

**Safety Data Sheet**  
**According to Hazard Communication Standard (29 CFR 1910.1200)**

Ball pen ink Black

Issue date: 01/19/2015

Version 1.0

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## 1. Product and Company Identification

**Material name** Ball pen ink Black  
**CAS #** See section 3  
**Product code** -  
**Product use** Not available.  
**Manufacturer/Supplier**  
**Supplier(Manufacturer):** USG046  
**Address:** -  
**Contact person(E-mail):**  
**Telephone:**  
**Fax:**

**Emergency telephone Number:** Not classified

## 2. Hazards identification

**GHS classification** Acute toxicity- Oral  
skin corrosion/irritation  
**Physical hazards** skin sensitisation  
**Health hazards** serious eye damage/eye irritation Category 4  
Category 2  
Category1  
Category1  
specific target organ toxicity after single exposure Category 3  
**Environmental hazards** hazardous to the aquatic environment- CHRONIC Category 1

### GHS label elements

#### Hazard Pictograms



#### Signal word

Danger

#### Hazard statement

Harmful if swallowed  
Causes skin irritation  
May cause an allergic skin reaction  
Causes serious eye damage  
May cause respiratory irritation  
Very toxic to aquatic life with long lasting effects

### Precautionary statement

#### Prevention

Avoid breathing dust/fume/gas/mist/vapours/spray.  
Wash hands thoroughly after handling.  
Do not eat, drink or smoke when using this product.  
Use only outdoors or in a well-ventilated area.

<b>Response</b>	<p>Contaminated work clothing should not be allowed out of the workplace.          Avoid release to the environment.          Wear protective gloves/protective clothing/eye protection/face protection.          IF SWALLOWED: Call a POISON CENTER or doctor/physician if you feel unwell.          IF ON SKIN: Wash with plenty of soap and water.          IF INHALED: Remove victim to fresh air and keep at rest in a position comfortable for breathing.          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.          Call a POISON CENTER or doctor/physician if you feel unwell.          Rinse mouth.          If skin irritation occurs: Get medical advice/attention.          If skin irritation or rash occurs: Get medical advice/attention.          Take off contaminated clothing and wash before reuse.          Wash contaminated clothing before reuse.          Collect spillage.</p>
<b>Storage</b>	<p>Store in a well-ventilated place. Keep container tightly closed.          Store locked up.</p>
<b>Disposal</b>	<p>Dispose of contents/container in according with local regulation.</p>

### 3. Composition / Information on Ingredients

Components	CAS#	Percent
Solvent black 46	65113-55-5	30%
Benzyl alcohol	100-51-6	25%
2-Phenoxy Ethanol	122-99-6	20%
Keton resin	25054-06-2	14%
Epoxy resin	24969-06-0	6%
Triethanolamine	102-71-6	4%
Phosphoric acid ester	90506-69-7	1%

### 4. First Aid Measures

#### First aid procedures

<b>Eye contact</b>	Immediately wash affected eyes for at least 15 minutes under running water with eyelids held open, consult an eye specialist.
<b>Skin contact</b>	Wash thoroughly with soap and water.
<b>Inhalation</b>	If difficulties occur after vapour/aerosol has been inhaled, remove to fresh air and seek medical attention. If not breathing, give artificial respiration; if by mouth to mouth use rescuer protection (pocket mask, etc). If breathing is difficult, oxygen should be administered by qualified personnel.
<b>Ingestion</b>	Rinse mouth immediately and then drink plenty of water, seek medical attention. Do not induce vomiting unless directed to do so by medical personnel.
<b>Notes to physician</b>	Treat symptoms.

### 5. Fire Fighting Measure

<b>Flammable properties</b>	This product is non-flammable.
<b>Extinguishing media</b>	
<b>Suitable extinguishing media</b>	Water, dry extinguishing media, carbon dioxide, alcohol resistant foams.
<b>Unsuitable extinguishing media</b>	Direct water stream.
<b>Firefighting equipment/instructions</b>	In the event of fire, wear self-contained breathing apparatus.
<b>Hazardous combustion products</b>	None Special hazards caused by the substance.

## 6. Accidental Release Measures

<b>Personal precautions</b>	Ensure good ventilation/exhaustion at the workplace.
<b>Environmental precautions</b>	Contain contaminated water/firefighting water. Do not discharge into drains/surface waters/groundwater.
<b>Methods for cleaning up</b>	For large amounts: Pump off product. For residues: Pick up with suitable absorbent material (e.g. sand, silica gel, acid binder, universal binder, sawdust). Dispose of absorbed material in accordance with regulations.

## 7. Handling and Storage

<b>Handling</b>	Prevent contact with air/oxygen (formation of peroxide). General Handling: Do not swallow. Avoid contact with eyes, skin, and clothing. Wash thoroughly after handling. Keep container closed. Use with adequate ventilation.
<b>Storage</b>	Store in cool place. Keep container tightly closed in a dry and well-ventilated place. Containers which are opened must be carefully resealed and kept upright to prevent leakage.

## 8. Exposure Controls / Personal Protection

### OCCUPATIONAL EXPOSURE LIMITS (OEL)

#### INGREDIENT DATA

Source	Ingredient	Material name	TWA	STEL	Peak	Notes
US ACGIH Threshold Limit Values (TLV)	Triethanolamine	Triethanolamine	5 mg/m3	Not Available	Not Available	TLV® Basis: Eye & skin irr; BEIA

#### EMERGENCY LIMITS

Ingredient	Material name	TEEL-1	TEEL-2	TEEL-3
Benzyl alcohol	Benzyl alcohol	30 ppm	49 ppm	49 ppm
2-Phenoxy Ethanol	Phenoxyethanol, 2-; (Phenyl cellosolve)	20 ppm	20 ppm	44 ppm
triethanolamine	Triethanolamine; (Trihydroxytriethylamine)	15 mg/m3	51 mg/m3	1100 mg/m3

Ingredient	Original IDLH	Revised IDLH
Solvent black 46	Not Available	Not Available
Benzyl alcohol	Not Available	Not Available
2-Phenoxy Ethanol	Not Available	Not Available
Keton resin	Not Available	Not Available
Epoxy resin	Not Available	Not Available
Triethanolamine	Not Available	Not Available
Phosphoric acid ester	Not Available	Not Available

## Personal protective equipment

<b>Eye / face protection</b>	Safety glasses with side shields. Chemical goggles.
<b>Skin protection</b>	Wear chemical protective gloves, e.g. PVC.
<b>Respiratory protection</b>	Wear appropriate protective mask.
<b>General hygiene considerations</b>	Wash hands, forearms and face thoroughly after handling chemical products, before eating, smoking and using the lavatory and at the end of the working period.

## 9. Physical & Chemical Properties

### Appearance

<b>Physical state</b>	Liquid
<b>Form</b>	Liquid
<b>Color</b>	Black
<b>Odor</b>	Not available
<b>Odor threshold</b>	Not available
<b>pH</b>	Not available
<b>Vapor pressure</b>	0.014 hPa( 20 °C) ( CAS#122-99-6)
<b>Vapor density</b>	Not available
<b>Boiling point</b>	244.3 °C ( CAS#122-99-6)
<b>Melting point/Freezing point</b>	11.8 °C ( CAS#122-99-6)
<b>Solubility (water)</b>	24.2 g/L( 20.7 °C pH=5.5) ( CAS#122-99-6)
<b>Specific gravity</b>	Not available
<b>Relative density</b>	1.11( 20 °C) ( CAS#122-99-6)
<b>Density</b>	Not available
<b>Flash point</b>	126 °C ( CAS#122-99-6)
<b>Flammability limits in air, upper, %by volume</b>	Not available
<b>Flammability limits in air, lower, % by volume</b>	Not available
<b>Auto-ignition temperature</b>	475 °C ( CAS#122-99-6)
<b>VOC</b>	Not available
<b>Percent volatile</b>	Not available
<b>Other data</b>	
<b>Viscosity</b>	19 mPa s (dynamic)(40.5 °C) ( CAS#122-99-6)
<b>Partition coefficient(log Pow)</b>	1.2 (23 °C) ( CAS#122-99-6)
<b>Decomposition temperature</b>	> 350 °C( CAS#122-99-6)
<b>Surface tension</b>	70.7 mN/m( CAS#122-99-6)

## 10. Chemical Stability & Reactivity Information

<b>Chemical stability</b>	Material is stable under normal conditions.
<b>Conditions to avoid</b>	Incompatible materials.
<b>Incompatible materials</b>	Strong acids. Strong bases. Strong oxidizers.
<b>Hazardous decomposition products</b>	Not available.
<b>Possibility of hazardous reactions</b>	No dangerous reactions known.

## 11. Toxicological Information

**Toxicokinetics, metabolism and distribution:**

**Non-human toxicological data:** Not available

**Information on toxicological effects:****Acute toxicity:**

2-Phenoxy Ethanol (CAS#122-99-6)

**LD50(Oral, Rat):** 1850 mg/kg bw

**LD50(Dermal, Rabbit):** Not available

**LC50(Inhalation, Rat):** > 1000 mg/m<sup>3</sup> air

Benzyl alcohol (CAS#100-51-6)

**LD50(Oral, Rat):** 1620 mg/kg bw

**LD50(Dermal, Rabbit):** Not available

**LC50(Inhalation, Rat):** > 4178 mg/m<sup>3</sup> air 4h

Solvent black46 (CAS#65113-55-5)

**LD50(Oral, Rat):** > 2000 mg/kg bw

**LD50(Dermal, Rabbit):** > 2000 mg/kg bw

**LC50(Inhalation, Rat):** Not available

**Skin corrosion/Irritation:** Causes skin irritation.

**Serious eye damage/irritation:** Causes serious eye damage.

**Respiratory or skin sensitization:** May cause an allergic skin reaction.

**Germ cell mutagenicity:** Not classified

**Carcinogenicity:** Not classified

**Reproductive toxicity:** Not classified

**STOT- single exposure:** May cause respiratory irritation.

**STOT-repeated exposure:** Not classified

**Aspiration hazard:** Not classified

**12. Ecological Information****Toxicity:**

2-Phenoxy Ethanol (CAS#122-99-6)

Acute toxicity		Time	Species	Method	Evaluation	Remarks
LC50	344 mg/L	96h	Fish	OECD 203	N/A	N/A
EC50	> 500 mg/L	48h	Daphnia	OECD 202	N/A	N/A
EC50	> 500 mg/L	72h	Algae	OECD 201	N/A	N/A

Benzyl alcohol (CAS#100-51-6)

Acute toxicity		Time	Species	Method	Evaluation	Remarks
LC50	460 mg/L	96h	Fish	OECD 203	N/A	N/A
EC50	230 mg/L	48h	Daphnia	OECD 202	N/A	N/A
EC50	770 mg/L	72h	Algae	OECD 201	N/A	N/A

Solvent black46 (CAS#65113-55-5)

Acute toxicity		Time	Species	Method	Evaluation	Remarks
LC50	N/A	96h	Fish	OECD 203	N/A	N/A
EC50	0.011 mg/L	48h	Daphnia	OECD 202	N/A	N/A
EC50	0.0034 mg/L	72h	Algae	OECD 201	N/A	N/A

**Persistence and degradability:** Not available.

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**Bioaccumulative potential:** Not available.  
**Mobility in soil:** Not available.  
**Results of PBT&vPvB assessment:** Not available.  
**Other adverse effects:** Very toxic to aquatic life with long lasting effects.

### 13. Disposal Considerations

**Disposal instructions** Dispose of contents/container in accordance with local/regional/national/international regulations.  
**Contaminated packaging** Since emptied containers may retain product residue, follow label warnings even after container is emptied.

### 14. Transport Information

#### DOT

**Basic shipping requirements:**

**UN number** 3082  
**Proper shipping name** ENVIRONMENTALLY HAZARDOUS SUBSTANCE, LIQUID, N.O.S(Solvent black46)  
**Hazard class** 9  
**Packing group** III  
**Environmental hazards** Yes

#### IATA

**UN number** 3082  
**UN proper shipping name** ENVIRONMENTALLY HAZARDOUS SUBSTANCE, LIQUID, N.O.S(Solvent black46)  
**Transport hazard class(es)** 9  
**Packing group** III

#### IMDG

**UN number** 3082  
**UN proper shipping name** ENVIRONMENTALLY HAZARDOUS SUBSTANCE, LIQUID, N.O.S(Solvent black46)  
**Transport hazard class(es)** 9  
**Packing group** III  
**Environmental hazards** Yes

### 15. Regulatory Information

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

Solvent black 46 (65113-55-5) is found on the following regulatory lists	"US Toxic Substances Control Act (TSCA) - Chemical Substance Inventory"
Benzyl alcohol(100-51-6) is found on the following regulatory lists	"US Toxic Substances Control Act (TSCA) - Chemical Substance Inventory"
2-Phenoxy Ethanol(122-99-6) is found on the following regulatory lists	"US Toxic Substances Control Act (TSCA) - Chemical Substance Inventory"
Keton resin (25054-06-2) is found on the following regulatory lists	"US Toxic Substances Control Act (TSCA) - Chemical Substance Inventory"
Epoxy resin(24969-06-0) is found on the following regulatory lists	"US Toxic Substances Control Act (TSCA) - Chemical Substance Inventory"
Triethanolamine (102-71-6) is found on	"US ACGIH Threshold Limit Values (TLV)",

the following regulatory lists	"US Toxic Substances Control Act (TSCA) - Chemical Substance Inventory"
Phosphoric acid ester(90506-69-7) is found on the following regulatory lists	"Not Applicable"

## 16. Other Information

### HMIS® ratings

Health: 2  
 Flammability: 1  
 Physical hazard: 0

### NFPA ratings

Health: 2  
 Flammability: 1  
 Instability: 0

### Disclaimer

The information in the sheet was written based on the best knowledge and experience currently available.

### Issue date

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