

MSDS Safety Data Sheet

Issue date 08-Jan-2016 (DD-MMM-YYYY) Revision date 09-Mar-2016 (DD-MMM-YYYY)

SECTION 1: PRODUCT AND COMPANY IDENTIFICATION

Product name INKJET INK JUT - 03 YELLOW

Product Name (English) INKJET INK JUT - 03 YELLOW

Recommended Use Ink jet ink (UV curing)

H- Product code 042150

E- Product code F1929072-LRGB4432-LRGB4432

Company Name Universal

Phaeton Ltd. Huiyang,Huizhou City Guangdong, China, 516213 +86 752 3737219

SECTION 2: Hazards identification

GHS - Classification

| Acute toxicity - Oral | Category 4 |
|--|-------------|
| skin corrosion/irritation | Category 2 |
| Serious eye damage/eye irritation | Category 1 |
| Skin sensitization | Category 1B |
| Reproductive toxicity | Category 2 |
| Specific target organ toxicity (repeated exposure) | Category 1 |
| Acute aquatic toxicity | Category 2 |
| Chronic aquatic toxicity | Category 2 |

Label Elements

Pictogram



Signal Word hazard statements H302 -

Harmful if swallowed

DANGER

H315 - Causes skin irritation

H318 - Causes serious eye damage

H317 - May cause an allergic skin reaction

H361 - Suspected of damaging fertility or the unborn child

H372 - Causes damage to organs through prolonged or repeated exposure

H411 - Toxic to aquatic life with long lasting effects

Precautionary Statements - Prevention

Obtain special instructions before use

Do not handle until all safety precautions have been read and understood

Use personal protective equipment as required

Wash face, hands and any exposed skin thoroughly after handling

Do not eat, drink or smoke when using this product

Contaminated work clothing should not be allowed out of the workplace

Wear protective gloves

Do not breathe dust/fume/gas/mist/vapors/spray

Avoid release to the environment

Precautionary Statements - Response

IF exposed or concerned: Get medical advice/attention

Specific treatment skin

IF ON SKIN: Wash with plenty of soap and water

Take off contaminated clothing and wash before reuse If skin

irritation or rash occurs: Get medical advice/attention eye

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/physician

INGESTION

IF SWALLOWED: Call a POISON CENTER or doctor/physician if you feel unwell

Rinse mouth

Spill

Collect spillage

Precautionary Statements - Storage Store

locked up

Precautionary Statements - Disposal

Dispose of contents/container to an approved waste disposal plant

Hazards not otherwise classified (HNOC)

Not applicable

SECTION 3: Composition/information on ingredients

Single Substance or Mixture mixture

Recommended UseInk jet ink (UV curing)

Ingredients contributing to the classification of the mixture, etc.

| Chemical name | CAS No | weight-% | |
|---|-----------|----------|--|
| 2-Propenoic acid, phenylmethyl ester | 2495-35-4 | 20-30 | |
| 2-Propenoic acid, 1,7,7-trimethylbicyclo[2.2.1]hept-2-yl ester, exo- | 5888-33-5 | 10-20 | |
| Morpholine, 4-(1-oxo-2-propenyl)- | 5117-12-4 | 10-20 | |

| 2H-Azepin-2-one, 1-ethenylhexahydro- | 2235-00-9 | 10-20 | |
|---|------------|-------|--|
| Diphenyl-2,4,6-trimethylbenzoyl phosphine oxide | 75980-60-8 | 10-20 | |
| 2-Propenoic acid, 2-phenoxyethyl ester | 48145-04-6 | 5-10 | |
| 1,6-Hexanediol diacrylate | 13048-33-4 | < 1 | |
| Poly[oxy(methyl-1,2-ethanediyl)], .alpha.,.alpha.',. alpha."-1,2,3-propanetriyltris[.omega[(1-oxo-2-p ropenyl)oxy]- | 52408-84-1 | <1 | |

SECTION 4: First aid measures

General advice Immediate medical attention is required

If symptoms persist, call a physician

Do not breathe dust/fume/gas/mist/vapors/spray

Do not get in eyes, on skin, or on clothing

May produce an allergic reaction

inhalation Remove to fresh air

Avoid direct contact with skin. Use barrier to give mouth-to-mouth resuscitation

Seek immediate medical attention/advice

If breathing is irregular or stopped, administer artificial respiration

Artificial respiration and/or oxygen may be necessary

Call a physician

Move to fresh air in case of accidental inhalation of vapors

If symptoms persist, call a physician

IF INHALED: Remove victim to fresh air and keep at rest in a position comfortable for breathing

IF INHALED: Call a POISON CENTER or doctor if you feel unwell

Skin contact Immediate medical attention is required

Wash off immediately with soap and plenty of water while removing all contaminated clothes and

shoes

Wash contaminated clothing before reuse

Wash off immediately with soap and plenty of water

If skin irritation persists, call a physician

Get medical attention if irritation develops and persists

Eye Contact Immediately flush with plenty of water. After initial flushing, remove any contact lenses and

continue flushing for at least 15 minutes Keep eye wide open while rinsing

Call a physician immediately

Rinse immediately with plenty of water, also under the eyelids, for at least 15 minutes

If symptoms persist, call a physician

If eye irritation persists: Get medical advice/attention

INGESTION Do NOT induce vomiting

Clean mouth with water and drink afterwards plenty of water Never give anything by mouth to an unconscious person Call a physician or poison control center immediately

Call a physician

Potential for aspiration if swallowed

Get medical attention Clean mouth with water

Self-protection of the first aider

Use personal protection recommended in Section 8 Avoid

contact with skin, eyes or clothing

Note to physicians May cause sensitization of susceptible persons Treat

symptomatically

SECTION 5: Fire fighting measures

Suitable extinguishing media CO2, dry chemical, dry sand, alcohol-resistant foam, mist of alkali salts water

Move containers from fire area if you can do it without risk

Use extinguishing measures that are appropriate to local circumstances and the surrounding

environment

Remove combustible materials from their surroundings immediately

Specific hazards arising from the

chemical

In the event of fire and/or explosion do not breathe fumes May cause sensitization by inhalation and skin contact

Thermal decomposition can lead to release of irritating and toxic gases and vapors

The product causes irritation of eyes, skin and mucous membranes

Special protective equipment for fire-

fighters

Wear self contained breathing apparatus for fire fighting if necessary

Use personal protective equipment as required

In the event of fire and/or explosion do not breathe fumes

Special protective equipment for fire-fighters

Flammable properties May re-ignite after fire is extinguished Flammable/combustible

material

Unsuitable extinguishing media Do not use a solid water stream as it may scatter and spread fire

Special Extinguishing Media Cool container with water spray

SECTION 6: Accidental release measures

Environmental Precautions Prevent further leakage or spillage if safe to do so

Prevent product from entering drains

Do not flush into surface water or sanitary sewer system See Section 12 for additional Ecological Information

Dispose of contents/container to an approved waste disposal plant

Avoid release to the environment

Collect spillage

Methods for cleaning up Cover liquid spill with sand, earth or other non-combustible absorbent material

Cover powder spill with plastic sheet or tarp to minimize spreading

Sweep up and shovel into suitable containers for disposal

Soak up with inert absorbent material

Dam up

Pick up and transfer to properly labeled containers

Use only non-sparking tools

Personal precautions Use personal protective equipment as required

Keep people away from and upwind of spill/leak

Evacuate personnel to safe areas

Stay upwind

ELIMINATE all ignition sources (no smoking, flares, sparks or flames in immediate area)

Avoid contact with skin, eyes and inhalation of vapors

In the case of vapor formation use a respirator with filter model

In case of fire: Stop leak if safe to do so

Do not touch damaged containers or spilled material unless wearing appropriate protective

clothing

Ensure adequate ventilation, especially in confined areas Take precautionary measures against static discharges

OTHER INFORMATION

Ventilate the area

Methods for Containment

Prevent further leakage or spillage if safe to do so

Cover powder spill with plastic sheet or tarp to minimize spreading

Dike far ahead of liquid spill for later disposal

SECTION 7: Handling and storage

Advice on safe handling Avoid contact with skin, eyes or clothing

Wash contaminated clothing before reuse

Do not eat, drink or smoke when using this product Use personal protection recommended in Section 8 Do not breathe dust/fume/gas/mist/vapors/spray

Use with local exhaust ventilation

Take precautionary measures against static discharges

Use only in well-ventilated areas

Ingestion may cause gastrointestinal irritation, nausea, vomiting and diarrhea

Wash hands thoroughly and gargle after handling

Burn or dispose of the wiping cloths used to clean up the product at once

General hygiene considerations When using do not eat, drink or smoke

Regular cleaning of equipment, work area and clothing is recommended

Avoid contact with skin, eyes or clothing Wash hands thoroughly after handling

Keep away from food, drink and animal feeding stuffs

Storage Conditions Keep containers tightly closed in a dry, cool and well-ventilated place

Keep out of the reach of children Keep in properly labeled containers

Keep away from heat, sparks, flame and other sources of ignition (i.e., pilot lights, electric motors

and static electricity)

Use spark-proof tools and explosion-proof equipment

Incompatible with oxidizing agents

The product shall be stored in the original containers/vessels

Polymerization is caused by ultra violet rays or heat. Store in a cool, dark and well-ventilated place.

Containers/vessels should be tightly closed

SECTION 8: Exposure controls/personal protection

Exposure Limits No information available

Engineering controls

Ensure adequate ventilation, especially in confined areas

Showers Eyewash stations Ventilation systems

Personal protective equipment (PPE)

Respiratory protection In case of insufficient ventilation, wear suitable respiratory equipment

Respirator cartridge should be exchanged at regular intervals or at proper time according to

breakthrough time

Hand protection Wear protective gloves

Eye/face Protection Tight sealing safety goggles

Face protection shield

Wear safety glasses with side shields (or goggles)

Skin and Body Protection

Gloves made of plastic or rubber Wear suitable protective clothing

Suitable protective clothing

Apron

Protective shoes or boots

SECTION 9: Physical and chemical properties

Physical state Liquid color Colored

ODR characteristic odor

odor threshold no data available

• Flash point measuring method **Values Property** Remarks

Not applicable рΗ

Melting point/freezing point no data available

Boiling point/boiling range no data available No information available

Flash Point Seta Closed Cup > 94°C

no data available

Evaporation Rate no data available No information available

Combustibility explosive

limits

Explosive upper limit no data available

Explosive lower limit no data available

vapor pressure no data available No information available Vapor density no data available No information available

Specific gravity solubility(ies) 1.00-1.10

Water solubility Immiscible in water

Organic Solvent Solubility soluble in organic solvents

Partition coefficient no data available No information available no data available No information available **Autoignition temperature** decomposition temperature no data available No information available

| Chemical name | Boiling point °C | density | Vapor pressure | Vapor density | Flash Point | Autoignition temperature |
|---|-----------------------|--------------------------|-------------------------|---------------|-------------------|--------------------------|
| 2-Propenoic acid, phenylmethyl ester | 228 °C 1013.25 hPa | 1.0573 g/cm3 at 20 °C | - | - | - | - |
| 1,6-Hexanediol diacrylate | - | - | 0.0005 mmHg at 21 °C | - | 132 °C closed cup | - |

SECTION 10: Stability and reactivity

stability Stable under normal conditions

Explosion data

Sensitivity to Mechanical Impact May be ignited by heat, sparks or flames **Sensitivity to Static Discharge** May be ignited by heat, sparks or flames

Possibility of hazardous reactions None under normal processing

Conditions to Avoid

Take precautionary measures against static discharges

Extremes of temperature and direct sunlight Heat

Incompatible Materials Heat

Strong acids OXIDIZERS

alkali Light peroxides radical initiators

Hazardous decomposition products May emit toxic fumes under fire conditions hazardous

polymerization None under normal processing

stability Stable under normal conditions

Polymerization can occur

Heating may cause an explosion

SECTION 11: Toxicological information

Repeated or prolonged contact may cause allergic reactions in very susceptible persons

May cause sensitization by skin contact

May cause sensitization by inhalation and skin contact

Acute Toxicity

InhalationReference to other sections; 4Eye ContactReference to other sections; 4Skin contactReference to other sections; 4INGESTIONReference to other sections; 4

skin corrosion/irritationNo information available

Serious eye damage/eye irritation No information available

Sensitization No information available

Germ Cell Mutagenicity

No information available

No information available

Reproductive Toxicity

No information available

STOT - single exposure

No information available

STOT - repeated exposure No information available

Aspiration Hazard No information available

Numerical measures of toxicity

16.9% of the mixture consists of ingredient(s) of unknown toxicity

The following values are calculated based on chapter 3.1 of the GHS document

ATEmix (oral) 1,769.00

| Chomical name | Oral LDEO | dormal LDEO | Inhalation LC50 | Classification | lanar CHS |
|--|-----------|-------------|-----------------|--|---|
| Chemical name | Oral LD50 | dermal LD50 | innalation LCSU | Classification according to Regulation (EC) No. 1272/2008 [CLP] ANNEX VI Table3.1 / Other | Japan GHS Classification |
| 2-Propenoic acid, phenylmethyl ester | - | | - | Skin Irrit. 2 (H315) Eye Irrit. 2A (H319) Skin Sens. 1 (H317) | Skin Irrit. 2 Eye Irrit. 2A Skin Sens. 1 |
| 2-Propenoic acid, 1,7,7-trimethylbicyclo[2.2.1]hept-2-yl ester, exo- | - | 1 | - | Skin Irrit. 2 (H315) Eye Irrit. 2 (H319) Skin Sens. 1B (H317) STOT SE 3 (H335) Aquatic Acute 1 (H400) Aquatic Chronic 1 (H410) | • |
| Morpholine, 4-(1-oxo-2- propenyl)- | - | - | - | Acute Tox. 4 (H302) Eye Dam. 1 (H318) Skin Sens. 1 (H317) STOT RE 2 (H373) | - |
| 2H-Azepin-2-one, 1-ethenylhexahydro- | - | - | - | Acute Tox. 4 (H302) Eye Irrit. 2 (H319) Skin Sens. 1B (H317) STOT RE 1 (H372) | Acute Tox. Oral 4 Eye Irrit. 2 Skin Sens. 1B STOT RE 1 |
| Diphenyl-2,4,6-trimethylbe nzoyl phosphine oxide | - | - | - | Repr. 2 (H361f) Repr. 2 (H361) | - |
| 2-Propenoic acid, 2-phenoxyethyl ester | - | - | - | Skin Sens. 1 (H317) Aquatic Chronic 2 (H411) | Skin Sens. 1 Aquatic Chronic 2 |
| 1,6-Hexanediol diacrylate | - | - | - | Skin Irrit. 2 (H315) Eye Irrit. 2 (H319) Skin Sens. 1 (H317) Aquatic Acute 1 (H400) Aquatic Chronic 1 (H410) | Aquatic Chronic 1 Aquatic Acute 1 Skin Sens. 1 |
| Poly[oxy(methyl-1,2-ethan ediyl)], .alpha.,.alpha.',.alp ha.''-1,2,3-propanetriyltris[. omega[(1-oxo-2-propenyl)oxy]- | - | - | - | Eye Irrit. 2A (H319) Skin Sens. 1 (H317) | Eye Irrit. 2A Skin Sens. 1 |

Eye

GHS/CLP Classification Note:

Acute Tox. Der. : Acute toxicity - Dermal, Acute Tox. Inh. (D/M): Acute toxicity - Inhalation - Dusts and Mists, Acute Tox. Inh.

(Gas): Acute toxicity - Inhalation - Gases, Acute Tox. Inh. (Vap) :Acute toxicity - Inhalation - Vapours, Acute Tox. Oral :Acute toxicity -

Aquatic Acute :Acute Hazardous to the aquatic environment, Aquatic Chronic :Chronic Hazardous to the aquatic environment. Asp. Tox. : Aspiration hazard, Carc. : Carcinogenicity, Expl. :Explosives, Eye Dam. :Serious eye damage,

Irrit. :Eye irritation, Flam. Gas :Flammable gases (including chemically unstable gases), Flam. Liq. :Flammable liquids,Flam.

Solid :Flammable solids, Lact. :Effects on or via lactation, Met. Corr. : Corrosive to metals, Muta. :Germ cell mutagenicity, Org.

Perox. :Organic peroxides, Ox. Gas: Oxidizing gases, Ox. Liq. :Oxidizing liquids, Ox. Sol. :Oxidizing solids, Press.

Gas: Gases under pressure, Pyr. Liq.: Pyrophoric liquids, Pyr. Sol.: Pyrophoric solids, Repr.: Reproductive toxicity, Resp. Sens.: Respiratory sensitization, Self-heat.: Self-heating substances and mixtures, Self-react.: Self-reactive substances and mixtures, Skin Corr.: Skin corrosion, Skin Irrit. :Skin irritation, Skin Sens. :Skin sensitization, STOT RE :Specific target organ toxicity - Repeated exposure, STOT SE :Specific target organ toxicity - Single exposure, Water-react. :Substances and mixtures which, in contact with water emit flammable gases

SECTION 12: Ecological information

ecotoxicity

80.3% of the mixture consists of components(s) of unknown hazards to the aquatic environment

Persistence and degradability No information available

Bioaccumulation No information available

Mobility No information available

Other adverse effects No information available

SECTION 13: Disposal considerations

Should not be released into the environment. Disposal should be in accordance with applicable

Waste from Residues / Unused Products regional, national and local laws and regulations.

Contaminated packaging Improper disposal or reuse of this container may be dangerous and illegal.

OTHER INFORMATION Store in a tightly sealed drum to prevent the spillage of the content

SECTION 14: Transport information

Containers/vessels must be leakage-free. Loading must be done to prevent containers from falling,

dropping down and being damaged Take necessary steps to prevent collapse

Use opaque containers/vessels for storage and transport

UN number UN3082 Ш Packing group **ERG Code**

Proper shipping name Environmentally hazardous substance, liquid, n.o.s.

IMDG UN

number UN3082

Proper shipping name Environmentally hazardous substance, liquid, n.o.s.

Hazard Class Ш **Packing group**

EmS-No F-A, S-F

IATA UN number UN3082

Proper shipping name Environmentally hazardous substance, liquid, n.o.s.

Hazard Class Packing group Ш **ERG Code** 9L

SECTION 15: Regulatory information

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

Prevention and Control of Occupational Diseases Not applicable

Regulations on Safe Management of Hazardous chemicals Not applicable

Regulation on the Administration of Precursor Chemicals Not applicable

Harmonized Commodity Description and Coding System

The Law of the People's Republic of China on Import and Not applicable Export

Commodity Inspection

Regulations for Environmental Management on the Import

Export of Toxic Chemicals

Not applicable and

Road transport management regulations for dangerous Not applicable goods

SECTION 16: Other information

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 $\textbf{Key literature references and sources for}_{LOLI\ Database\ (ChemADVISOR,\ Inc.)}$

data

Disclaimer

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End of Safety Data Sheet