

# **Safety Data Sheet**

SECTION 1: Identification of the substance/mixture and of the company/undertaking

1.1. Product identifier: EPSON INK CARTRIDGE T6892

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

Identified uses; Ink for Inkjet Printing

1.3. Details of the supplier of the safety data sheet:

Distributor: SEIKO EPSON CORPORATION

Address: 80 Harashinden, Hirooka,

Shiojiri-shi, Nagano-ken, 399-0785

**JAPAN** 

Date Prepared: 30 August 2013

Revision: A

1.4. Emergency telephone number: +81-263-52-2552 (Mon-Fri, 9AM-5PM JST)

#### **SECTION 2: Hazards identification**

2.1. Classification of the mixture:

Classification (UN GHS);

SKIN CORROSION/IRRITATION: Hazard category 2

2.2. Label elements: Label in Accordance with 1999/45/EC

**(!)** 

Symbols;

Signal word; Warning

Hazard statements; (H315) Causes skin irritation.

(H227) Combustible liquid.

Precautionary statements;

(P264) Wash hands thoroughly after handling.

(P280) Wear protective gloves/protective clothing/eye protection/face protection.

(P302+P352) IF ON SKIN: Wash with plenty of soap and water.
(P332+P313) If skin irritation occurs: Get medical advice/attention.
(P362+P364) Take off contaminated clothing and wash before reuse.
(P210) Keep away from open flames/hot surfaces. No smoking.

(P370+P378) In case of fire: Use alcohol resistant foam for extinction.

(P403+P235) Store in a well-ventilated place. Keep cool.

(P501) Dispose of contents/container to an appropriate treatment and disposal facility in

accordance with applicable laws and regulations, and product characteristics at

time of disposal.

# **SECTION 3: Composition/information on ingredients**

Substance / Mixture: Mixture (Ink Composition)

| Ink Composition                      | CAS No.   | % By<br>Weight | Remark |
|--------------------------------------|-----------|----------------|--------|
| Diethylene Glycol Diethyl Ether      | 112-36-7  | 50-60          | None   |
| Diethylene Glycol Methyl Ethyl Ether | 1002-67-1 | 15-25          | None   |



| $\gamma$ -Butyrolatone        | 96-48-0      | about 10 | None |
|-------------------------------|--------------|----------|------|
| Proprietary organic materials | Trade secret | 5-15     | None |
| Colorants                     | Trade secret | 1-5      | None |

#### **SECTION 4: First aid measures**

4.1. Description of first aid measures

4.1.1. Eyes: Immediately flush with room temperature, low pressure and clean water for at least 15

minutes. Seek medical attention if eye irritation continues.

4.1.2. Skin: IF ON SKIN: Wash with plenty of soap and water. Take off contaminated clothing and wash

before reuse.

If skin irritation occurs: Get medical advice/attention.

**4.1.3.** *Inhalation*: Remove subject to ventilated fresh air. If not breathing, give artificial respiration right away.

If breathing is difficult, give oxygen.. Seek immediate medical attention.

4.1.4. Ingestion: Seek medical advice; and attention if stomach continues to be upset.

IF SWALLOWED: Do not induce vomiting.

4.2. Most important symptoms and effects, both acute and delayed:

Skin: Ink contact with skin may cause irritation, swelling or redness.

4.3. Indication of any immediate medical attention and special treatment needed: Not necessary

### **SECTION 5: Fire-fighting measures**

5.1. Extinguishing Media

5.1.1. Suitable extinguishing media: Water spray, dry chemical, carbon dioxide or, alcohol-resistant foam.

5.1.2. Unsuitable extinguishing media: None

5.2. Special hazards arising from the substance or mixture: None.

5.3. Advice for firefighters: Extinguish to use fire fighting media or plentiful fog water. Put protection wear

without fail in case of fire fighting work; do not work in the leeward.

#### **SECTION 6: Accidental release measures**

6.1. Personal precautions, protective equipment and emergency procedures

6.1.1. For non-emergency personnel: Eye or Skin protection required during clean-up. Use proper ventilation.

*6.1.2. For emergency responders:* None

**6.2.** Environmental precautions: Do not release to sewer, surface- or ground-water.

6.3. Methods and material for containment and cleaning up

6.3.1. Advice on how to contain a spill: Use sponges to wipe-up ink.

6.3.2. Advice how to clean-up a spill: Rinse area with damp cloth. Place waste in closed container for disposal.

Wash hands with soap and water.

6.3.3. Any other information: Do not dispose of waste to the sewer.6.4. Reference to other sections: Please refer SECTION 13 for disposal.

# **SECTION 7: Handling and storage**

7.1. Precautions for safe handling

**7.1.1. Recommendations:** Use proper ventilation and no fire in work place.

Keep out of reach of children and do not drink ink.

Do not dismantle cartridge.

7.1.2. Advice on general occupational hygiene:

Avoid contact with skin, eyes or clothing.

In the case of skin contact, wash with soap and water.



## 7.2. Conditions for safe storage, including any incompatibilities:

Do not store the cartridge in high or freezing temperatures.

Keep cartridge out of direct sunlight.

Do not store the cartridge with oxidizing agents or explosives. Make sure cartridge is dry before insertion into printer housing.

7.3. Specific end use(s): Not specified

# **SECTION 8: Exposure controls/personal protection**

#### 8.1. Control parameters:

Diethylene glycol diethyl ether (CAS No. 112-36-7)

California OELs (California Code of Regulations, Title 8, Section 5155. Airborne Contaminants)

The 8-Hour TWA Exposure Value: 5 ppm The 8-Hour TWA Exposure Value: 33 mg/m<sup>3</sup>

# 8.2. Exposure Controls

**8.2.1.** Appropriate engineering controls: Proper ventilation, in prevention.

# 8.2.2. Individual protection measures, such as personal protective equipment

# 8.2.2.1. Use of personal protective equipment:

Not required under suitable use as setting the cartridge on the printer.

If there is a possibility of exposure to raw ink: Wear protective gloves/ protective clothing/ eye protection/ face protection.

### 8.2.2.2. Detailed specification on equipment to provide adequate and suitable protection

(a) eye/face protection: Not required under suitable use as setting the cartridge on the printer.

If there is a possibility of exposure to raw ink: Wear eye protection/ face protection.

(b) skin protection: hand protection & others:

Not required under suitable use as setting the cartridge on the printer.

If there is a possibility of exposure to raw ink: Wear protective gloves/ protective clothing.

(c) respiratory protection: Not required under suitable use as setting the cartridge on the printer.

(d) thermal hazards: Not required under suitable use as setting the cartridge on the printer.

**8.2.3.** *Environmental exposure controls:* Not established

# **SECTION 9: Physical and chemical properties**

#### 9.1. Information on basic physical and chemical properties:

Appearance: Cyan Liquid Odour: Slightly

Odour threshold: No data available Not applicable pH: No data available *Melting point / freezing point:* Initial boiling point and boiling range: No data available 76.4°C (Closed cup) Flash point: Evaporation rate: No data available Flammability (solid, gas): Not applicable (liquid) Upper/lower flammability or explosive limits: No data available Vapor pressure: No data available Vapor density: No data available No data available Relative density:

Solubility(ies): Soluble

Partition coefficient: n-octanol/water:No data availableAuto-ignition temperature:No data availableDecomposition temperature:No data available

Viscosity: Less than 5 mPa·s at 20°C

Explosive properties: Explosive limits: 1.4~6.9v/v% as γ-Butyrolactone

Oxidizing properties: None



**9.2.** *Other information:* None

# **SECTION 10:Stability and reactivity**

10.1. Reactivity: Stable under normal temperature10.2. Chemical stability: Stable under normal temperature

10.3. Possibility of hazardous reactions: None

10.4. Conditions to avoid: High and freezing temperatures10.5. Incompatible materials: Oxidizers and explosives

10.6. Hazardous decomposition products: No data available

### **SECTION 11: Toxicological information**

## 11.1. Information on toxicological effects:

Acute toxicity: Oral  $LD_{50}$ : No data available

Dermal LD<sub>50</sub>: No data available

Irritation Eye: No data available

Skin: Hazard category 2 for classification according to UN GHS

Corrosivity: No data available
Sensitisation Skin: No data available
Carcinogenicity: No data available

Not contain any substances listed in IARC Monographs (1,2A and 2B)

Mutagenicity: No data available Toxicity for reproduction: No data available

#### **SECTION 12:Ecological information**

12.1. Toxicity:No data available12.2. Persistence and degradability:No data available12.3. Bioaccumulative potential:No data available12.4. Mobility in soil:No data available

12.5. Results of PBT and vPvB assessment: Has not carried out PBT and vPvB assessment

12.6. Other adverse effects: No data available

#### **SECTION 13: Disposal considerations**

13.1Waste treatment methods: Dispose of contents/container to an appropriate treatment and disposal facility

in accordance with applicable laws and regulations, and product characteristics

at time of disposal.

#### **SECTION 14: Transport information**

14.1. UN number:Not applicable14.2. UN proper shipping name:Not applicable14.3. Transport hazard class(es):Not applicable14.4. Packing group:Not applicable14.5. Environmental hazards:Not applicable14.6. Special precautions for user:Not applicable

14.7. Transport in bulk according to Annex II of MARPOL 73/78 and the IBC Code: Not applicable

## **SECTION 15:Regulatory information**

15.1. Safety, health and environmental regulations/legislation specific for the substance or mixture:



EU Information:

Regulation (EC) No 2037/2000: Is not subject Regulation (EC) No 850/2004: Is not subject Regulation (EC) No 689/2008: Is not subject

US Information:

TSCA Section 4(a) Final Test Rules Regulated:

Not regulated

TSCA Section 5 Significant New Use Rule Regulation: proposed

Ingredient: DEGDEE (CAS# 112-36-7)

Reference: 76FR40850

TSCA Section 8(a) Preliminary Assessment Information Rule (PAIR): Not regulated

TSCA Section 12(b) One-Time Export Notification Regulated:

Ingredient: DEGDEE (CAS# 112-36-7)

Regulation: TSCA 5 Proposed SUNR

Clean Air Act Section 112, Hazardous Air Pollutants: DEGDEE (CAS# 112-36-7)

DEGMEE (CAS#1002-67-1)

EPCRA (SARA Title III) Section 313: DEGDEE (CAS# 112-36-7)

DEGMEE (CAS#1002-67-1)

NFPA Hazard Rating : Health (1), Flammability (2), Instability/Reactivity (0), Other (0) HMIS Hazard Rating : Health (1), Flammability (2), Instability/Reactivity (0), PPE (D)

California Proposition 65: Not regulated

Canada Information:

WHMIS Controlled Product: Not applicable (Manufactured article)

Australia Information:

Statement of Hazardous Nature: Classified as Irritant according to criteria of NOHSC

New Zealand Information

Hazardous Substances and New Organisms Act 1996: Not regulated

15.2. Chemical safety assessment: This ink has not carried out any Chemical Safety Assessment yet.

#### **SECTION 16:Other information**

Revision history

Established Rev. A 30 August 2013 new document

This "Safety Data Sheet" contains health, safety, and environmental information. It does not replace any precautionary language or use and disposal information which accompanies the product. The information contained herein is believed to be accurate at the time of preparation, but should only be used as a guide. It is subject to revision from time to time. EPSON does not warrant the completeness or accuracy of the information contained herein.