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## 1 Identification of the substance/mixture and of the company/undertaking

· Product identifier

· Trade name: Rolmark Solvent

· Article number: RMS-G, RMS-Q, 5A133

• CAS Number: 123-42-2

• **EC number:** 204-626-7

• Index number: 603-016-00-1

- · Application of the substance / the preparation Cleaner solvent
- · Details of the supplier of the safety data sheet
- · Manufacturer/Supplier:

Marsh Shipping Supply Co.,LLC 926 McDonough Lake Road - Unit E Collinsville, IL 62234 USA

· Information department: customerservice@msscllc.com

· Emergency telephone number: Infotrac: USA 1 800 535 5053

International 352-323-3500 Call Collect

### 2 Composition/information on ingredients

- · Chemical characterization: Substances
- · CAS No. Description

123-42-2 4-hydroxy-4-methylpentan-2-one

- $\cdot \textit{Identification number}(s)$
- · EC number: 204-626-7
- · Index number: 603-016-00-1

### 3 Hazards identification

· Classification of the substance or mixture



GHS02 Flame

H226 Flammable liquid and vapour.



GHS07

H319 Causes serious eye irritation.

· Classification according to Directive 67/548/EEC or Directive 1999/45/EC

Read MSDS before using

WARNING! FLAMMABLE LIQUID. HARMFUL. Keep liquid and vapors away from ingnition sources, heat, and static discharge. Avoid contact with eyes and skin. Avoid inhalation of mist or vapor.

NOTICE-For professional users only! This material is intended for use by trained professional applicators, only after carefully examining this MSDS and evaluating safety precautions associated with the use of this material.



Xi; Irritant

R36: Irritating to eyes.

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- · Information concerning particular hazards for human and environment: Not applicable.
- · Label elements
- · Labelling according to EU guidelines:

The product has been classified and marked in accordance with directives on hazardous materials.

· Code letter and hazard designation of product:

Xi Irritant

· Risk phrases:

36 Irritating to eyes.

- · Safety phrases:
- Keep out of the reach of children.

24/25 Avoid contact with skin and eyes.

- · Information pertaining to particular dangers for man and environment:
- · Potential Chronic Health Effects

Prolonged or repeated exposure of vapors, spray, or material may cause diseases of the lungs. Reports have associated repeated overexposure to solvents with brain and nervous system damage. Intentional misuse of this product may be harmful or fatal.

· Target Organs

Overexposure to this material or its components has been suggested as a cause of the following effects in laboratory animals and/or humans, and may aggravate preexisting disorders of these organs in humans: Anemia, Blood disorders, Brain damage, Cardiac function, eye, liver, lung, menstrual and fertility, skin, respiratory, Central Nervous System

- · Classification system:
- · NFPA ratings (scale 0 4)



Health = 1Fire = 2Reactivity = 0

· HMIS-ratings (scale 0 - 4)



Health = 1Fire = 2

Reactivity = 0

### 4 First aid measures

· General information:

Take affected persons out into the fresh air.

Involve doctor immediately.

- · After inhalation: Supply fresh air; consult doctor in case of complaints.
- · After skin contact: Immediately rinse with water for 15 minutes. If irritation exists call physcian.
- · After eye contact:

Rinse opened eye for fifteen minutes under running water. If irritation persists, consult a doctor.

· After swallowing: Do not induce vomiting; immediately call for medical help.

### 5 Firefighting measures

· Suitable extinguishing agents:

CO2, extinguishing powder or water spray. Fight larger fires with water spray or alcohol resistant foam.

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· Special hazards arising from the substance or mixture

*Nitrogen oxides (NOx)* 

Carbon monoxide (CO)

· Protective equipment:

Wear self-contained respiatory protective device.

Wear fully protective suit.

· Additional information

Dispose of fire debris and contaminated fire fighting water in accordance with official regulations.

Collect contaminated fire fighting water separately. It must not enter the sewage system.

### 6 Accidental release measures

· Personal precautions, protective equipment and emergency procedures

Wear protective equipment. Keep unprotected persons away.

Ensure adequate ventilation

Wear protective clothing.

· Environmental precautions:

Do not allow product to reach sewage system or any water course.

Dilute with plenty of water.

Do not allow to enter sewers/ surface or ground water.

Prevent from spreading (e.g. by damming-in or oil barriers).

· Methods and material for containment and cleaning up:

Absorb with liquid-binding material (sand, diatomite, acid binders, universal binders, sawdust).

Dispose contaminated material as waste according to item 13.

· Reference to other sections

See Section 7 for information on safe handling.

See Section 8 for information on personal protection equipment.

See Section 13 for disposal information.

### 7 Handling and storage

- · Handling:
- · Precautions for safe handling

Store in cool, dry place in tightly closed receptacles.

Keep away from heat and direct sunlight.

Handle with care. Avoid jolting, friction and impact.

Hydrocarbon solvents are basically non-conductors of electricity and can become electrostatically charged during mixing or moving, observe grounding/grounding of containers and other equipment when handeling.

- · Information about protection against explosions and fires: No special measures required.
- · Storage:
- · Requirements to be met by storerooms and receptacles: Prevent any seepage into the ground.
- · Information about storage in one common storage facility:

Do not store together with oxidizing and acidic materials as well as heavy-metal compounds.

Store away from foodstuffs.

· Further information about storage conditions:

Keep receptacle tightly sealed.

Store in cool, dry conditions in well sealed receptacles.

Protect from humidity and water.

Protect from exposure to the light.

· Specific end use(s) No further relevant information available.

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### 8 Exposure controls/personal protection

## · Components with limit values that require monitoring at the workplace:

### 123-42-2 4-hydroxy-4-methylpentan-2-one

PEL 240 mg/m³, 50 ppm

REL 240 mg/m<sup>3</sup>, 50 ppm

TLV  $|238 \text{ mg/m}^3, 50 \text{ ppm}|$ 

- · Additional information: The lists that were valid during the creation were used as basis.
- · Personal protective equipment:

#### · General protective and hygienic measures:

The usual precautionary measures for handling chemicals should be followed.

Keep away from foodstuffs, beverages and feed.

Immediately remove all soiled and contaminated clothing.

Wash hands before breaks and at the end of work.

Do not inhale gases / fumes / aerosols.

Avoid contact with the eyes and skin.

Pregnant women should strictly avoid inhalation or skin contact.

Do not eat, drink, smoke or sniff while working.

### · Breathing equipment:

Use suitable respiratory protective device in case of insufficient ventilation.

Use only with adequate ventillatiion.

Do not breath vapors, spray mists, or sanding dusts. Use air purifying respirators fitted with organic vapor/HEPA cartridges only if air monitoring demonstrates solvent/particulate levels do not exceed the respirator maximum use concentration. Use properly fitted NIOSH approved respirators. Local and general exhaust should minimize any exposure.

· Protection of hands:



Protective gloves

#### · Material of gloves

Nitrile or natural rubber gloves are typically used to protect from minor contact. Butyl type are best for prolonged contact.

The selection of the suitable gloves does not only depend on the material, but also on further marks of quality and varies from manufacturer to manufacturer.

Nitrile rubber, NBR

· Eye protection:



Vapor proof safety goggles or full face respirator

### · Body protection:

Solvent resistant protective clothing

Impervious protective clothing

Tyvek(R) coveralls to protect from light overspray protection or Saranex 23-P(R) for moderate exposure.

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General Information		
Appearance:		
Form:	Fluid	
Color:	Clear	
Odor:	Pleasant	
Odour threshold:	Not determined.	
pH-value:	Not determined.	
Change in condition		
Melting point/Melting range:	-47°C (-53 °F)	
Boiling point/Boiling range:	150°C (302 °F)	
Flash point:	58°C (136 °F)	
Flammability (solid, gaseous):	Not applicable.	
Ignition temperature:	620°C (1148 °F)	
Decomposition temperature:	Not determined.	
Auto igniting:	Not determined.	
Danger of explosion:	Not determined.	
Explosion limits:		
Lower:	1.4 Vol %	
Upper:	8.1 Vol %	
Vapor pressure at 20°C (68 °F):	1.1 hPa (1 mm Hg)	
Density at 20°C (68 °F):	0.93 g/cm <sup>3</sup> (7.761 lbs/gal)	
Relative density	Not determined.	
Vapour density	Not determined.	
Evaporation rate	Not determined.	
Solubility in / Miscibility with		
Water:	Fully miscible.	
Segregation coefficient (n-octonol/wa	uter): Not determined.	
Viscosity:		
Dynamic:	Not determined.	
Kinematic:	Not determined.	
Organic solvents:	100.0 %	
VOC content:	100.0 %	
	930.0 g/l / 7.76 lb/gl	
Other information	No further relevant information available.	

# 10 Stability and reactivity

- · Thermal decomposition / conditions to be avoided: No decomposition if used according to specifications.
- · Incompatible materials: No further relevant information available.
- · Hazardous decomposition products:

Nitrogen oxides

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Carbon monoxide and carbon dioxide

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### 11 Toxicological information

- · Acute toxicity:
- · LD/LC50 values that are relevant for classification:

123-42-2 4-hydroxy-4-methylpentan-2-one

 Oral
 LD50
 4000 mg/kg (rat)

 Dermal
 LD50
 13630 mg/kg (rab)

- · Primary irritant effect:
- on the skin: Irritant to skin and mucous membranes.
- · on the eye: Irritating effect.
- · Sensitization:

Sensitizing effect through inhalation is possible with prolonged exposure.

Sensitizing effect by skin contact is possible with prolonged exposure.

· Additional toxicological information: Danger through skin absorption.

## 12 Ecological information

- · Aquatic toxicity: No further relevant information available.
- $\cdot \textit{Persistence and degradability} \ \textit{No further relevant information available}.$
- · Behavior in environmental systems:
- · Bioaccumulative potential No further relevant information available.
- · Additional ecological information:
- · General notes:

Water hazard class 1 (Assessment by list): slightly hazardous for water

This statement was deduced from the properties of the single components.

# 13 Disposal considerations

- · Waste treatment methods
- · Recommendation:

Must not be disposed of together with household garbage. Do not allow product to reach sewage system. Hand over to hazardous waste disposers.

This material and containers that are not empty, if discarded, would be regulated as a hazardous waste under RCRA. Treatment and disposal must be completed at a RCRA permitted treatment, storage, and disposal facility (TSD). The storage and transportation of RCRA hazardous wastes are also regulated by the USEPA.

- · Uncleaned packagings:
- · Recommendation: Disposal must be made according to official regulations.
- · Recommended cleansing agent: Water, if necessary with cleansing agents.

### 14 Transport information

- · UN-Number
- · ADR, IMDG, IATA
- · UN proper shipping name
- · ADR 1148 DIACETONE ALCOHOL

1148

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(Contd. of page 6) DIACETONE ALCOHOL · IMDG, IATA · Transport hazard class(es)  $\cdot DOT$ Ink Solvent, not regulated by Title 49 Part 173.150 Exceptions for · Class Class 3 (flammable) and combustible liquids, (f)(1) $\cdot ADR$ · Class 3 Flammable liquids · Label · IMDG, IATA 3 Flammable liquids. · Class · Label 3 · Packing group III· ADR, IMDG, IATA · Environmental hazards: · Marine pollutant: No · Special precautions for user Warning: Flammable liquids · EMS Number: F-E,S-D· Transport in bulk according to Annex II of MARPOL73/78 and the IBC Code Not applicable. · UN "Model Regulation": UN1993, FLAMMABLE LIQUID, N.O.S., 3, III

## 15 Regulatory information

· TSCA (Toxic Substances Control Act):

All ingredients are listed or exempt.

123-42-2 4-hydroxy-4-methylpentan-2-one

- · Cancerogenity categories
- · IARC (International Agency for Research on Cancer)

Substance is not listed.

· NTP (National Toxicology Program)

Substance is not listed.

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#### · NIOSH (National Institute for Occupational Safety and Health)

123-42-2 4-hydroxy-4-methylpentan-2-one

Guidelines 89-104

- · State regulations
- · New Jersey Right-to-know Trade Secret Registry Number TSRN 67118600000-5004P
- · Massachussetts Right-to-know / Hazardous Substance Codes

123-42-2 4-hydroxy-4-methylpentan-2-one

2,4

### · Florida Hazardous / Toxic Substance Lists

123-42-2 4-hydroxy-4-methylpentan-2-one

Toxic

### · Pennsylvania Hazardous Substances

123-42-2 4-hydroxy-4-methylpentan-2-one

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# · Minnesota Right To Know / Hazardous Substances

123-42-2 4-hydroxy-4-methylpentan-2-one

ANO

#### · Illinois Right To Know

Substance is not listed.

### · Product related hazard informations:

The product has been classified and marked in accordance with directives on hazardous materials.

· Hazard symbols:

Xi Irritant

### · Risk phrases:

36 Irritating to eyes.

- · Safety phrases:
  - 2 Keep out of the reach of children.

24/25 Avoid contact with skin and eyes.

- · National regulations:
- · Occupational Safety and Health Act (OSHA)

Immediate (acute) health hazard

Delayed (chronic) Health Hazard

· Water hazard class: Water hazard class 1 (Assessment by list): slightly hazardous for water.

# 16 Other information

To the best of our knowledge, the information contained herein is accurate. However, neither the above named supplier nor any of its 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 materials may present unknown hazards and should be used with caution. Although certain hazards are described herein, we cannot guarantee that these are the only hazards that exist.

- · Contact: Mike Rickert
- · Abbreviations and acronyms:

ADR: Accord européen sur le transport des marchandises dangereuses par Route (European Agreement concerning the International Carriage of Dangerous Goods by Road)

RID: Règlement international concernant le transport des marchandises dangereuses par chemin de fer (Regulations Concerning the International Transport of Dangerous Goods by Rail)

IMDG: International Maritime Code for Dangerous Goods

IATA: International Air Transport Association

ICAO: International Civil Aviation Organization

EINECS: European Inventory of Existing Commercial Chemical Substances

CAS: Chemical Abstracts Service (division of the American Chemical Society)

NFPA: National Fire Protection Association (USA)

HMIS: Hazardous Materials Identification System (USA)

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VOC: Volatile Organic Compounds (USA, EU) LC50: Lethal concentration, 50 percent LD50: Lethal dose, 50 percent

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USA