



# SAFETY DATA SHEET

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

### 1.1. Product identifier

Trade name or designation of the mixture	HP Z9M05A Black Developer
Registration number	-
Synonyms	None.
Issue date	24-Jan-2018
Version number	02
Revision date	03-Aug-2018
Supersedes date	24-Jan-2018

### 1.2. Relevant identified uses of the substance or mixture and uses advised against

Identified uses	This product is a black developer preparation that is used in HP LaserJet Managed MFP E72525, HP LaserJet Managed MFP E72530, HP LaserJet Managed MFP E72535 series multifunction products.
Uses advised against	None known.

### 1.3. Details of the supplier of the safety data sheet

Telephone	HP Deutschland GmbH Schickardstrasse 32 71034 Böblingen Germany 07031 140
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### 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

1.4 Emergency telephone number	+49 (0) 89 1 92 40
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## SECTION 2: Hazards identification

### 2.1. Classification of the substance or mixture

#### Classification according to Regulation (EC) No 1272/2008 as amended

This mixture does not meet the criteria for classification according to Regulation (EC) 1272/2008 as amended.

### 2.2. Label elements

#### Label according to Regulation (EC) No. 1272/2008 as amended

Contains:	Carbon black, Ferrite, Paraffin wax, Silica, Styrene-Acrylic Resin
Hazard pictograms	None.
Signal word	None.
Hazard statements	The mixture does not meet the criteria for classification.

#### Precautionary statements

Prevention	Not available.
Response	Not available.
Storage	Not available.
Disposal	Not available.

Supplemental label information	None.
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### 2.3. Other hazards

Carbon black is classified by the IARC as a Group 2B carcinogen (the substance is possibly carcinogenic to humans). 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. This preparation contains no component classified as Persistent, Bioaccumulative, and Toxic (PBT) or very Persistent and very Bioaccumulative (vPvB) as defined under Regulation (EC) 1907/2006.

## SECTION 3: Composition/information on ingredients

### 3.2. Mixtures

#### General information

Chemical name	%	CAS-No. / EC No.	REACH Registration No.	Index No.	Notes
Ferrite	<95	Trade Secret	-	-	
<b>Classification:</b>	-	-	-	-	
Styrene-Acrylic Resin	<10	Trade Secret	-	-	
<b>Classification:</b>	-	-	-	-	
Carbon black	<2	1333-86-4 215-609-9	01-2119384822-32-XXXX	-	
<b>Classification:</b>	-	-	-	-	
Paraffin wax	<2	Trade Secret	-	-	
<b>Classification:</b>	-	-	-	-	
Silica	<1	Trade Secret 231-545-4	01-2119379499-16-xxxx	-	
<b>Classification:</b>	-	-	-	-	

## SECTION 4: First aid measures

General information Not available.

### 4.1. Description of first aid measures

<b>Inhalation</b>	Move person to fresh air immediately. If irritation persists, consult a physician.
<b>Skin contact</b>	Wash affected areas thoroughly with mild soap and water. Get medical attention if irritation develops or persists.
<b>Eye contact</b>	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, consult a physician.
<b>Ingestion</b>	Rinse mouth with water. Drink one to two glasses of water. If symptoms occur, consult a physician.

**4.2. Most important symptoms and effects, both acute and delayed** Difficulty in breathing. Coughing.

**4.3. Indication of any immediate medical attention and special treatment needed** Not available.

## SECTION 5: Firefighting measures

General fire hazards Not available.

### 5.1. Extinguishing media

<b>Suitable extinguishing media</b>	Dry chemical, CO <sub>2</sub> , water spray or regular foam.
<b>Unsuitable extinguishing media</b>	None known.

**5.2. Special hazards arising from the substance or mixture** Like most organic material in powder form, toner can form explosive dust-air mixtures when finely dispersed in air.

### 5.3. Advice for firefighters

<b>Special protective equipment for firefighters</b>	Wear self-contained breathing apparatus and protective clothing. Wear full set of protective equipment including chemical goggles and gloves.
<b>Special fire fighting procedures</b>	If fire occurs in the printer, treat as an electrical fire.

Specific methods None established.

## SECTION 6: Accidental release measures

### 6.1. Personal precautions, protective equipment and emergency procedures

**For non-emergency personnel** Avoid inhalation of dust. Wash thoroughly after dealing with a spillage. See Section 8 of the SDS for Personal Protective Equipment. Ensure adequate ventilation.

**For emergency responders** Not available.

**6.2. Environmental precautions** Avoid spreading dust or contaminated materials. Avoid discharge into drains, water courses or onto the ground.

**6.3. Methods and material for containment and cleaning up** Slowly vacuum or sweep the material into a bag or other sealed container. Clean remainder with a damp cloth or vacuum cleaner. If a vacuum is used, the motor must be rated as dust explosion-proof. Fine powder can form explosive dust-air mixtures. Dispose of in compliance with federal, state, and local regulations.

**6.4. Reference to other sections** See Section 8 of the SDS for Personal Protective Equipment. See also section 13 Disposal considerations.

## SECTION 7: Handling and storage

**7.1. Precautions for safe handling** Avoid inhalation of dust and contact with skin and eyes. Use with adequate ventilation. Keep away from excessive heat, sparks, and open flames.

**7.2. Conditions for safe storage, including any incompatibilities** Keep out of the reach of children. Keep tightly closed and dry. Store at room temperature. Store away from strong oxidizers.

**7.3. Specific end use(s)** Not available.

## SECTION 8: Exposure controls/personal protection

### 8.1. Control parameters

#### Occupational exposure limits

**Germany. DFG MAK List (advisory OELs). Commission for the Investigation of Health Hazards of Chemical Compounds in the Work Area (DFG)**

Components	Type	Value	Form
Silica	TWA	4 mg/m <sup>3</sup>	Inhalable fraction.

**Germany. TRGS 900, Limit Values in the Ambient Air at the Workplace**

Components	Type	Value	Form
Silica	AGW	4 mg/m <sup>3</sup>	Inhalable fraction.

**Biological limit values** No biological exposure limits noted for the ingredient(s).

**Recommended monitoring procedures** Not available.

#### Derived no effect levels (DNELs)

Components	Type	Route	Value	Form
Carbon black (CAS 1333-86-4)	Consumers	Inhalation	1.75 mg/m <sup>3</sup>	Local long term
		Inhalation	0.06 mg/m <sup>3</sup>	Systemic long term
	Workers	Inhalation	2 mg/m <sup>3</sup>	Local long term
		Inhalation	1 mg/m <sup>3</sup>	Systemic long term

#### Predicted no effect concentrations (PNECs)

Components	Type	Route	Value	Form
Carbon black (CAS 1333-86-4)	Not applicable	Freshwater	5 mg/l	
		Marine water	5 mg/l	

### 8.2. Exposure controls

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

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

**General information** No personal respiratory protective equipment required under normal conditions of use.

**Eye/face protection** Wear safety glasses with side shields (or goggles).

#### Skin protection

**- Hand protection** Rubber gloves are recommended. Wash hands after handling.

**- Other** Protection suit must be worn.

**Respiratory protection** No personal respiratory protective equipment required under normal conditions of use.

**Thermal hazards** Not available.

<b>Hygiene measures</b>	Keep away from food, drink and animal feeding stuffs. Wash hands before breaks and immediately after handling the product.
<b>Environmental exposure controls</b>	Do not allow the spilled product to enter public drainage system or open water courses.

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## SECTION 9: Physical and chemical properties

### 9.1. Information on basic physical and chemical properties

<b>Appearance</b>	Fine powder
<b>Physical state</b>	Solid.
<b>Form</b>	solid
<b>Color</b>	Black.
<b>Odor</b>	Odorless
<b>Odor threshold</b>	No information available
<b>pH</b>	Not applicable
<b>Melting point/freezing point</b>	No information available
<b>Initial boiling point and boiling range</b>	Not applicable
<b>Flash point</b>	Not applicable
<b>Evaporation rate</b>	Not available.
<b>Flammability (solid, gas)</b>	Not available.
<b>Upper/lower flammability or explosive limits</b>	
<b>Flammability limit - lower (%)</b>	Not flammable
<b>Flammability limit - upper (%)</b>	Not available.
<b>Vapor pressure</b>	Not applicable
<b>Vapor density</b>	Not applicable
<b>Solubility(ies)</b>	
<b>Solubility (water)</b>	Not available.
<b>Partition coefficient (n-octanol/water)</b>	Not available.
<b>Auto-ignition temperature</b>	No data available
<b>Decomposition temperature</b>	> 392 °F (> 200 °C)
<b>Viscosity</b>	Not applicable
<b>Explosive properties</b>	Not available.
<b>Oxidizing properties</b>	No information available.
<b>9.2. Other information</b>	Not available.
<b>Specific gravity</b>	4.4 g/ml (20C, 68F)

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## SECTION 10: Stability and reactivity

<b>10.1. Reactivity</b>	Not available.
<b>10.2. Chemical stability</b>	Stable under normal storage conditions.
<b>10.3. Possibility of hazardous reactions</b>	Stable
<b>10.4. Conditions to avoid</b>	Heat, sparks, flames. Sunlight. Avoid dust close to ignition sources.
<b>10.5. Incompatible materials</b>	This product may react with strong oxidizing agents. This product may react with strong acids.
<b>10.6. Hazardous decomposition products</b>	Carbon monoxide and carbon dioxide. Hydrogen.

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## SECTION 11: Toxicological information

<b>General information</b>	Not available.
<b>Information on likely routes of exposure</b>	
<b>Inhalation</b>	Under normal conditions of intended use, this material is not expected to be an inhalation hazard.
<b>Skin contact</b>	Contact with skin may result in mild irritation.
<b>Eye contact</b>	Contact with eyes may result in mild irritation.
<b>Ingestion</b>	Ingestion is not a likely route of exposure.
<b>Symptoms</b>	Not available.

### 11.1. Information on toxicological effects

**Acute toxicity** Based on available data, the classification criteria are not met. LD50/oral/rat >5000 mg/kg

Components	Species	Test Results
Carbon black (CAS 1333-86-4)		
<b>Acute</b>		
<b>Oral</b>		
LD50	Rat	> 10000 mg/kg
<b>Skin corrosion/irritation</b>	Based on available data, the classification criteria are not met. Not a known irritant. (OECD 404)	
<b>Serious eye damage/eye irritation</b>	Based on available data, the classification criteria are not met. Not a known irritant. (OECD 405)	
<b>Respiratory sensitization</b>	Based on available data, the classification criteria are not met.	
<b>Skin sensitization</b>	Based on available data, the classification criteria are not met.	
<b>Germ cell mutagenicity</b>	Negative, does not indicate mutagenic potential (Ames Test: Salmonella typhimurium) Based on available data, the classification criteria are not met.	
<b>Carcinogenicity</b>	Based on available data, the classification criteria are not met.	

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.

#### IARC Monographs. Overall Evaluation of Carcinogenicity

Carbon black (CAS 1333-86-4)

2B Possibly carcinogenic to humans.

Silica (CAS Trade Secret)

3 Not classifiable as to carcinogenicity to humans.

<b>Reproductive toxicity</b>	Based on available data, the classification criteria are not met.
<b>Specific target organ toxicity - single exposure</b>	Based on available data, the classification criteria are not met.
<b>Specific target organ toxicity - repeated exposure</b>	Based on available data, the classification criteria are not met.
<b>Aspiration hazard</b>	Based on available data, the classification criteria are not met.
<b>Mixture versus substance information</b>	Not available.
<b>Other information</b>	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.  In a study in rats (H.Muhle) by chronic inhalation exposure to a typical toner, a mild to moderate degree of lung fibrosis was observed in 92% of the rats in the concentration(16mg/m3) exposure group, and a minimal to mild degree of fibrosis was noted in 22% of the animals in the middle (4mg/m3) exposure group. But no pulmonary changes was reported in the lowest (1mg/m3) exposure group, the most relevant level to potential human exposures.

## SECTION 12: Ecological information

<b>12.1. Toxicity</b>	Not available.
<b>12.2. Persistence and degradability</b>	Not available.
<b>12.3. Bioaccumulative potential</b>	Not available.
<b>Partition coefficient n-octanol/water (log Kow)</b>	Not available.
<b>Bioconcentration factor (BCF)</b>	Not available.
<b>12.4. Mobility in soil</b>	Not available.
<b>12.5. Results of PBT and vPvB assessment</b>	Not a PBT or vPvB substance or mixture.
<b>12.6. Other adverse effects</b>	Not available.

## SECTION 13: Disposal considerations

<b>13.1. Waste treatment methods</b>	
<b>Residual waste</b>	Not available.
<b>Contaminated packaging</b>	Not available.
<b>EU waste code</b>	Not available.

**Disposal methods/information** Dispose of in compliance with federal, state, and local regulations. Do not shred toner cartridge, unless dust-explosion prevention measures are taken. Do not put toner container into fire; heated toner may cause severe burns. Do not incinerate. Do not allow this material to drain into sewers/water supplies.

HP's Planet Partners (trademark) supplies recycling program enables simple, convenient recycling of HP original inkjet and LaserJet supplies. For more information and to determine if this service is available in your location, please visit <http://www.hp.com/recycle>.

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## SECTION 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.

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## SECTION 15: Regulatory information

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

#### EU regulations

**Regulation (EC) No. 1005/2009 on substances that deplete the ozone layer, Annex I**

Not listed.

**Regulation (EC) No. 1005/2009 on substances that deplete the ozone layer, Annex II**

Not listed.

**Regulation (EC) No. 850/2004 On persistent organic pollutants, Annex I as amended**

Not listed.

**Regulation (EU) No. 649/2012 concerning the export and import of dangerous chemicals, Annex I, Part 1 as amended**

Not listed.

**Regulation (EU) No. 649/2012 concerning the export and import of dangerous chemicals, Annex I, Part 2 as amended**

Not listed.

**Regulation (EU) No. 649/2012 concerning the export and import of dangerous chemicals, Annex I, Part 3 as amended**

Not listed.

**Regulation (EU) No. 649/2012 concerning the export and import of dangerous chemicals, Annex V as amended**

Not listed.

**Regulation (EC) No. 166/2006 Annex II Pollutant Release and Transfer Registry**

Not listed.

**Regulation (EC) No. 1907/2006, REACH Article 59(1) Candidate List as currently published by ECHA**

Not listed.

#### Authorizations

**Regulation (EC) No. 143/2011 Annex XIV Substances Subject to Authorization**

Not listed.

#### Restrictions on use

**Regulation (EC) No. 1907/2006, REACH Annex XVII Substances subject to restriction on marketing and use as amended**

Not listed.

**Directive 2004/37/EC: on the protection of workers from the risks related to exposure to carcinogens and mutagens at work**

Not regulated.

#### Other EU regulations

**Directive 2012/18/EU on major accident hazards involving dangerous substances, as amended**

Not listed.

#### Other regulations

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.

#### Other information

This Safety Data Sheet complies with the requirements of Regulation (EU) 2015/830. Classification according to Regulation (EC) No 1272/2008 as amended.

#### National regulations

Not available.

#### 15.2. Chemical safety assessment

See attached SUMI or GEIS document, if applicable.

## SECTION 16: Other information

<b>References</b>	<p>Regulation (EC) No. 1907/2006 of December 18, 2006 concerning the Registration, Evaluation, Authorization and Restriction of Chemicals (REACH) and establishing a European Chemicals Agency (REACH).</p> <p>Regulation (EU) 2015/830 of May 28, 2015 amending Regulation (EC) No. 1907/2006.</p> <p>Regulation (EC) No. 1272/2008 of December 16, 2008 on classification, labeling and packaging of substances and mixtures, and amendments (CLP).</p>
<b>Information on evaluation method leading to the classification of mixture</b>	<p>The classification for health and environmental hazards is derived by a combination of calculation methods and test data, if available.</p>
<b>Full text of any H-statements not written out in full under Sections 2 to 15</b>	<p>None.</p>
<b>Revision information</b>	<p>SECTION 5: Firefighting measures: 5.2. Special hazards arising from the substance or mixture SECTION 6: Accidental release measures: 6.3. Methods and material for containment and cleaning up SECTION 15: Regulatory information: Other regulations SECTION 16: Other information: Disclaimer</p>
<b>Training information</b>	<p>Follow training instructions when handling this material.</p>
<b>Disclaimer</b>	<p>This [Material] Safety Data Sheet is provided without charge to customers of Hewlett-Packard Company. Data is the most current known to Hewlett-Packard Company at the time of preparation of this (M)SDS 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.</p> <p>This safety data sheet is meant to convey information about HP inks (toners) provided in HP Original ink (toner) supplies. If our Safety Data Sheet has been provided to you with a refilled, remanufactured, compatible or other non-HP Original supply please be aware that the information contained herein was not meant to convey information about such products and there could be considerable differences from information in this document and the safety information for the product you purchased. Please contact the seller of the refilled, remanufactured or compatible supplies for applicable information, including information on personal protective equipment, exposure risks and safe handling guidance. HP does not accept refilled, remanufactured or compatible supplies in our recycling programs.</p>
<b>Explanation of abbreviations</b>	
<b>ACGIH</b>	American Conference of Governmental Industrial Hygienists
<b>CAS</b>	Chemical Abstracts Service
<b>CERCLA</b>	Comprehensive Environmental Response Compensation and Liability Act
<b>CFR</b>	Code of Federal Regulations
<b>COC</b>	Cleveland Open Cup
<b>DOT</b>	Department of Transportation
<b>EPCRA</b>	Emergency Planning and Community Right-to-Know Act (aka SARA)
<b>IARC</b>	International Agency for Research on Cancer
<b>NIOSH</b>	National Institute for Occupational Safety and Health
<b>NTP</b>	National Toxicology Program
<b>OSHA</b>	Occupational Safety and Health Administration
<b>PEL</b>	Permissible Exposure Limit
<b>RCRA</b>	Resource Conservation and Recovery Act
<b>REC</b>	Recommended
<b>REL</b>	Recommended Exposure Limit
<b>SARA</b>	Superfund Amendments and Reauthorization Act of 1986
<b>STEL</b>	Short-Term Exposure Limit
<b>TCLP</b>	Toxicity Characteristics Leaching Procedure
<b>TLV</b>	Threshold Limit Value
<b>TSCA</b>	Toxic Substances Control Act
<b>VOC</b>	Volatile Organic Compounds