

## SAFETY DATA SHEET

According to Regulation (EC) No. 1907/2006 (REACH), 1272/2008 (CLP) and (EU) No.453/2010 (amending REACH)

# Black toner for monochrome lasers cartridges

## Chapter 1. IDENTIFICATION OF THE SUBSTANCE/MIXTURE/ AND OF THE COMPANY/UNDERTAKING

#### 1.1 PRODUCT IDENTIFIER

Product name: PELIKAN - Laser - Lexmark X264/X363/X364 High Yield

Part number: X264-HY-PEL

#### 1.2 IDENTIFIED USES OF THE SUBSTANCE/MIXTURE AND USES ADVISED AGAINST

For use in: This substance/mixture is a toner used in electro-photographic printers and copiers.

#### 1.3 SUPPLIER OF THE SAFETY DATA SHEET DETAILS

Supplier: PRP Solutions GmbH Address: Büttnerstr. 15

30165 Hannover

Germany

Phone number: +49 (0)511 515 462 87

Fax:

E-mail: info@prp-eu.com

Contact Hours: Mo-Th: 8:00AM – 4:30PM CET

Fr: 8:00AM - 2:00PM CET

#### 1.4 EMERGENCY TELEPHONE NUMBERS

Supplier: Germany only: 0800 - 777 43 57 Emergency Hours: Mo-Th: 8:00AM - 4:30PM CET

Fr: 8:00AM - 2:00PM CET

Emergency Telephone +49 (0)511 515 462 87

Number:

## **Chapter 2. HAZARDS IDENTIFICATION**

#### 2.1 CLASSIFICATION OF THE SUBSTANCE OR MIXTURE

According to Regulation (EC) No 1272/2008 CLP/GHS system- Not classified as hazardous

## 2.2 LABEL ELEMENTS

Hazard Pictograms:

Labeling according to CLP/GHS system:

NO PICTOGRAM

Signal Word: N/A
Hazard Statement: N/A
Precauntionary statement: N/A
Prevention: N/A

Applicable Label Elements in accordance with Part 2 of Annex II to Regulation (EC) No 1272/2008: EUH 210 - Safety sheet available on request

### 2.3 OTHER HAZARDS

Information on whether the substance or mixture meets the criteria for PBT or vPvB in accordance with Annex XIII to

Regulation (EC) No 1907/2006: No

Dust Explosion: This mixture, like most organic powders, can cause a dust explosion if particles form thick

clouds.

Irritation of respiratory tract: Slight irritation of respiratory tract may occur with exposure to large amount of toner dust

Page: 1/9

<sup>\*</sup> This document provides safety-related information about toner contained in print cartridge for use in laser printer



# **SAFETY DATA SHEET**

According to Regulation (EC) No. 1907/2006 (REACH), 1272/2008 (CLP) and (EU) No.453/2010 (amending REACH)

# Black toner for monochrome lasers cartridges

Skin Irritation: Minimal skin irritation may occur
Eye Irritation: May cause transient slight irritation

## **Chapter 3. COMPOSITION/INFORMATION ON INGREDIENTS**

#### 3.1 SUBSTANCE or MIXTURE: Mixture

Substances in the mixture:

| Substance name            | CAS No.      | EC No. | Weights (%) | REACH<br>(pre/registration)<br>Number | Index<br>number | Classification according to CLP<br>Regulation (EC) No 1272/2008                          |
|---------------------------|--------------|--------|-------------|---------------------------------------|-----------------|------------------------------------------------------------------------------------------|
| Carbon black              | 1333-86-4    |        | 2-8%        | 05-2114136296-<br>49-0000             |                 | Not classified                                                                           |
| Magnetite                 | 1317-61-9    |        | 7-15%       | 05-2114142805-<br>50-0000             |                 | Not classified                                                                           |
| Polypropylene wax         | Confidential |        | 1-4%        |                                       |                 | Not classified                                                                           |
| Saturated polyester resin | Confidential |        | 70-90%      |                                       |                 | Not classified                                                                           |
| Silica, treated           | Confidential |        | 1-4%        |                                       |                 | Not classified                                                                           |
| Zinc(II) complex salt     | 42405-40-3   |        | 0.25-1.5%   |                                       |                 | Flam. Sol 1, H228, Acute Tox.4,<br>H302, Aquatic Acute1, H400,<br>Aquatic Chronic1, H410 |

See SECTION 16 for full text of Classification Symbols, R/S-Phrases, and Hazard Statements
Substances in Annex XIV to Regulation (EC) No 1907/2006 (Authorization) or the Candidate List of SVHC: None
Substances in Annex XVII to Regulation (EC) No 1907/2006 (Restriction): None

#### Note:

All substances with CAS numbers not listed in the SDSs of our products are not classified as hazardous by the regulation (EC) No 1272/2008 (CLP) or included in the candidate list of SVHC

All substances where the registration limits for importation are achieved have been subjected to the mentioned registration by the importing company or an only representative to Europe.

## **Chapter 4. FIRST AID MEASURES**

## 4.1.1 FIRST AID INSTRUCTIONS BY RELEVANT ROUTES OF EXPOSURE

Inhalation: Remove to fresh air. If effects occur, seek medical advice.

Eye contact: Do not rub eyes. Flush eyes immediately with plenty of water for at least 15 minutes. Skin contact: Flush with plenty of water. Use soap. If irritation develops, seek medical advice.

Ingestion: Clean mouth out with plenty of water. Drink several glasses of water. If sickness develops, seek

medical advice.

## 4.1.2 ADDITIONAL FIRST AID INFORMATION

Additional first aid information: N/A

#### 4.2 SYMPTOMS AND EFFECTS ACUTE AND DELAYED

Acute Symptoms from Exposure: Exposure to excessive amounts of dust may cause physical irritation to respiratory tract.

Delayed Symptoms from Exposure: Prolonged inhalation of excessive amounts of dust may damage lung.

## 4.3 IMMEDIATE SPECIAL TREATMENT OR EQUIPMENT REQUIRED

Immediate Medical Attention Required: Immediate medical attention may be required in an unlikely event of extreme inhalation, eye contact or unusual reaction due to physical idiosyncrasy of the person.

Page: 2/9



## SAFETY DATA SHEET

According to Regulation (EC) No. 1907/2006 (REACH), 1272/2008 (CLP) and (EU) No.453/2010 (amending REACH)

# Black toner for monochrome lasers cartridges

#### **Chapter 5. FIRE-FIGHTING MEASURES**

### 5.1 EXTINGUISHING MEDIA

Recommended Extinguishing Media: Water, dry chemical, carbon dioxide or foam type extinguishers.

Extinguishing Media Not to be Used: None known.

### 5.2 SPECIAL HAZARDS arising from the substance/mixture

Dust explosion: This mixture, like most organic material in powder form, is capable of creating a dust

explosion when in very high quantities (much above a toner crtg), pulverized and in

the presence of an ignition.

Hazardous Combustion: Carbon monoxide and carbon dioxide

## 5.3 ADVICE FOR FIRE FIGHTERS

Firefighters should wear protective equipment such as gloves, glasses, boots and respiratory mask as needed. Do not breathe fumes. Keep containers cool with water spray if exposed to fire.

## **Chapter 6. ACCIDENTAL RELEASE MEASURES**

#### 6.1 PERSONAL PRECAUTIONS, PROTECTIVE EQUIPMENT AND EMERGENCY PROCEDURES

#### **6.1.1 PRECAUTIONS FOR NON-EMERGENCY PERSONNEL**

Minimize the release of particulates. Do not use a vacuum cleaner unless motor is rated dust tight.

## **6.1.2 ADDITIONAL FIRST AID INFORMATION**

Avoid breathing dust.

Remove ignition sources.

#### **6.1.3 PERSONAL PROTECTION**

Wear personal protective equipment as described in Section 8.

### **6.2 ENVIRONMENTAL PRECAUTIONS**

Regulatory Information: Keep product out of sewers and watercourses.

## 6.3 METHODS AND MATERIAL FOR CONTAINMENT AND CLEANUP

Spill or Leak Cleanup Procedures: After lightly spraying with water to prevent development of dust, spill should be swept up

or wiped up. Then residuals can be removed with soap and cold water. If it is not possible to scrub the floor with water, cover the floor with suitable sheets of paper. These used sheets should be wrapped up in spills and transferred to a suitable container for disposal. Garments may be washed or dry cleaned, after removal of loose toner, always without

the presence of heat to avoid permanent stains.

Page: 3/9



# **SAFETY DATA SHEET**

According to Regulation (EC) No. 1907/2006 (REACH), 1272/2008 (CLP) and (EU) No.453/2010 (amending REACH)

# Black toner for monochrome lasers cartridges

#### **Chapter 7. HANDLING AND STORAGE**

#### 7.1 PRECAUTIONS FOR SAFE HANDLING

Keep out of reach of children.

Keep away from ignition sources. Avoid dust formation. Handle in adequately ventilated areas. Do not breathe dust. Do not get in eyes or on skin. Wear personal protective equipment as recommended in Section 8. Keep away from excessive heat and sources of ignition such as sparks and open flames. Ensure all the equipment is electrically earthed / grounded before beginning operation. Do not handle with strong oxidizers, which may vigorously oxidize organic materials in this mixture and cause a fire in an extreme case. Avoid spills. Do not release to drains. Do not eat, drink or smoke when handling this product. Wash hands after handling this product. Remove contaminated clothing and protective equipment before entering eating areas.

#### 7.2 CONDITIONS FOR SAFE STORAGE

Keep out of reach of children.

Keep container closed and store in well-ventilated dry place at room temperature.

Avoid high temperatures, >100°F/32°C

Do not store with strong oxidizers.

Avoid packaging materials with plasticizer, which may soften this product if directly contacted.

#### 7.3 SPECIFIC END USES

Electrophotographic printers and copiers

## **Chapter 8. EXPOSURE CONTROLS/PERSONAL PROTECTION**

## 8.1 CONTROL PARAMETERS

Occupational exposure limit values

| Substance name | CAS No.   | Limit value - Eight hours |       | Limit value - Short term |       | Biological limit values |
|----------------|-----------|---------------------------|-------|--------------------------|-------|-------------------------|
|                |           | ppm                       | mg/m³ | ppm                      | mg/m³ |                         |
| Carbon black   | 1333-86-4 |                           | 3.5   |                          | 7     |                         |

### 8.2 EXPOSURE CONTROLS

Appropriate Engineering Controls: Good general ventilation should be sufficient under normal conditions of use.

### Individual Protection Measures, such as Personal Protective Equipment:

Respiratory protection:

IMPROPER USE OF RESPIRATORS IS DANGEROUS. Seek professional advice prior to respirator selection and use. Follow OSHA respirator regulations (29 CFR 1910.134 and 1910.137) and, if necessary, wear a NIOSH approved respirator. Select respirator based on its suitability to provide adequate worker protection for given work conditions, levels of airborne contamination, and sufficient levels of oxygen.

#### Eve/Face Protection:

Contact lenses are not eye protective devices. Appropriate eye protection must be worn instead of, or in conjunction with contact lenses. Protective goggles or safety glasses are recommended.

#### Hand/Skin Protection:

For emergency or non-routine operations (cleaning spills, reactor vessels, or storage tanks), wear an SCBA. WARNING! Air purifying respirators do not protect worker in oxygen deficient atmospheres.

Thermal Hazards:

None anticipated.

**Environmental Exposure Controls:** 

Page: 4/9



## SAFETY DATA SHEET

According to Regulation (EC) No. 1907/2006 (REACH), 1272/2008 (CLP) and (EU) No.453/2010 (amending REACH)

# Black toner for monochrome lasers cartridges

Avoid release to the environment.

Additional Protection:

N/A

Protective Clothing and Equipment:

Wear chemically protective gloves, boots, aprons, and gauntlets to prevent prolonged or repeated skin contact. Wear splash proof chemical goggles and face shield when working with liquid, unless full face piece respiratory protection is worn.

Safety Stations:

Make emergency eyewash stations, safety/quick-drench showers, and washing facilities available in work area.

Contaminated Equipment:

Separate contaminated work clothes from street clothes. Launder before reuse. Remove material from your shoes and clean personal protective equipment. Never take home contaminated clothing.

Comments

Never eat, drink or smoke in work areas. Practice good personal hygiene after using this material, especially before eating, drinking, smoking, using the restroom, or applying cosmetics.

## **Chapter 9. PHYSICAL AND CHEMICAL PROPERTIES**

### 9.1 DETAIL INFORMATION

Physical state: Black fine powder

Color: Black
Odor: Faint
Odor threshold: N/A
pH: N/A
Melting point/Freezing point: ~140°C

Flash point: N/A
Explosion limits: N/A
Relative density: 1.2-1.4
Auto-ignition temperature: N/A
Vapor pressure: N/A
Vapor Density: N/A
Specific weight: N/A

Solubility: Insoluble in water

Partition coefficient n-octanol / water: N/A

Decomposition temperature: >200°C

Viscosity: N/A

Oxidizing properties: N/A

## 9.2 OTHER INFORMATION

N/A

Page: 5/9



## SAFETY DATA SHEET

According to Regulation (EC) No. 1907/2006 (REACH), 1272/2008 (CLP) and (EU) No.453/2010 (amending REACH)

# Black toner for monochrome lasers cartridges

## **Chapter 10. CHEMICAL STABILITY AND REACTIVITY**

10.1 Reactivity:

Reactivity Hazards: None
Data on Mixture Substances: None

**10.2 Chemical Stability:** The product is stable. Under normal conditions of storage and use, hazardous

polymerization will not occur.

**10.3 Hazardous Polymerization:** Stable under conditions of normal use.

**10.4 Conditions to Avoid:** Keep away from heat, flame, sparks and other ignition sources.

**10.5 Incompatible Materials:** Strong oxidizing materials

**10.6 Hazardous Decomposition:** Will not occur.

# **Chapter 11. INFORMATION ON TOXICOLOGICAL EFFECT**

Mixtures: According to our test results of this or similar mixture and the information provided by the

suppliers about the substances contained in this mixture, seriously damaging effect is not expected when this mixture is treated in accordance with standard industrial practices and legal requirements. Refer to Section 2 for potential health effects and Section 4 for first aid

measures.

**Acute Toxicity:** 

Ingestion: LD50: oral-rat > 2500mg/kg Inhalation: LC50: inh-rat > 5.19mg/L/4 h

Skin / Corrosivity: N/A

Irritation / Corrosivity:

Skin Corrosion/Irritation: Non irritant (Rabbit) Serious Eye Damage/Irritation: Non irritant (Rabbit)

Sensitization:

Skin Sensitization: Guinea pig-maximization; not a sensitizer: Not classified

Respiratory Sensitization: N/A

Carcinogenicity: Carbon black is reclassified as a group 2B by IARC, but inhalation tests using a typical toner

showed no association between toner and animal tumors.

Mutagenicity: Toner is AMES test (Salmonella typhimurium, Escherichia coli) negative (no mutagenic)

Toxic for Reproduction: N/A

STOT(Specific Target Organ Toxicity) - Single Exposure: No test data available

STOT(Specific Target Organ Toxicity) - Multiple Exposure: In normal conditions of use (in electro-photographic apparatus,)

maximum concentration of toner released is significantly lower than

1mg/m3, and will have no chronic effects to human health.

Additional toxicology information: None

Page: 6/9



## SAFETY DATA SHEET

According to Regulation (EC) No. 1907/2006 (REACH), 1272/2008 (CLP) and (EU) No.453/2010 (amending REACH)

# Black toner for monochrome lasers cartridges

## **Chapter 12. ECOLOGICAL INFORMATION**

**12.1 Eco toxicity:** As mixture (data from toner with similar composition).: Fish(Oryzias latipes): LC50(96hr)

> 100mg/L (WAF) Crustaceans(Daphnia magna): EC50(48hr) > 100mg/L (WAF)

Algae(Pseudokirchneriella subcapitata): ErL50(0-72h)>100 mg/L, NOELR=100mg/L (WAF)

-Not Classified according to criteria of Regulation (EC) No 1272/2008 [CLP]

12.2 Persistence and Degradability: No data available.
12.3 Bioaccumulation Potential: No data available.
12.4 Mobility in Soil: Partially soluble in water.

12.5 PBT & vPvB Assessment: No result that indicates this product meet(s) the PBT or vPvB criteria under Regulation

(EC) No 1907/2006.

**12.6 Other Adverse Effects:** No data available

## **Chapter 13. DISPOSAL CONSIDERATIONS**

#### Disposal Information:

This product is not regarded as hazardous waste as defined by EU directive 91/689/EEC Dispose as a solid waste in accordance with local authority regulations.

Empty container retains product residue.

## Physical/Chemical Properties that affect Treatment:

Symbol: This product is not classified as dangerous

Risk Phrases: This product is not classified according to the EU regulations.

#### Waste Treatment Information:

Do not shred toner cartridge, unless dust-explosion prevention measures are taken. Finely dispersed particles may form explosive mixtures in air. Dispose of in compliance with federal, state, and local regulations

## **Chapter 14. TRANSPORT INFORMATION**

The product is not covered by international regulation on the transport of dangerous goods (IMDG, IATA, ADR/RID).:

14.1UN Number:N/A14.2UN Shipping Name:N/A14.3Hazard Class:N/A14.4Packing Group:N/A14.5Environmental Hazards:N/A

14.6 User Precautions: Handling such as exposure to water, rolling, falling or giving shock to the container may result

in breakage of the inner bag and result in scattering of the mixture. Avoid direct sunlight and

hot places

14.7 Bulk Transport: N/A

Page: 7/9



## SAFETY DATA SHEET

According to Regulation (EC) No. 1907/2006 (REACH), 1272/2008 (CLP) and (EU) No.453/2010 (amending REACH)

# Black toner for monochrome lasers cartridges

#### **Chapter 15. REGULATORY INFORMATION**

#### 15.1 REGULATORY INFORMATION RELATING TO ENVIRONMENT, HEALTH AND SAFETY

This Safety Data Sheet was prepared in accordance with:

EU Regulatory Information: Regulation (EC) No 1907/2006 REACH Regulation, (EC) 1272/2008 / EC, Regulation

(EC) No 1999/45 / EC and Regulation (EC) No 67/548 / EEC, Regulation 648/2004 /

EC.

- Substances as a candidate in the list (Art. 59 REACH): No

Authorization: NoCategory Seveso: No

EPA Regulatory Information: N/A

CERCLA Reportable Quantity: None

Superfund Information: Hazard Categories:

Immediate:NoneDelayed:NoneFire:NonePressure:NoneReactivity:None

Section 302 - Extremely Hazardous: Not listed

Section 311 - Hazardous: Not listed

## 15.2 CHEMICAL SAFETY ASSESSMENT

Since there are ingredients listed in chaper 3.2 as very toxic to aquatic life, a representing toner sample has been tested for toxicity to aquatic life as a mixture. See SECTION 12 for details.

## **Chapter 16. OTHER INFORMATION**

Sections containing revisions and/or new statements:

Newly issued in accordance with Regulations (EC) No 1907/2006 (REACH), 1272/2008 (CLP) and (EU) No 453/2010 (amending REACH).

## **General Comments:**

This information is based on our current knowledge. It should not therefore be construed as guarantee in specific properties of the products as described or their suitability for a particular application

Literature reference: N/A

Safety Phrases: None
Precautionary Statements: None

Hazard Statements: H228 Flammable solid, H302 Harmful if swallowed, H400 Very toxic to aquatic life, H410 Very

toxic to aquatic life with long lasting effects

Worker Training: N/A

Page: 8/9



## **SAFETY DATA SHEET**

According to Regulation (EC) No. 1907/2006 (REACH), 1272/2008 (CLP) and (EU) No.453/2010 (amending REACH)

# Black toner for monochrome lasers cartridges

## Key to Abbreviations and Acronyms used in this sheet:

| ACGIH = American Conference of Governmental Industrial Hygienists               | N/A = Not Applicable / Not Available                          |  |  |  |
|---------------------------------------------------------------------------------|---------------------------------------------------------------|--|--|--|
| CERCLA = Comprehensive Environmental Response<br>Compensation and Liability Act | NFPA = National Fire Protection Association                   |  |  |  |
| CLP = Classification, Labeling, and Packaging                                   | NIOSH = National Institute for Occupational Safety and Health |  |  |  |
| DSD = Dangerous Substances Directive                                            | OSHA = Occupational Health and Safety Administration          |  |  |  |
| EC = European Community                                                         | PEL = Permissible Exposure Limit                              |  |  |  |
| ECHA = European Chemicals Agency                                                | SCBA = Self Contained Breathing Apparatus                     |  |  |  |
| EPA = Environmental Protection Agency                                           | STOT = Specific Target Organ Toxicity                         |  |  |  |
| EU = Europe or European                                                         | TLV = Threshold Limit Value                                   |  |  |  |
| GHS = Globally Harmonized System                                                | UK = United Kingdom                                           |  |  |  |
|                                                                                 | UN = United Nations                                           |  |  |  |

## DISCLAIMER

All trademarks and models referenced are property of their respective holders and are used for identification purposes only.

These products are not sponsored by, affiliated with, manufactured by or distributed by the named manufacturers.

This information relates only to the specific material designated and may not be valid for such material used in combination with any other materials or in any process. Such information is, to the best of the company's knowledge and belief, accurate and reliable as of the date indicated. However, no warranty guarantee or representation is made to its accuracy, reliability or completeness. It is the user's responsibility to satisfy himself as to the suitability of such information for his own particular use.

Page: 9/9