

Material Safety Data Sheet

acc. to ISO/DIS 11014

Printing date 01/06/2005

Reviewed on 01/05/2005

1 Identification of substance

- **Product details**

- **Trade name:** FD Ink Blue

- **Article number:** IF-D48, IF-D4PT, IF-D4QT, IF-D4GL

- **Application of the substance / the preparation** Printing inks

- **Manufacturer/Supplier:**

Universal Stenciling & Marking Systems, Inc.
205 15th Avenue South East
St. Petersburg, FL 33701
USA

Telephone (727) 894-3027

- **Information department:** MSDS DEPT.

- **Emergency information:**

Chemtrec 800-424-9300








International 703-527-3887

2 Composition/Data on components

- **Chemical characterization**

- **Description:** Mixture of the substances listed below with nonhazardous additions.

- **Hazardous components**

| | | | |
|------------|--------------------|---|---------|
| 1330-20-7 | xylene |  Xn; R 10-20/21-38 | 74.369% |
| 100-41-4 | ethylbenzene |  Xn,  F; R 11-20 | 16.425% |
| | Phenolic polymer | R 18 | 6.474% |
| 14233-37-5 | Anthraquinone Dye |  Xi; R 36/37/38 | 1.9% |
| 108-88-3 | toluene |  Xn,  F; R 11-38-48/20-63-65-67 | 0.456% |
| 98-54-4 | 4-tert-butylphenol |  Xi; R 36/37/38 | 0.27% |

- **Additional information:**

For the wording of the listed risk phrases refer to section 16.

This product contains one or more Hazardous Air Pollutants (HAPS) which are regulated under Section 112 of the Clean Air Act.

This product contains one or more reported or suspect carcinogens which are noted IARC, NTP, OSHA, ACGIH, OR NIOSH respectively

This product contains one or more reported or suspect mutagens

3 Hazards identification

- **Hazard description:**



Xn Harmful

- **Information pertaining to particular dangers for man and environment:**

The product has to be labelled due to the calculation procedure of international guidelines.

R 10 Flammable.

R 20/21 Harmful by inhalation and in contact with skin.

R 38 Irritating to skin.

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- **Inhalation**

Can cause nasal and respiratory tract irritation. Can cause Central Nervous System effects including fatigue, dizziness, nausea, vomiting, unconsciousness, respiratory failure, headache, possible hearing impairment.

- **Potential Chronic Health Effects**

Prolonged or repeated exposure of vapors, spray, or material may cause diseases of the lungs. Reports have associated repeated overexposure to solvents with brain and nervous system damage. Intentional misuse of this product may be harmful or fatal.

- **Target Organs**

Overexposure to this material or its components has been suggested as a cause of the following effects in laboratory animals and/or humans, and may aggravate preexisting disorders of these organs in humans: Anemia, Blood disorders, Brain damage, Cardiac function, eye, liver, lung, menstrual and fertility, skin, respiratory, Central Nervous System

- **Classification system:**

The classification was made according to the latest editions of international substances lists and from component data and msds information

- **NFPA ratings (scale 0 - 4)**



Health = 2
Fire = 3
Reactivity = 0

- **HMIS-ratings (scale 0 - 4)**



Health = 2
Fire = 3
Reactivity = 0

4 First aid measures

- **General information:**

Symptoms of poisoning may even occur after several hours; therefore medical observation for at least 48 hours after the accident.

Take affected persons out into the fresh air.

Involve doctor immediately.

- **After inhalation:**

Supply fresh air. If required, provide artificial respiration. Keep patient warm. Consult doctor if symptoms persist.

In case of unconsciousness place patient stably in side position for transportation.

- **After skin contact:** Immediately wash with water and soap and rinse thoroughly.

- **After eye contact:**

Rinse opened eye for fifteen minutes under running water. If irritation persists, consult a doctor.

- **After swallowing:** Do not induce vomiting; immediately call for medical help.

- **Information for doctor:**

- **The following symptoms may occur:**

Breathing difficulty

Headache

Dizziness

Thirst

Cramp

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Gastric or intestinal disorders
Coughing
Allergic reactions
Nausea

5 Fire fighting measures

- **Suitable extinguishing agents:**
CO₂, extinguishing powder or water spray. Fight larger fires with water spray or alcohol resistant foam.
ABC powder
- **Special hazards caused by the material, its products of combustion or resulting gases:**
Nitrogen oxides (NO_x)
Carbon monoxide (CO)
- **Protective equipment:**
Wear self-contained respiratory protective device.
Wear fully protective suit.
- **Additional information**
Dispose of fire debris and contaminated fire fighting water in accordance with official regulations.
Collect contaminated fire fighting water separately. It must not enter the sewage system.

6 Accidental release measures

- **Person-related safety precautions:**
Wear protective equipment. Keep unprotected persons away.
Ensure adequate ventilation
Particular danger of slipping on leaked/spilled product.
Keep away from ignition sources
Wear protective clothing.
- **Measures for environmental protection:**
Do not allow product to reach sewage system or any water course.
Prevent from spreading (e.g. by damming-in or oil barriers).
- **Measures for cleaning/collecting:**
Absorb with liquid-binding material (sand, diatomite, acid binders, universal binders, sawdust).
Dispose contaminated material as waste according to item 13.
Ensure adequate ventilation.
Do not flush with water or aqueous cleansing agents
Dispose of the collected material according to regulations.
- **Additional information:**
See Section 7 for information on safe handling.
See Section 8 for information on personal protection equipment.
See Section 13 for disposal information.

7 Handling and storage

- **Handling:**
- **Information for safe handling:**
Store in cool, dry place in tightly closed receptacles.

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Keep away from heat and direct sunlight.

Ensure good ventilation/exhaustion at the workplace.

Prevent formation of aerosols.

Handle with care. Avoid jolting, friction and impact.

Use solvent-proof equipment.

Hydrocarbon solvents are basically non-conductors of electricity and can become electrostatically charged during mixing or moving, observe grounding/grounding of containers and other equipment when handling.

· **Information about protection against explosions and fires:**

Keep ignition sources away - Do not smoke.

Protect from heat.

Protect against electrostatic charges.

Prevent impact and friction.

Use explosion-proof apparatus / fittings and spark-proof tools.

Fumes can combine with air to form an explosive mixture.

Flammable gas-air mixtures may be formed in empty receptacles.

· **Storage:**

· **Requirements to be met by storerooms and receptacles:**

Store only in the original receptacle.

Prevent any seepage into the ground.

· **Information about storage in one common storage facility:**

Do not store together with reducing agents, heavy-metal compounds, acids and alkalis.

Do not store together with oxidizing and acidic materials as well as heavy-metal compounds.

Store away from foodstuffs.

· **Further information about storage conditions:**

Keep receptacle tightly sealed.

Store in cool, dry conditions in well sealed receptacles.

Protect from heat and direct sunlight.

Protect from humidity and water.

Protect from exposure to the light.

8 Exposure controls and personal protection

· **Components with limit values that require monitoring at the workplace:**

1330-20-7 xylene

PEL 435 mg/m³, 100 ppm

REL Short-term value: 655 mg/m³, 150 ppm

Long-term value: 435 mg/m³, 100 ppm

(o-, m-, & p-isomers)

TLV Short-term value: 651 mg/m³, 150 ppm

Long-term value: 434 mg/m³, 100 ppm

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100-41-4 ethylbenzene

| | |
|-----|---|
| PEL | 435 mg/m ³ , 100 ppm |
| REL | Short-term value: 545 mg/m ³ , 125 ppm Long-term value: 435 mg/m ³ , 100 ppm |
| TLV | Short-term value: 543 mg/m ³ , 125 ppm Long-term value: 434 mg/m ³ , 100 ppm |
| | BEI |

Phenolic polymer

| | |
|-----|---|
| PEL | 15*,5** mg/m ³ *Total dust, **Respirable Fraction |
| TLV | 10*,3** mg/m ³ *Total Dust, **Respirable Fraction |

108-88-3 toluene

| | |
|-----|---|
| PEL | Short-term value: C 300; 500* ppm Long-term value: 200 ppm *10-min peak per 8-hr shift |
| REL | Short-term value: 560 mg/m ³ , 150 ppm Long-term value: 375 mg/m ³ , 100 ppm |
| TLV | 188 mg/m ³ , 50 ppm Skin; BEI |

98-54-4 4-tert-butylphenol

| | |
|-----|--------|
| TLV | NE ppm |
|-----|--------|

· **Additional information:** The lists that were valid during the creation were used as basis.

· **Personal protective equipment:**

· **General protective and hygienic measures:**

The usual precautionary measures for handling chemicals should be followed.

Keep away from foodstuffs, beverages and feed.

Immediately remove all soiled and contaminated clothing.

Wash hands before breaks and at the end of work.

Do not inhale gases / fumes / aerosols.

Avoid contact with the skin.

Avoid contact with the eyes and skin.

Pregnant women should strictly avoid inhalation or skin contact.

Do not eat, drink, smoke or sniff while working.

· **Breathing equipment:**

Use suitable respiratory protective device in case of insufficient ventilation.

Do not breath vapors, spray mists, or sanding dusts. Use air purifying respirators fitted with organic vapor/HEPA cartridges only if air monitoring demonstrates solvent/particulate levels do not exceed the respirator maximum use concentration. Use properly fitted NIOSH approved respirators. Local and general exhaust should minimize any exposure.

· **Protection of hands:**



Protective gloves

· **Material of gloves**

Nitrile rubber, NBR

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Nitrile or natural rubber gloves are typically used to protect from minor contact. Butyl type are best for prolonged contact.

· **Eye protection:**



Vapor proof safety goggles or full face respirator

· **Body protection:**

Solvent resistant protective clothing

Impervious protective clothing

Tyvek(R) coveralls to protect from light overspray protection or Saranex 23-P(R) for moderate exposure.

9 Physical and chemical properties

· **General Information**

Form: Fluid
Color: Blue
Odor: Alcohol-like

· **Change in condition**

Melting point/Melting range: Undetermined.
Boiling point/Boiling range: > 34°C (> 93°F)

· **Flash point:** 26°C (79°F)

· **Ignition temperature:** 430°C (806°F)

· **Auto igniting:** Product is not selfigniting.

· **Danger of explosion:** Product is not explosive. However, formation of explosive air/vapor mixtures are possible.
 In use, may form flammable/explosive vapour-air mixture.

· **Explosion limits:**

Lower: 1.0 Vol %
Upper: 7.8 Vol %

· **Vapor pressure at 20°C (68°F):** 9.5 hPa (7 mm Hg)

· **Density at 20°C (68°F):** 0.89 g/cm³

· **Solubility in / Miscibility with**

Water: Not miscible or difficult to mix.

· **Solvent content:**

Organic solvents: 91.3 %
VOC content: 811 g/l

· **Solids content:** 8.7 %

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10 Stability and reactivity

- **Thermal decomposition / conditions to be avoided:**
No decomposition if used according to specifications.
- **Dangerous reactions** Reacts with acids, alkalis and oxidizing agents.
- **Dangerous products of decomposition:**
Nitrogen oxides
Carbon monoxide and carbon dioxide

11 Toxicological information

- **Acute toxicity:**

- **LD/LC50 values that are relevant for classification:**

1330-20-7 xylene

| | | |
|--------|------|---------------------|
| Oral | LD50 | 4300 mg/kg (rat) |
| Dermal | LD50 | 2000 mg/kg (rabbit) |

100-41-4 ethylbenzene

| | | |
|--------|------|----------------------|
| Oral | LD50 | 3500 mg/kg (rat) |
| Dermal | LD50 | 17800 mg/kg (rabbit) |

- **Primary irritant effect:**
- **on the skin:** Irritant to skin and mucous membranes.
- **on the eye:** No irritating effect.
- **Sensitization:**
Sensitizing effect through inhalation is possible with prolonged exposure.
Sensitizing effect by skin contact is possible with prolonged exposure.
- **Additional toxicological information:**
The product shows the following dangers according to internally approved calculation methods for preparations:
Harmful
Irritant
Danger through skin absorption.

12 Ecological information

- **General notes:** This statement was deduced from the properties of the single components.

13 Disposal considerations

- **Product:**
- **Recommendation:**
Must not be disposed of together with household garbage. Do not allow product to reach sewage system.
Hand over to hazardous waste disposers.

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- **Uncleaned packagings:**
- **Recommendation:** Disposal must be made according to official regulations.

14 Transport information

· DOT regulations:



- **Hazard class:** 3
- **Identification number:** UN1210
- **Packing group:** III
- **Proper shipping name (technical name):** PRINTING INK
- **Label:** 3

· Land transport ADR/RID (cross-border):



- **ADR/RID class:** 3 Flammable liquids
- **Danger code (Kemler):** 30
- **UN-Number:** 1210
- **Packaging group:** III
- **Description of goods:** 1210 PRINTING INK

· Maritime transport IMDG:



- **IMDG Class:** 3
- **UN Number:** 1210
- **Label:** 3
- **Packaging group:** III
- **EMS Number:** F-E,S-D
- **Marine pollutant:** No
- **Propper shipping name:** PRINTING INK

· Air transport ICAO-TI and IATA-DGR:



- **ICAO/IATA Class:** 3
- **UN/ID Number:** 1210
- **Label:** 3
- **Packaging group:** III

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· **Proper shipping name:** PRINTING INK

15 Regulations

· **Sara**

· **40 CFR Section 355 (extremely hazardous substances):**

| | | | |
|---------|--------------|--------------------------|--------|
| 50-00-0 | formaldehyde | RQ 100 lbs = TPQ 500 lbs | 0.006% |
|---------|--------------|--------------------------|--------|

· **Section 313 (Specific toxic chemical listings):**

| | | | |
|-----------|--------------|--|---------|
| 1330-20-7 | xylene | | 74.369% |
| 100-41-4 | ethylbenzene | | 16.425% |
| 108-88-3 | toluene | | 0.456% |
| 50-00-0 | formaldehyde | | 0.006% |

· **SARA Title III Section 311/312 - Hazard Communication Standard (40 CFR 370)**

| | | | |
|------------|-------------------|--|---------|
| 1330-20-7 | xylene | | 74.369% |
| 100-41-4 | ethylbenzene | | 16.425% |
| 14233-37-5 | Anthraquinone Dye | | 1.9% |
| 108-88-3 | toluene | | 0.456% |
| 50-00-0 | formaldehyde | | 0.006% |

· **EPCRA Section 304: Emergency Notification (refer to headings 40 CFR 355 and CERCLA 40 CFR 302.4 for listing in this section)**

| | | | |
|-----------|--------------|--------|---------|
| 1330-20-7 | xylene | Listed | 74.369% |
| 100-41-4 | ethylbenzene | Listed | 16.425% |
| 50-00-0 | formaldehyde | listed | 0.006% |

· **RCRA: Resource Conservation and Recovery Act / Code**

| | | | |
|---------|--------------|-----------|--------|
| 50-00-0 | formaldehyde | Code U122 | 0.006% |
|---------|--------------|-----------|--------|

· **TSCA (Toxic Substances Control Act):**

All ingredients are listed or exempt.

| | | |
|------------|------------------------------------|--|
| 1330-20-7 | xylene | |
| 100-41-4 | ethylbenzene | |
| | Phenolic polymer | |
| 14233-37-5 | Anthraquinone Dye | |
| 108-88-3 | toluene | |
| 98-54-4 | 4-tert-butylphenol | |
| 556-67-2 | octamethylcyclotetrasiloxane | |
| 50-00-0 | formaldehyde | |
| 68855-54-9 | Kieselguhr, soda ash flux-calcined | |
| 14464-46-1 | crystalalite | |
| 14808-60-7 | Quartz (SiO ₂) | |

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· **Proposition 65 /Chemicals known to cause cancer:**

Product contains trace amounts of substances listed by California as causing cancer or reproductive toxicity. These are present incidentally and are at PPM levels less than 100 PPM in the total weight. These may include Cadmium, Chromium, Lead, Mercury, Arsenic, Barium, Selenium, and Silver.

| | | |
|----------|--------------|---------|
| 100-41-4 | ethylbenzene | 16.425% |
| 50-00-0 | formaldehyde | 0.006% |

· **Proposition 65 /Chemicals known to cause reproductive toxicity:**

| | | |
|----------|---------|--------|
| 108-88-3 | toluene | 0.456% |
|----------|---------|--------|

· **Clean Air Act- Hazardous Air Pollutants**

| | | | |
|-----------|--------------|--------------------------------|---------|
| 1330-20-7 | xylene | SOCMI,XOV | 74.369% |
| 100-41-4 | ethylbenzene | SOCMI , Code V | 16.425% |
| 108-88-3 | toluene | SOCMI, XOV | 0.456% |
| 50-00-0 | formaldehyde | XOV, SOCMI / ARP 15,000 lbs TQ | 0.006% |

· **Clean Water Act: Section 311(b)(2)(A) & Priority Pollutants**

| | | | |
|-----------|--------------|--------------------------------|---------|
| 1330-20-7 | xylene | 100 lbs | 74.369% |
| 100-41-4 | ethylbenzene | Priority Pollutant 1000 lbs RQ | 16.425% |
| 108-88-3 | toluene | Priority Pollutant RQ 1000 lbs | 0.456% |
| 50-00-0 | formaldehyde | R.Q. 100 lbs | 0.006% |

· **ACGIH Carcinogen**

| | | | |
|------------|---------------|-------------------------|-----------|
| 1330-20-7 | xylene | A4 | 74.369% |
| 100-41-4 | ethylbenzene | A3 (Skin) | 16.425% |
| 108-88-3 | toluene | A4 and Skin Designation | 0.456% |
| 50-00-0 | formaldehyde | A2 | 0.006% |
| 14808-60-7 | Quartz (SiO2) | A2 | <0.00001% |

· **Cancerogenity categories**

· **EPA (Environmental Protection Agency)**

| | | | |
|-----------|--------------|---|---------|
| 1330-20-7 | xylene | D | 74.369% |
| 100-41-4 | ethylbenzene | D | 16.425% |
| 108-88-3 | toluene | D | 0.456% |

· **IARC (International Agency for Research on Cancer)**

| | | | |
|------------|---------------|----|-----------|
| 1330-20-7 | xylene | 3 | 74.369% |
| 100-41-4 | ethylbenzene | 2B | 16.425% |
| 108-88-3 | toluene | 3 | 0.456% |
| 50-00-0 | formaldehyde | 1 | 0.006% |
| 14464-46-1 | crystalalite | 1 | 0.00001% |
| 14808-60-7 | Quartz (SiO2) | 1 | <0.00001% |

· **NTP (National Toxicology Program)**

| | | | |
|------------|---------------|---|-----------|
| 50-00-0 | formaldehyde | 2 | 0.006% |
| 14464-46-1 | crystalalite | K | 0.00001% |
| 14808-60-7 | Quartz (SiO2) | K | <0.00001% |

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· **TLV (Threshold Limit Value established by ACGIH)**

| | | | |
|------------|----------------------------|----|-----------|
| 1330-20-7 | xylene | A4 | 74.369% |
| 108-88-3 | toluene | A4 | 0.456% |
| 14808-60-7 | Quartz (SiO ₂) | A2 | <0.00001% |

· **NIOSH (National Institute for Occupational Safety and Health)**

| | | | |
|------------|----------------------------|--|-----------|
| 1330-20-7 | xylene | Standard 75-168, Guidelines 81-123 | 74.369% |
| 100-41-4 | ethylbenzene | Guidelines 81-123 | 16.425% |
| 108-88-3 | toluene | Std. 73-11023, Guidelines 81-123 | 0.456% |
| 50-00-0 | formaldehyde | Std. 77-126 ; Guidelines 89-104 | 0.006% |
| 14464-46-1 | crystalalite | .05mg/m ³ | 0.00001% |
| 14808-60-7 | Quartz (SiO ₂) | Std. 75-120, Guidelines 81-123, CIB 81-137 | <0.00001% |

· **OSHA-Ca (Occupational Safety & Health Administration)**

| | | | |
|---------|--------------|--|--------|
| 50-00-0 | formaldehyde | | 0.006% |
|---------|--------------|--|--------|

· **CERCLA- SARA Title III: 40 CFR Part 302, Table 302.4**

| | | | |
|-----------|--------------|---------------|---------|
| 1330-20-7 | xylene | 100 lbs | 74.369% |
| 100-41-4 | ethylbenzene | 1000 lbs R.Q. | 16.425% |
| 50-00-0 | formaldehyde | RQ 100 lbs | 0.006% |

· **State regulations**· **New Jersey Right-to-know**

| | | | |
|-----------|--------------|-------------------------------------|---------|
| 1330-20-7 | xylene | DOT 1307, Sub. No. 2014 | 74.369% |
| 100-41-4 | ethylbenzene | DOT 1175 Sub. No. 0851 | 16.425% |
| 108-88-3 | toluene | DOT 1294, Sub. No. 1866 | 0.456% |
| 50-00-0 | formaldehyde | DOT:1198 Sub No. 946 EHS 175 II 1 A | 0.006% |

· **Massachusetts Right-to-know / Hazardous Substance Codes**

| | | | |
|------------|----------------------------|------------------------|-----------|
| 1330-20-7 | xylene | 2,4 F8 F9 | 74.369% |
| 100-41-4 | ethylbenzene | 2,4,5,6 F7 F8 F9 | 16.425% |
| 108-88-3 | toluene | 2,4,5,6 F7 F8 F9 | 0.456% |
| 50-00-0 | formaldehyde | 1,2,3,4,5,6,7 *E*C* F6 | 0.006% |
| 14464-46-1 | crystalalite | 1,2,3,4 *E*C | 0.00001% |
| 14808-60-7 | Quartz (SiO ₂) | 1,2,4 *E*C* F5 | <0.00001% |

· **Florida Hazardous / Toxic Substance Lists**

| | | | |
|------------|----------------------------|----------|-----------|
| 1330-20-7 | xylene | Toxic | 74.369% |
| 100-41-4 | ethylbenzene | Toxic | 16.425% |
| 108-88-3 | toluene | Toxic | 0.456% |
| 50-00-0 | formaldehyde | repealed | 0.006% |
| 14464-46-1 | crystalalite | Toxic | 0.00001% |
| 14808-60-7 | Quartz (SiO ₂) | Toxic | <0.00001% |

· **Pennsylvania Hazardous Substances**

| | | | |
|-----------|--------------|---|---------|
| 1330-20-7 | xylene | E | 74.369% |
| 100-41-4 | ethylbenzene | E | 16.425% |

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| | | | |
|------------|------------------------------------|----|----------|
| 108-88-3 | toluene | E | 0.456% |
| 50-00-0 | formaldehyde | ES | 0.006% |
| 68855-54-9 | Kieselguhr, soda ash flux-calcined | -- | 0.001% |
| 14464-46-1 | crystalalite | -- | 0.00001% |

· **Michigan Hazardous Substance**

| | | | |
|----------|--------------|--------|---------|
| 100-41-4 | ethylbenzene | Listed | 16.425% |
|----------|--------------|--------|---------|

· **Minnesota Right To Know / Hazardous Substances**

| | | | |
|------------|----------------------------|---------------------------|-----------|
| 1330-20-7 | xylene | Code ANO | 74.369% |
| 100-41-4 | ethylbenzene | Code AO | 16.425% |
| 108-88-3 | toluene | Codes: ANO, Skin hazard | 0.456% |
| 50-00-0 | formaldehyde | Codes: ANORT / Carcinogen | 0.006% |
| 14464-46-1 | crystalalite | A | 0.00001% |
| 14808-60-7 | Quartz (SiO ₂) | Codes A | <0.00001% |

· **Maine**

| | | | |
|-----------|--------|--|---------|
| 1330-20-7 | xylene | | 74.369% |
|-----------|--------|--|---------|

· **Rhode Island**

| | | | |
|-----------|--------|--|---------|
| 1330-20-7 | xylene | | 74.369% |
|-----------|--------|--|---------|

· **New York Right To Know / Hazardous Substances**

| | | | |
|-----------|--------------|-------------------------------|---------|
| 1330-20-7 | xylene | Air RQ 1000 lbs, Land RQ 1 lb | 74.369% |
| 100-41-4 | ethylbenzene | Air RQ 1000 lbs, Land RQ 1 lb | 16.425% |
| 108-88-3 | toluene | Air RQ 1000 lbs, Land RQ 1 lb | 0.456% |
| 50-00-0 | formaldehyde | Air RQ 100 lbs, Land RQ 1 lb | 0.006% |

· **Product related hazard informations:**

The product has been classified and marked in accordance with directives on hazardous materials.

· **Hazard symbols:**

Xn Harmful

· **Hazard-determining components of labelling:**

xylene

· **Risk phrases:**

- 10 Flammable.
- 20/21 Harmful by inhalation and in contact with skin.
- 38 Irritating to skin.

· **Safety phrases:**

- 3 Keep in a cool place.
- 9 Keep container in a well-ventilated place.
- 16 Keep away from sources of ignition - No smoking.
- 23 Do not breathe gas/fumes/vapour/spray (appropriate wording to be specified by the manufacturer).
- 25 Avoid contact with eyes.
- 36/37 Wear suitable protective clothing and gloves.
- 43 In case of fire, use sand, carbon dioxide or powdered extinguishing agent. Never use water.
- 51 Use only in well-ventilated areas.
- 60 This material and its container must be disposed of as hazardous waste.

(Contd. on page 13)

Material Safety Data Sheet

acc. to ISO/DIS 11014

Printing date 01/06/2005

Reviewed on 01/05/2005

Trade name: FD Ink Blue

(Contd. of page 12)

· **National regulations:**

· **OSHA Process Safety Management: Appendix A to 29 CFR 1910.119**

| | | | |
|---------|--------------|---------------|--------|
| 50-00-0 | formaldehyde | T.Q. 1000 lbs | 0.006% |
|---------|--------------|---------------|--------|

· **Occupational Safety and Health Act (OSHA)**

Immediate (acute) health hazard

Delayed (chronic) Health Hazard

Fire Hazard

· **Water hazard class:** Water hazard class 1 (Self-assessment): slightly hazardous for water.

16 Other information

To the best of our knowledge, the information contained herein is accurate. However, neither the above named supplier nor any of its subsidiaries assumes any liability whatsoever for the accuracy or completeness of the information contained herein. Final determination of suitability of any material is the sole responsibility of the user. All materials may present unknown hazards and should be used with caution. Although certain hazards are described herein, we cannot guarantee that these are the only hazards that exist.

· **Relevant R-phrases**

10 Flammable.

11 Highly flammable.

18 In use, may form flammable/explosive vapour-air mixture.

20 Harmful by inhalation.

20/21 Harmful by inhalation and in contact with skin.

36/37/38 Irritating to eyes, respiratory system and skin.

38 Irritating to skin.

48/20 Harmful: danger of serious damage to health by prolonged exposure through inhalation.

63 Possible risk of harm to the unborn child.

65 Harmful: may cause lung damage if swallowed.

67 Vapours may cause drowsiness and dizziness.

· **Contact:** MSDS Department

USA