SAFETY DATA SHEET

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

Product identifier

Product name: Reducer #2

Product No.: EAN 975786. 23117-00, P231170I, P231170J, P231170D, P231170C, P231170A, P231170B, P231170F, P231170E, P231170G, P231170K

Synonyms, Trade Names: 23117-00

Additional identification

Chemical name: bis(2-ethylhexyl) terephthalate
CAS-No.: 6422-86-2

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

Identified uses: Ink Reducer
Uses advised against: None known.

Details of the supplier of the safety data sheet

Manufacturer / Supplier

One Stroke Inks
458 Roberts Ave
Louisville, KY 40214
502-366-1070

Emergency telephone number:

For after hours emergency health, safety, and environmental information, call CHEMTREC at 800-424-9300.

SECTION 2: Hazards identification

Hazard classification: The product has not been classified as hazardous according to the legislation in force.

OSHA Specified Hazards: not applicable

Hazard(s) not otherwise classified (HNOC): None known.

SECTION 3: Composition/information on ingredients

Substances / Mixtures

General information:

Chemical name	Concentration	Additional identification	Notes
bis(2-ethylhexyl) terephthalate	>98%	CAS-No.: 6422-86-2	
2-ethylhexyl methyl terephthalate	<2%	CAS-No.: 63468-13-3 (impurity)	

* All concentrations are percent by weight unless ingredient is a gas. Gas concentrations are in percent by volume.
# This substance has workplace exposure limit(s).

SECTION 4: First aid measures

Description of first aid measures

Inhalation: Move to fresh air. Treat symptomatically. Get medical attention if symptoms persist.

Eye contact: Any material that contacts the eye should be washed out immediately with water. If easy to do, remove contact lenses. Get medical attention if symptoms persist.

Skin contact: Wash with soap and water. Get medical attention if symptoms occur.

Ingestion: Seek medical advice.

Most important symptoms and effects, both acute and delayed: No known chronic or acute health risks.

Indication of any immediate medical attention and special treatment needed

Hazards: None known.

Treatment: Treat symptomatically.

SECTION 5: Firefighting measures

General fire hazards: None known.

Extinguishing media

Suitable extinguishing media: Water spray. Dry chemical. Foam. Carbon Dioxide.

Unsuitable extinguishing media: None known.

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

Advice for firefighters

Special fire fighting procedures: None known.

Special protective equipment for fire-fighters: Self-contained breathing apparatus and full protective clothing must be worn in case of fire.

SECTION 6: Accidental release measures

Personal precautions, protective equipment and emergency procedures: Wear appropriate personal protective equipment.

Environmental precautions: Avoid release to the environment.

Methods and material for containment and cleaning up: Absorb spill with vermiculite or other inert material, then place in a container for chemical waste.

Notification Procedures: In the event of a spill or accidental release, notify relevant authorities in accordance with all applicable regulations.

SECTION 7: Handling and storage:

Precautions for safe handling: No special precautions are necessary beyond normal good hygiene practices. See Section 8 of the MSDS for additional personal protection advice when handling this product.

Conditions for safe storage, including any incompatibilities: Keep container closed.

Specific end use(s): Plasticizer Additive

SECTION 8: Exposure controls/personal protection

Control parameters

Occupational exposure limits

Country specific exposure limits have not been established or are not applicable unless listed below.

Exposure controls

Appropriate engineering controls: Good general ventilation (typically 10 air changes per hour) should be used. Ventilation rates should be matched to conditions. Supplementary local exhaust ventilation, closed systems, or respiratory and eye protection may be needed in special circumstances; such as poorly ventilated spaces, heating, evaporation of liquids from large surfaces, spraying of mists, mechanical generation of dusts, drying of solids, etc.

Individual protection measures, such as personal protective equipment

General information: Eye bath. Washing facilities.

Eye/face protection: It is a good industrial hygiene practice to minimize eye contact.

Skin protection

Hand protection: It is a good industrial hygiene practice to minimize skin contact.

Other: No data available.

Respiratory Protection:	If engineering controls do not maintain airborne concentrations below recommended exposure limits (where applicable) or to an acceptable level (in countries where exposure limits have not been established), an approved respirator must be worn. In the United States of America, if respirators are used, a program should be instituted to assure compliance with OSHA Standard 63 FR 1152, January 8, 1998. Respirator type: Air-purifying respirator with an appropriate, government approved (where applicable), air-purifying filter, cartridge or canister. Contact health and safety professional or manufacturer for specific information.
Hygiene measures:	Observe good industrial hygiene practices.
Environmental Controls:	No data available.

SECTION 9: Physical and chemical properties

Information on basic physical and chemical properties

Appearance	
Physical State:	Liquid
Form:	Liquid
Color:	Colorless
Odor:	Mild
Odor Threshold:	No data available.
pH:	No data available.
Freezing Point:	< -67.2 °C
Boiling Point:	375 °C
Flash Point:	212 °C (Setaflash Closed Cup)
Evaporation Rate:	Not determined.
Flammability (solid, gas):	Not applicable
Flammability Limit - Upper (%)–:	No data available.
Flammability Limit - Lower (%)–:	No data available.
Vapor pressure:	< 0.001 Pa (25 °C)
Vapor density (air=1):	13.47
Specific Gravity:	0.9831 (20 °C)
Solubility(ies)	
Solubility in Water:	< 0.00001 g/l (25 °C)
Solubility (other):	No data available.
Partition coefficient (n-octanol/water):	log Pow: 8.39
Autoignition Temperature:	387 °C (ASTM E659)
Decomposition Temperature:	Thermal stability not tested. Low stability hazard expected at normal operating temperatures.
Dynamic Viscosity:	No data available.
Kinematic viscosity:	66.9 mm2/s (25 °C)
Explosive properties:	Not classified
Oxidizing properties:	Not classified

SECTION 10: Stability and reactivity

Reactivity: None known.

Chemical stability: Stable

Possibility of hazardous reactions: None known.

Conditions to avoid: None at ambient temperatures.

Incompatible materials: Strong oxidizing agents.

Hazardous decomposition products: Carbon Monoxide. Carbon Dioxide.

SECTION 11: Toxicological information

Information on likely routes of exposure

Inhalation: None known.

Ingestion: None known.

Skin contact: None known.

Eye contact: None known.

Information on toxicological effects

Acute Toxicity

Oral

Product: Oral LD-50: (Rat): > 5,000 mg/kg (highest dose tested)

Dermal

Product: Dermal LD-50: (Guinea Pig): >20 ml/kg
(highest dose tested)

Inhalation

Product: LCLo (Rat, 6 h): > 0.0718 mg/l (highest concentration tested)

Repeated dose toxicity

Product: NOEL (Rat, in feed, 90 d): 277 mg/kg

Skin corrosion/irritation:

Product: (Rabbit, 24 h): none
(Human, 24 h): none

Serious eye damage/eye irritation:

Product: (Rabbit): slight

Respiratory or skin sensitization:

Product: Skin Sensitization:, (Guinea Pig) - non-sensitizing
Skin Sensitization:, (Human) - non-sensitizing

Mutagenicity

In vitro

Product:	Mutagenicity - Bacterial, : negative +/- activation Chromosomal aberration, : negative +/- activation Mutagenicity - Mammalian, : negative +/- activation

In vivo

Product:	No data available.
Specified substance(s)	
bis(2-ethylhexyl) terephthalate	No data available.
2-ethylhexyl methyl terephthalate	No data available.

Carcinogenicity

Product:	Not classified

Reproductive toxicity

Product:	Not classified

Specific target organ toxicity - single exposure

Product:	No data available.
Specified substance(s)	
bis(2-ethylhexyl) terephthalate	Not classified
2-ethylhexyl methyl terephthalate	No data available.

Specific target organ toxicity - repeated exposure

Product:	No data available.
Specified substance(s)	
bis(2-ethylhexyl) terephthalate	No data available.
2-ethylhexyl methyl terephthalate	No data available.

Aspiration hazard

Product:	No data available.
Specified substance(s)	
bis(2-ethylhexyl) terephthalate	No data available.
2-ethylhexyl methyl terephthalate	No data available.

Other adverse effects:	No data available.

SECTION 12: Ecological information

Toxicity

Acute toxicity

Fish

Product:	NOEC: (Fish, 7 d): >= 0.25 mg/l (limit of solubility in fresh water) LC-50 (Fathead Minnow, 96 h): > 984 mg/l

Aquatic invertebrates

Product: NOEC: (daphnid, 48 h): >= 0.0014 mg/l (limit of solubility in fresh water)

Chronic Toxicity

Fish

Product: NOEC: (Rainbow Trout, 60 d): >= 0.28 mg/l (limit of solubility in fresh water)

Aquatic invertebrates

Product: NOEC: (daphnid, 21 d): >= 0.00076 mg/l (limit of solubility in fresh water)

Toxicity to Aquatic Plants

Product: NOEC: (Alga, 72 h): >= 0.86 mg/l (limit of solubility in fresh water)

Persistence and degradability

Biodegradation

Product: 73.05 % (28 d, Ready Biodegradability: CO2 Evolution Test) Readily biodegradable

Biological Oxygen Demand:

Product No data available.

Specified substance(s)

bis(2-ethylhexyl) terephthalate	No data available.
2-ethylhexyl methyl terephthalate	No data available.

Chemical Oxygen Demand:

Product No data available.

Specified substance(s)

bis(2-ethylhexyl) terephthalate	No data available.
2-ethylhexyl methyl terephthalate	No data available.

BOD/COD ratio

Product No data available.

Specified substance(s)

bis(2-ethylhexyl) terephthalate	No data available.
2-ethylhexyl methyl terephthalate	No data available.

Bioaccumulative potential

Product: Eastern Oyster, Bioconcentration factor (BCF): 393 (Measured)

Mobility in soil: No data available.

Known or predicted distribution to environmental compartments

bis(2-ethylhexyl) terephthalate	5.07 - 6.6 (QSAR model)
2-ethylhexyl methyl terephthalate	No data available.

Results of PBT and vPvB assessment: Not fulfilling PBT (persistent/bioaccumulative/toxic) criteria

Other adverse effects: No data available.

SECTION 13: Disposal considerations

Waste treatment methods

General information: No data available.

Disposal methods: Dispose of waste and residues in accordance with local authority requirements. Incinerate.

SECTION 14: Transport information

Important Note: Shipping descriptions may vary based on mode of transport, quantities, package size, and/or origin and destination. Consult your company's Hazardous Materials/Dangerous Goods expert for information specific to your situation.

DOT

Class not regulated

IMDG - International Maritime Dangerous Goods Code

Class not regulated

IATA

Class not regulated

SECTION 15: Regulatory information

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

This product has been classified in accordance with hazard criteria of the Controlled Products Regulations and the MSDS contains all the information required by the Controlled Products Regulations.
WHMIS (Canada) Status: noncontrolled
US EPCRA (SARA Title III) Section 313 - Toxic Chemical List
NONE

OSHA: nonhazardous

TSCA (US Toxic Substances Control Act): This product is listed on the TSCA inventory. Any impurities present in this product are exempt from listing.

DSL (Canadian Domestic Substances List) and CEPA (Canadian Environmental Protection Act): This product is listed on the DSL. Any impurities present in this product are exempt from listing.

AICS / NICNAS (Australian Inventory of Chemical Substances and National Industrial Chemicals Notification and Assessment Scheme): This product is listed on AICS or otherwise complies with NICNAS.

MITI (Japanese Handbook of Existing and New Chemical Substances): This product is listed in the Handbook or has been approved in Japan by new substance notification.

ECL (Korean Toxic Substances Control Act): This product is listed on the Korean inventory or otherwise complies with the Korean Toxic Substances Control Act.

Philippines Inventory (PICCS) : This product is listed on the Philippine Inventory or otherwise complies with PICCS.

Inventory of Existing Chemical Substances in China: All components of this product are listed on the Inventory of Existing Chemical Substances in China (IECSC).

SECTION 16: Other information

HMIS® Hazard Ratings: Health - 1, Flammability - 1, Chemical Reactivity - 0

HMIS® rating involves data interpretations that may vary from company to company. They are intended only for rapid, general identification of the magnitude of the specific hazard. To deal adequately with the safe handling of this material, all the information contained in this MSDS must be considered.

Revision Information:	New SDS
Key literature references and sources for data:	No data available.
Training information:	No data available.

Regulation (EC) No. 1272/2008

Issue date:	02/27/2014
SDS No.:	
Disclaimer:	This information is provided without warranty. The information is believed to be correct. This information should be used to make an independent determination of the methods to safeguard workers and the environment.