# SAFETY DATA SHEET

Version 1.3

# 1. IDENTIFICATION OF THE SUBSTANCE/PREPARATION AND OF THE COMPANY/UNDERTAKING

Product identifier Product Name Product Code

DAPI CP-109

**Recommended use of the chemical and restrictions on use** For research use only. Not intended for diagnostic or therapeutic use.

Details of the supplier of the safety data sheet IMT Formosa New Materials Co., Ltd. Rm. 1, 4F., No. 15, Aly. 15, Ln. 71, Changyu St., Sanmin Dist., Kaohsiung City 807, Taiwan (R.O.C.) Emergency telephone number +886-926159317

# 2. HAZARDS IDENTIFICATION

This chemical is considered hazardous by the 2012 OSHA Hazard Communication Standard (29 CFR 1910.1200).

#### Classification

Serious eye damage/eye irritation Specific target organ toxicity (single exposure)

Label elements Signal word Hazard statements

Symbols/Pictograms

Precautionary Statements - Prevention

Precautionary Statements - Response

Precautionary Statements - Storage

Precautionary Statements - Disposal

Hazards not otherwise classified (HNOC)

Category 2A Category 3

Warning Causes serious eye irritation May cause respiratory irritation



Wash face, hands and any exposed skin thoroughly after handling Wear protective gloves/protective clothing/eye protection/face protection Avoid breathing dust/fume/gas/mist/vapors/spray Use only outdoors or in a well-ventilated area IF exposed or concerned: Get medical advice/attention IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing If eye irritation persists: Get medical advice/attention IF INHALED: Remove victim to fresh air and keep at rest in a position comfortable for breathing Call a POISON CENTER or doctor/physician if you feel unwell Store in a well-ventilated place. Keep container tightly closed Store locked up Dispose of contents/container to an approved waste disposal plant

| Hazards not otherwise classified (HNOC) |  |                  | Not applicable |      |   |                  |
|---|--|------------------|----------------|------|---|------------------|
| Other Inf                               | ormation   |                  |                |      |   |                  |
| NFPA                                    | Health hazards<br>Flammability<br>Stability<br>Physical and chemical<br>properties | 0<br>1<br>0<br>- |                | HMIS | Health hazards<br>Flammability<br>Physical hazards<br>Personal protection | 0<br>1<br>0<br>- |

# 3. COMPOSITION/INFORMATION ON INGREDIENTS

| CAS No<br>Molecular Weight<br>Formula |            | 28718-90-3<br>350.24<br>C16H15N₅•2H0 | CI        |             |                 |
|---------------------------------------|------------|--------------------------------------|-----------|-------------|-----------------|
| Chemical name                         | CAS No.    | Weight-%                             | Oral LD50 | Dermal LD50 | Inhalation LC50 |
| DAPI                                  | 28718-90-3 | >98                                  | -         | -           | -               |

# 4. FIRST AID MEASURES

| First Aid Measures                 |  |
|------------------------------------|--|
| General advice                     | If symptoms persist, call a physician. Do not breathe dust/fume/gas/mist/vapors/spray. Do  |
| Eye contact                        | not get in eyes, on skin, or on clothing.<br>Immediately flush with plenty of water. After initial flushing, remove any contact lenses and<br>continue flushing for at least 15 minutes. Keep eye wide open while rinsing. If symptoms   |
| Skin Contact                       | persist, call a physician.<br>Consult a physician if necessary. Wash off immediately with soap and plenty of water while<br>removing all contaminated clothes and shoes. Wash contaminated clothing before reuse.<br>Wash off immediately with plenty of water. If skin irritation persists, call a physician.   |
| Inhalation                         | Immediate medical attention is not required.<br>Remove to fresh air Call a physician If breathing is irregular or stopped, administer artificial<br>respiration Avoid direct contact with skin. Use barrier to give mouth-to-mouth resuscitation<br>Artificial respiration and/or oxygen may be necessary Immediate medical attention is not<br>required Move to fresh air in case of accidental inhalation of vapors If symptoms persist, call<br>a physician |
| Ingestion                          | Rinse mouth. Drink plenty of water. If symptoms persist, call a physician. Do NOT induce vomiting. Clean mouth with water and drink afterwards plenty of water. Never give anything by mouth to an unconscious person. Call a physician.   |
| Self-protection of the first aider | Use personal protective equipment as required.   |
| Most important symptoms and        | d effects, both acute and delayed  |

Symptoms No information available.

Indication of any immediate medical attention and special treatment needed Note to physicians Treat symptomatically.

# 5. FIRE-FIGHTING MEASURES

# Suitable Extinguishing MediaUse extinguishing measures that are appropriate to local circumstances and the<br/>surrounding environment.Unsuitable Extinguishing MediaNo information available.

| Specific hazards arising from th                      | e chemical   |  |  |
|---|--|--|--|
| Specific hazards arising from the chemical            | Thermal decomposition can lead to release of toxic/corrosive gases and vapors.   |  |  |
| Hazardous combustion products                         | Carbon oxides. Nitrogen oxides (NOx). Phosgene.  |  |  |
| Explosion data  |  |  |  |
| Sensitivity to Mechanical Impact                      | No information available.  |  |  |
| Sensitivity to Static Discharge                       | No information available.  |  |  |
| Protective equipment and preca                        |  |  |  |
| Frotective equipment and precautions for firefighters | As in any fire, wear self-contained breathing apparatus pressure-demand, MSHA/NIOSH (approved or equivalent) and full protective gear. |  |  |
|   |  |  |  |
| 6. ACCIDENTAL RELEASE MEASURES                        |  |  |  |
| Personal precautions, protective                      | e equipment and emergency procedures   |  |  |
| Personal precautions                                  | Use personal protective equipment as required. Evacuate personnel to safe areas. Keep people away from and upwind of spill/leak.       |  |  |
| Environmental pressutions                             |  |  |  |

#### **Environmental precautions**

Prevent entry into waterways, sewers, basements or confined areas. Do not flushinto **Environmental precautions** surface water or sanitary sewer system. Prevent further leakage or spillage if safe to do so. Prevent product from entering drains. See Section 12 for additional Ecological Information.

# Methods and material for containment and cleaning up

Methods for containment Prevent further leakage or spillage if safe to do so. Use personal protective equipment as required. Take up mechanically, placing in Methods for cleaning up appropriate containers for disposal. Clean contaminated surface thoroughly. Cover powder spill with plastic sheet or tarp to minimize spreading and keep powder dry. Avoid creating dust. Soak up with inert absorbent material. Dam up. Pick up and transfer to properly labeled containers. Sweep up and shovel into suitable containers for disposal. After cleaning, flush away traces with water. Take precautionary measures against static discharges.

# 7. HANDLING AND STORAGE

| <b>Precautions for safe handling</b><br>Advice on safe handling | Avoid contact with skin, eyes or clothing. Use personal protective equipment as required.<br>Wash contaminated clothing before reuse. Do not breathe dust/fume/gas/mist/vapors/spray.<br>Do not eat, drink or smoke when using this product. Use with local exhaust ventilation.<br>Handle in accordance with good industrial hygiene and safety practice. Corrosive hazard.<br>Wear protective gloves/clothing and eye/face protection. Thermal decomposition can lead<br>to release of toxic/corrosive gases and vapors. |
|---|--|
| Conditions for safe storage, inc                                | luding any incompatibilities   |
| Storage Conditions  | Keep container tightly closed in a dry and well-ventilated place. Keep out of the reach of children. Keep containers tightly closed in a cool, well-ventilated place. Keep in properly labeled containers. Store at -20 °C.  |
| Incompatible materials  | None known based on information supplied.  |

# 8. EXPOSURE CONTROLS/PERSONAL PROTECTION

| Control parameters              |   |
|---------------------------------|---|
| Exposure Guidelines             | This product, as supplied, does not contain any hazardous materials with occupational exposure limits established by the region specific regulatory bodies.   |
| Appropriate engineering control | ls  |
| Engineering Controls            | Showers   |
|                                 | Eyewash stations  |
|                                 | Ventilation systems   |
| Individual protection measures, | such as personal protective equipment   |
| Eye/face protection             | Tight sealing safety goggles. Face protection shield.   |
| Skin and Body Protection        | Wear protective gloves and protective clothing.   |
| Respiratory protection          | If exposure limits are exceeded or irritation is experienced, NIOSH/MSHA approved respiratory protection should be worn. Positive-pressure supplied air respirators may be required for high airborne contaminant concentrations. Respiratory protection must be provided in accordance with current local regulations. |
| General Hygiene Considerations  | When using do not eat, drink or smoke. Regular cleaning of equipment, work area and clothing is recommended.  |

# 9. PHYSICAL AND CHEMICAL PROPERTIES

| Physical State   | Solid   |
|--|---|
| Appearance   | No information available  |
| Odor   | characteristic  |
| Property<br>pH<br>Melting point/freezing point<br>Boiling point<br>Flash point<br>Liquid Density<br>Evaporation rate<br>Upper flammability limits<br>Lower flammability limit<br>Vapor pressure<br>Vapor density<br>Specific gravity<br>Water solubility<br>Solubility in other solvents<br>Partition coefficient<br>Autoignition temperature<br>Decomposition temperature | <b>Values</b><br>No information available<br>330 °C<br>545.4 °C<br>283.6 °C<br>No information available<br>No information available |
| Kinematic viscosity  | No information available  |
| Explosive properties   | No information available  |
| Oxidizing properties   | No information available  |

# **10. STABILITY AND REACTIVITY**

| Reactivity                         | Not applicable                                  |
|------------------------------------|---|
| Chemical stability                 | Stable under recommended storage conditions.    |
| Possibility of Hazardous Reactions | None under normal processing.                   |
| Hazardous polymerization           | No information available.                       |
| Conditions to avoid                | Extremes of temperature and direct sunlight.    |
| Incompatible materials             | Strong oxidizing agents.                        |
| Hazardous Decomposition Products   | Carbon oxides. Nitrogen oxides (NOx). Phosgene. |

# **11. TOXICOLOGICAL INFORMATION**

| Information on likely routes of exposure |                    |  |
|--|--------------------|--|
| Inhalation                               | No data available. |  |
| Eye contact                              | No data available. |  |
| Skin Contact                             | No data available. |  |
| Ingestion                                | No data available. |  |

Information on toxicological effects Symptoms No information available.

Delayed and immediate effects as well as chronic effects from short and long-term exposure Chronic Toxicity Avoid repeated exposure.

Numerical measures of toxicity- Product InformationUnknown acute toxicityNo information available

# **12. ECOLOGICAL INFORMATION**

| Ecotoxicity  | May cause long lasting harmful effects to aquatic life |  |  |
|--|--|--|--|
| 100% of the mixture consists of components(s) of unknown hazards to the aquatic environment. |  |  |  |
| Persistence and degradability  | No information available.                              |  |  |
| Bioaccumulation  | No information available.                              |  |  |
| Mobility   | No information available.                              |  |  |

# **13. DISPOSAL CONSIDERATIONS**

| Disposal of wastes     | Disposal should be in accordance with applicable regional, national and local laws and    |
|------------------------|---|
|                        | regulations.  |
| Contaminated packaging | Do not reuse container.   |
| Other Information      | Waste codes should be assigned by the user based on the application for which the product |
|                        | was used.   |

# **14. TRANSPORT INFORMATION**

| DOT  | Not regulated |
|------|---------------|
| IMDG | Not regulated |
| ΙΑΤΑ | Not regulated |

# **15. REGULATORY INFORMATION**

## International Inventories

All of the components in the product are on the following Inventory lists Europe (EINECS/ELINCS/NLP) China (IECSC)

| Chemical nam | e TSCA | DSL | NDSL | EINECS | ELINCS | ENCS | IECSC | KECL | PICCS | AICS |
|--------------|--------|-----|------|--------|--------|------|-------|------|-------|------|
| DAPI         | -      | -   | -    | Х      | -      | -    | Х     | -    | -     | -    |

X - Listed

TSCA - United States Toxic Substances Control Act Section 8(b) Inventory

DSL/NDSL - Canadian Domestic Substances List/Non-Domestic Substances List

EINECS/ELINCS - European Inventory of Existing Chemical Substances/European List of Notified Chemical Substances

**ENCS** - Japan Existing and New Chemical Substances

IECSC - China Inventory of Existing Chemical Substances

KECL - Korean Existing and Evaluated Chemical Substances

PICCS - Philippines Inventory of Chemicals and Chemical Substances

#### **US Federal Regulations**

#### **SARA 313**

Section 313 of Title III of the Superfund Amendments and Reauthorization Act of 1986 (SARA). This product does not contain any chemicals which are subject to the reporting requirements of the Act and Title 40 of the Code of Federal Regulations, Part 372.

#### SARA 311/312 Hazard Categories

| Acute health hazard               | Yes |
|-----------------------------------|-----|
| Chronic Health Hazard             | No  |
| Fire hazard                       | No  |
| Sudden release of pressure hazard | No  |
| Reactive hazard                   | No  |

#### **CWA (Clean Water Act)**

This product does not contain any substances regulated as pollutants pursuant to the Clean Water Act (40 CFR 122.21 and 40 CFR 122.42).

### US State Regulations

# **California Proposition 65**

This product does not contain any Proposition 65 chemicals.

### U.S. State Right-to-Know Regulations

This product does not contain any substances regulated by state right-to-know regulations

# **16. OTHER INFORMATION**

Revision note

No information available

#### Disclaimer

The information provided in this Material Safety Data Sheet is correct to the best of our knowledge, information and belief at the date of its publication. The information given is designed only as a guidance for safe handling, use, processing, storage, transportation, disposal and release and is not to be considered a warranty or quality specification. The 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, unless specified in the text.

**End of Safety Data Sheet**