SAFETY DATA SHEET

1. Identification

Product identifier: HP ElectroInk Gray 023
Q4002A

Other means of identification: Not available.

Recommended use: For use with HP Indigo Press series 1000&2000

Recommended restrictions: None known.

Company identification: HP Inc.
1501 Page Mill Road
Palo Alto, CA 94304-1112
United States
Telephone 650-857-5020

HP Inc. health effects line
(Toll-free within the US) 1-800-457-4209
(Direct) 1-760-710-0048
HP Inc. Customer Care Line
(Toll-free within the US) 1-800-474-6836
(Direct) 1-208-323-2551
Email: hpcustomer.inquiries@hp.com

2. Hazard(s) identification

Physical hazards: Not classified.

Health hazards: Not classified.

Environmental hazards: Not classified.

OSHA defined hazards: Not classified.

Label elements

Hazard symbol: None.

Signal word: None.

Hazard statement: The mixture does not meet the criteria for classification.

Precautionary statement

Prevention: Not available.

Response: Not available.

Storage: Not available.

Disposal: Not available.

Hazard(s) not otherwise classified (HNOC)

Carbon black in this preparation, due to its bound form, does not present this carcinogenic risk.

None of the other ingredients in this preparation are classified as carcinogens according to ACGIH, EU, IARC, MAK, NTP or OSHA.

Supplemental information

This product is not classified as hazardous according to OSHA CFR 1910.1200 (HazCom 2012).

3. Composition/information on ingredients

Mixtures

<table>
<thead>
<tr>
<th>Chemical name</th>
<th>Common name and synonyms</th>
<th>CAS number</th>
<th>%</th>
</tr>
</thead>
<tbody>
<tr>
<td>Petroleum hydrocarbon</td>
<td></td>
<td>90622-58-5</td>
<td>&lt;80</td>
</tr>
<tr>
<td>Carbon black</td>
<td></td>
<td>1333-86-4</td>
<td>&lt;1</td>
</tr>
<tr>
<td>C.I.P.Y. 13 No.21100</td>
<td></td>
<td>5102-83-0</td>
<td>&lt;0.1</td>
</tr>
</tbody>
</table>

Composition comments:

Carbon black is present only in a bound form in this preparation.

This product has been evaluated using criteria specified in 29 CFR 1910.1200 (Hazard Communication Standard).
4. First-aid measures

**Inhalation**
If overcome by vapor, remove person from exposure to fresh air. If breathing is difficult, give oxygen. If symptoms persist, get medical attention.

**Skin contact**
Wash affected areas thoroughly with mild soap and water. Get medical attention if irritation develops or persists.

**Eye contact**
Do not rub eyes. Immediately flush with large amounts of clean, warm water (low pressure) for at least 15 minutes or until particles are removed. If irritation persists get medical attention. Do not apply neutralizing agents.

**Ingestion**
Do not induce vomiting. Never give anything by mouth to an unconscious person. If ingestion of a large amount does occur, seek medical attention.

**Most important symptoms/effects, acute and delayed**
Not available.

5. Fire-fighting measures

**Suitable extinguishing media**
Suitable extinguishing media: Dry chemical, CO2, water spray or regular foam.

**Unsuitable extinguishing media**
None known.

**Specific hazards arising from the chemical**
None known.

**Special protective equipment and precautions for firefighters**
Not available.

**Fire-fighting equipment/instructions**
Move containers from fire area if you can do it without risk. Evacuate area and fight fire from a safe distance.

6. Accidental release measures

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

**Methods and materials for containment and cleaning up**
Not available.

**Environmental precautions**
Do not let product enter drains. Do not flush into surface water or sanitary sewer system.

7. Handling and storage

**Precautions for safe handling**
Avoid prolonged or repeated skin contact with this material. Keep away from open flames, hot surfaces and sources of ignition. Take precautionary measures against static discharges.

**Conditions for safe storage, including any incompatibilities**
Keep away from excessive heat or cold. Store in a cool and shaded area. Do not store in direct sunlight.

8. Exposure controls/personal protection

**Occupational exposure limits**

<table>
<thead>
<tr>
<th><strong>US. OSHA Table Z-1 Limits for Air Contaminants (29 CFR 1910.1000)</strong></th>
<th><strong>Value</strong></th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Components</strong></td>
<td><strong>Type</strong></td>
</tr>
<tr>
<td>Carbon black (CAS 1333-86-4)</td>
<td>3.5 mg/m³</td>
</tr>
</tbody>
</table>

<p>| <strong>US. ACGIH Threshold Limit Values</strong> |</p>
<table>
<thead>
<tr>
<th><strong>Components</strong></th>
<th><strong>Type</strong></th>
<th><strong>Value</strong></th>
<th><strong>Form</strong></th>
</tr>
</thead>
<tbody>
<tr>
<td>Carbon black (CAS 1333-86-4)</td>
<td>TWA</td>
<td>3 mg/m³</td>
<td>Inhalable fraction.</td>
</tr>
</tbody>
</table>

<p>| <strong>US. NIOSH: Pocket Guide to Chemical Hazards</strong> |</p>
<table>
<thead>
<tr>
<th><strong>Components</strong></th>
<th><strong>Type</strong></th>
<th><strong>Value</strong></th>
</tr>
</thead>
<tbody>
<tr>
<td>Carbon black (CAS 1333-86-4)</td>
<td>TWA</td>
<td>0.1 mg/m³</td>
</tr>
</tbody>
</table>
**Biological limit values**  
No biological exposure limits noted for the ingredient(s).

**Exposure guidelines**  
Manufacturer recommended exposure limit based on petroleum hydrocarbon at > 72%. TWA = 171ppm (1200 mg/m3).

**Appropriate engineering controls**  
Use in a well ventilated area.

**Individual protection measures, such as personal protective equipment**

- **Eye/face protection**  
  Not available.

- **Skin protection**  
  Not available.

- **Hand protection**  
  Not available.

- **Other**  
  Not available.

- **Respiratory protection**  
  Not available.

- **Thermal hazards**  
  Not available.

**General hygiene considerations**  
Handle in accordance with good industrial hygiene and safety practice.

---

**9. Physical and chemical properties**

<table>
<thead>
<tr>
<th>Property</th>
<th>Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>Appearance</td>
<td>Paste</td>
</tr>
<tr>
<td>Physical state</td>
<td>Solid</td>
</tr>
<tr>
<td>Color</td>
<td>Grey</td>
</tr>
<tr>
<td>Odor</td>
<td>Mild hydrocarbon-like</td>
</tr>
<tr>
<td>Odor threshold</td>
<td>Not available.</td>
</tr>
<tr>
<td>pH</td>
<td>Not available.</td>
</tr>
<tr>
<td>Melting point/freezing point</td>
<td>Not available.</td>
</tr>
<tr>
<td>Initial boiling point and boiling range</td>
<td>Not available.</td>
</tr>
<tr>
<td>Flash point</td>
<td>Not available.</td>
</tr>
<tr>
<td>Evaporation rate</td>
<td>Not available.</td>
</tr>
<tr>
<td>Flammability (solid, gas)</td>
<td>Not available.</td>
</tr>
<tr>
<td>Upper/lower flammability or explosive limits</td>
<td>Not available.</td>
</tr>
<tr>
<td>Flammability limit - lower (%)</td>
<td>Not available.</td>
</tr>
<tr>
<td>Flammability limit - upper (%)</td>
<td>Not available.</td>
</tr>
<tr>
<td>Explosive limit - lower (%)</td>
<td>Not available.</td>
</tr>
<tr>
<td>Explosive limit - upper (%)</td>
<td>Not available.</td>
</tr>
<tr>
<td>Vapor pressure</td>
<td>Not available.</td>
</tr>
<tr>
<td>Solubility(ies)</td>
<td>Not soluble</td>
</tr>
<tr>
<td>Solubility (water)</td>
<td>Not soluble</td>
</tr>
<tr>
<td>Partition coefficient (n-octanol/water)</td>
<td>Not available.</td>
</tr>
<tr>
<td>Auto-ignition temperature</td>
<td>Not available.</td>
</tr>
<tr>
<td>Decomposition temperature</td>
<td>Not available.</td>
</tr>
<tr>
<td>Viscosity</td>
<td>Not available.</td>
</tr>
<tr>
<td>Other information</td>
<td></td>
</tr>
<tr>
<td>Specific gravity</td>
<td>0.81</td>
</tr>
<tr>
<td>VOC (Weight %)</td>
<td>622 g/L</td>
</tr>
</tbody>
</table>

**10. Stability and reactivity**

**Reactivity**  
Not available.
Chemical stability
Stable under recommended storage conditions.
Azodyes when processed to printing inks, paints and plastics, begin to decompose at 390°F (200°C) and 3, 3'-dichlorobenzidine can also be formed at /above 390°F (200°C). This product is not recommended for applications where this temperature is obtained/ exceeded.

Possibility of hazardous reactions
Will not occur.

Conditions to avoid
Not available.

Incompatible materials
This product may react with strong oxidizing agents.

Hazardous decomposition products
Upon decomposition, this product emits carbon monoxide, carbon dioxide and/or low molecular weight hydrocarbons.

11. Toxicological information
Symptoms related to the physical, chemical and toxicological characteristics
Not available.

Information on toxicological effects
Acute toxicity
Based on available data, the classification criteria are not met.

Skin corrosion/irritation
Not classified.

Serious eye damage/eye irritation
Not classified.

Respiratory or skin sensitization
Respiratory sensitization
Not classified.

Skin sensitization
Not classified.

Germ cell mutagenicity
Not classified.

Carcinogenicity
Carbon black is classified as a carcinogen by the IARC (possibly carcinogenic to humans, Group 2B) and by the State of California under Proposition 65. In their evaluations of carbon black, both organizations indicate that exposure to carbon black, per se, does not occur when it remains bound within a product matrix, specifically, rubber, ink, or paint. Carbon black is present only in a bound form in this preparation.

Reproductive toxicity
Not classified.

Specific target organ toxicity
- single exposure
Not classified.

Specific target organ toxicity
- repeated exposure
Not classified.

Aspiration hazard
Not classified.

Further information
Complete toxicity data are not available for this specific formulation

Refer to Section 2 for potential health effects and Section 4 for first aid measures.

Components

<table>
<thead>
<tr>
<th>Species</th>
<th>Test Results</th>
</tr>
</thead>
<tbody>
<tr>
<td>C.I.P.Y. 13 No.21100 (CAS 5102-83-0)</td>
<td></td>
</tr>
</tbody>
</table>

  | Acute  |
  | Oral   |
  | LD50    | Rat    |
  | >= 5000 mg/kg |

Carbon black (CAS 1333-86-4)

  | Acute  |
  | Oral   |
  | LD50    | Rat    |
  | > 8000 mg/kg |

12. Ecological information
Aquatic toxicity
This product has not been tested for ecological effects.

Persistence and degradability
Not available.

Bioaccumulative potential
Not available.

Mobility in soil
Not available.

Other adverse effects
Not available.
13. Disposal considerations

Disposal instructions
Dispose of in compliance with federal, state, and local regulations.

14. Transport information

DOT
Not regulated as dangerous goods.

IATA
Not regulated as dangerous goods.

IMDG
Not regulated as dangerous goods.

ADR
Not regulated as dangerous goods.

Further information
Not a dangerous good under DOT, IATA, ADR, IMDG, or RID.

15. Regulatory information

US federal regulations
US EPA TSCA Inventory: All chemical substances in this product comply with all rules or orders under TSCA.

US TSCA 12(b): Does not contain listed chemicals.

TSCA Section 12(b) Export Notification (40 CFR 707, Subpt. D)
Not regulated.

CERCLA Hazardous Substance List (40 CFR 302.4)
Not listed.

SARA 304 Emergency release notification
Not regulated.

OSHA Specifically Regulated Substances (29 CFR 1910.1001-1050)
Not listed.

Superfund Amendments and Reauthorization Act of 1986 (SARA)

Hazard categories
Immediate Hazard - No
Delayed Hazard - No
Fire Hazard - No
Pressure Hazard - No
Reactivity Hazard - No

SARA 302 Extremely hazardous substance
Not listed.

SARA 311/312 Hazardous chemical
No

Other federal regulations
Safe Drinking Water Act (SDWA)
Not regulated.

US state regulations
US. Massachusetts RTK - Substance List
Not regulated.

US. New Jersey Worker and Community Right-to-Know Act
Not listed.

US. Pennsylvania Worker and Community Right-to-Know Law
Not listed.

US. Rhode Island RTK
Not regulated.

US. California Proposition 65
Not Listed.
Regulatory information

All chemical substances in this HP product have been notified or are exempt from notification under chemical substances notification laws in the following countries: US (TSCA), EU (EINECS/ELINCS), Switzerland, Canada (DSL/NDSL), Australia, Japan, Philippines, South Korea, New Zealand, and China.

16. Other information, including date of preparation or last revision

Issue date: 06-Jun-2014
Revision date: 11-May-2016
Version #: 06

Disclaimer

This Safety Data Sheet document is provided without charge to customers of HP. Data is the most current known to HP at the time of preparation of this document and is believed to be accurate. It should not be construed as guaranteeing specific properties of the products as described or suitability for a particular application. This document was prepared to the requirements of the jurisdiction specified in Section 1 above and may not meet regulatory requirements in other countries.

Manufacturer information

HP Indigo BV
Startbaan 16
1187 XR Amstelveen
The Netherlands
(Direct) 1-503-494-7199
(Toll-free within the US) 1-800-457-4209

Explanation of abbreviations

ACGIH: American Conference of Governmental Industrial Hygienists
CAS: Chemical Abstracts Service
CERCLA: Comprehensive Environmental Response Compensation and Liability Act
CFR: Code of Federal Regulations
COC: Cleveland Open Cup
DOT: Department of Transportation
EPCRA: Emergency Planning and Community Right-to-Know Act (aka SARA)
IARC: International Agency for Research on Cancer
NIOSH: National Institute for Occupational Safety and Health
NTP: National Toxicology Program
OSHA: Occupational Safety and Health Administration
PEL: Permissible Exposure Limit
RCRA: Resource Conservation and Recovery Act
REC: Recommended
REL: Recommended Exposure Limit
SARA: Superfund Amendments and Reauthorization Act of 1986
STEL: Short-Term Exposure Limit
TCLP: Toxicity Characteristics Leaching Procedure
TLV: Threshold Limit Value
TSCA: Toxic Substances Control Act
VOC: Volatile Organic Compounds