.

If swallowed

Never give anything by mouth to an unconscious person. Rinse mouth with water.

4.2 Most important symptoms and effects, both acute and delayed

Dizziness, Cough, chest pain, Difficulty in breathing, Convulsions, Incoordination, Abdominal pain, Material is extremely destructive to tissue of the mucous membranes and upper respiratory tract, eyes, and skin, burning sensation

4.3 Indication of any immediate medical attention and special treatment needed

no data available

5. FIRE-FIGHTING MEASURES

5.1 Extinguishing media

Suitable extinguishing media

Use water spray, alcohol-resistant foam, dry chemical or carbon dioxide.

5.2 Special hazards arising from the substance or mixture

Carbon oxides, nitrogen oxides (NOx)

5.3 Advice for fire-fighters

Wear self contained breathing apparatus for fire fighting if necessary.

5.4 Further information

no data available

6. ACCIDENTAL RELEASE MEASURES

6.1 Personal precautions, protective equipment and emergency procedures

Avoid breathing vapors, mist or gas.

6.2 Environmental precautions

Do not let product enter drains.

6.3 Methods and materials for containment and cleaning up

Keep in suitable, closed containers for disposal.

6.4 Reference to other sections

For disposal see section 13.

7. HANDLING AND STORAGE

7.1 Precautions for safe handling

Normal measures for preventive fire protection.

7.2 Conditions for safe storage, including any incompatibilities

Store in cool place. Keep container tightly closed in a dry and well-ventilated place.

Recommended storage temperature: 2 - 8 °C

7.3 Specific end uses

no data available

8. EXPOSURE CONTROLS/PERSONAL PROTECTION

8.1 Control parameters

Components with workplace control parameters

8.2 Exposure controls

Appropriate engineering controls

General industrial hygiene practice.

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).

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.

The selected protective gloves have to satisfy the specifications of EU Directive 89/686/EEC and the standard EN 374 derived from it.

Body Protection

Impervious clothing. The type of protective equipment must be selected according to the concentration and amount of the dangerous substance at the specific workplace.

Respiratory protection

Respiratory protection not required. For nuisance exposures use type OV/AG (US) or type ABEK (EU EN 14387) respirator cartridges. Use respirators and components tested and approved under appropriate government standards such as NIOSH (US) or CEN (EU).

9. PHYSICAL AND CHEMICAL PROPERTIES

9.1 Information on basic physical and chemical properties

a) Appearance

Form: liquid

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 boiling range

68 °C

g) Flash point

101,11 °C - closed cup

h) Evaporation rate

no data available

i) Flammability (solid, gas)

no data available

j) Upper/lower flammability or explosive limits

no data available

k) Vapour pressure

no data available

l) Vapour density

no data available

m) Relative density

1,008 g/cm³ at 25 °C

n) Partition coefficient: n-octanol/water

no data available

o) Autoignition temperature