

**XEROX**

**Material Safety Data Sheet**

**MSDS No:** B-0298

**Date:** 7/1/93

**Revision:** 9/25/01

**Manufacturer:**  
Xerox Corporation  
Rochester, N.Y. 14644

**Telephone #(s)** *Safety Information:* (800) 828-6571  
*Health Emergency:* (716) 422-2177  
*Transportation Emergency(Chemtrec):* (800) 424-9300

**Section I - Product Identification**

**Trade Names/Synonyms:** ES 8180, MAX 200 Black Developer

**Part No.:** WH: 5R575;  
EO: 5R90202\*, 5R90250  
USCO: 5R634

**Chemical Name:** None

\*Cancelled

**WHMIS Status:** This is not a WHMIS controlled product.

**Ingredients (% by wt.)**

**CAS No.**

Carrier (>95%):

Cu-Zn ferrite powder (>95%)<sup>1</sup> 66402-68-4

Toner (<5%):

Styrene/butylacrylate copolymer (80-90%) 25767-47-9

Carbon black (5-10%) 1333-86-4

Polyolefins (5-10%) 9003-07-0/9002-88-4

**Section II - Emergency and First Aid**

**Primary Route of Entry:**

Inhalation

**Eyes:**

Flush with water.

**Skin:**

Wash with soap and water.

**Inhalation:**

Remove from exposure.

**Ingestion:**

Dilute stomach contents with several glasses of water.

**Symptoms of Overexposure:**

Minimal respiratory tract irritation may occur as with exposure to large amounts of any non-toxic dust.

**Medical Conditions Generally Aggravated by Exposure:**

None when used as described by product literature.

**Additional Information:**

None

**Section III - Toxicology and Health Information**

*This material has been evaluated by Xerox Corporation. The toxicity data presented below is for toner only.*

**Oral LD<sub>50</sub>:** >5 g/kg (rats) practically non-toxic.<sup>1</sup>

**Dermal LD<sub>50</sub>:** >5 g/kg (rabbits) practically non-toxic.<sup>1</sup>

**Inhalation LC<sub>50</sub>:** >5 mg/l (rats, 4 hr exposure)practically non-toxic.<sup>1</sup>  
>20 mg/l (rats, calculated 1 hr exposure) non-poisonous, DOT.<sup>1</sup>

**Eye Irritation:** Not an irritant.<sup>1</sup>

**Skin Sensitization:** Not a sensitizer.<sup>1</sup>

**Skin Irritation:** Not an irritant.<sup>1</sup>

**Human Patch:** Non-irritating, non-sensitizing.<sup>1</sup>

**Mutagenicity:** No mutagenicity detected in Ames assay.

**Carcinogens:** None present

**Aquatic LC<sub>50</sub>:** >1000 mg/l (fathead minnows) non-toxic<sup>1</sup>

**TLV:** 10mg/m<sup>3</sup> (total dust)  
5 mg/m<sup>3</sup> (respirable dust)

**PEL:** 15 mg/m<sup>3</sup> (total dust)  
5 mg/m<sup>3</sup> (respirable dust)

**STEL:** N.E.

**Ceiling:** N.E.

**XEL<sup>2</sup>:** 2.5 mg/m<sup>3</sup> (total dust)  
0.4 mg/m<sup>3</sup> (respirable dust)

**Additional Information:** The results obtained from a Xerox sponsored, Chronic Toner Inhalation Study, demonstrated no lung change in rats for the lowest (1mg/m<sup>3</sup>) exposure level (i.e. the level most relevant to potential human exposure). A very slight degree of fibrosis was noted in 25% of the animals at the middle (4mg/m<sup>3</sup>) exposure level, while a slight degree of fibrosis was noted in all the animals at the highest (16 mg/m<sup>3</sup>) exposure level. These findings are attributed to "lung overloading", a generic response to excessive amounts of any dust retained in the lungs for a prolonged period. This study was conducted using a special test toner to comply with EPA testing protocol. The test toner was ten times more respirable than commercially available Xerox toner, and would not be functionally suitable for Xerox equipment.

<sup>1</sup>Based on testing similar xerographic toner materials. <sup>2</sup>XEL-Xerox Exposure Limit

**Section IV - Physical Data**

<b>Appearance/Odor:</b>	Black powder / faint odor	<b>Softening Range:</b>	85°C to 100°C
<b>Boiling Point:</b>	N.A.	<b>Melting Point:</b>	N.A.
<b>Solubility in Water:</b>	Negligible	<b>Specific Gravity (H<sub>2</sub>O=1):</b>	~1
<b>Evaporation Rate:</b>	N.A.	<b>Vapor Pressure (mm Hg):</b>	N.A.
<b>Vapor Density (Air=1):</b>	N.A.	<b>pH:</b>	N.A.
<b>Volatile:</b>	N.A.% (Wgt) N.A. % (Vol.)		

**Section V - Fire and Explosion Data**

<b>Flash Point (Method Used):</b>	N.A. °C N.A. °F
<b>Flammable Limits</b>	<b>LEL:</b> N.A. <b>UEL:</b> N.A.
<b>NFPA 704:</b>	Health-0, Fire-1, Reactivity-0
<b>Extinguishing Media:</b>	Dry chemicals, CO <sub>2</sub> , foam, water
<b>Special Fire Fighting Procedures:</b>	Avoid inhalation of smoke. Wear protective clothing and self-contained breathing apparatus.
<b>Fire and Explosion Hazards:</b>	Toner is a combustible powder. Like most organic materials in powder form, when dispersed in air, it can form explosive mixtures.

**Section VI -Reactivity Data**

<b>Stability:</b>	Stable
<b>Hazardous Polymerization:</b>	Will Not Occur
<b>Hazardous Decomposition Products:</b>	Products of combustion may be toxic. Avoid breathing smoke.
<b>Incompatibility (Materials to Avoid):</b>	None known

**Section VII - Special Protection Information**

<b>Respiratory Protection:</b>	None required when used as intended in Xerox equipment.
<b>Eye Protection:</b>	None required when used as intended in Xerox equipment.
<b>Protective Gloves:</b>	None required when used as intended in Xerox equipment.
<b>Other:</b>	For use other than normal customer - operating procedures (such as in bulk toner processing facilities), goggles and respirators may be required. For more information, contact Xerox.

**Section VIII - Special Precautions**

<b>Handling and Storage:</b>	Use with adequate ventilation
<b>Conditions to Avoid:</b>	Avoid prolonged inhalation of excessive dust.

**Section IX- Spill, Leak, and Disposal Procedures**

<b>For Spills or Leakage:</b>	If spilled, sweep or vacuum
<b>Waste Disposal Method:</b>	This material is not a hazardous waste according to Federal Regulation 40 CFR 261. State and Local requirements may be more restrictive. Consult with the appropriate State and Local waste authorities for advise.

**Section X - Transportation Information**

<b>DOT Proper Shipping Name:</b>	N.A. (Not Regulated)	<b>ID Number:</b>	N.A.
<b>Hazard Classification:</b>	N.A.	<b>Packing Group:</b>	N.A.