

# Safety Data Sheet (SDS)

GENERIC EU MSDS – NO COUNTRY SPECIFIC DATA – NO OEL DATA  
According to Regulation (EC) No 1907/2006 (REACH)

## 1. Identification of the substance/mixture and of the company/undertaking

### 1.1 Product identifier

**Product Name:** DNA CISH Probe with Hybridization Buffer

**Product SKU:** Various

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

**Use of the substance/mixture:** DNA Labeled CISH Probe with Hybridization Buffer is used in Chromogenic In Situ Hybridization (CISH).

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

**Company Name:** Empire Genomics Inc.

**Address:** 1000 Youngs Road, Suite 207  
Williamsville NY 14221 USA

**Telephone:** +1 716 856 3873

**Fax:** +1 716 431 3440

**Email:** info@empiregenomics.com

**Internet:** www.empiregenomics.com

### 1.4 Emergency telephone number

**Telephone:** +1 716 856 3873

9AM – 5PM (EST)

## 2. Hazards identification

### 2.1 Classification of the substance or mixture

**Classification according to Regulation (EC) No. 1272/2008**

**Hazard categories:**

Skin corrosion/irritation: Category 2

Eye damage/irritation: Category 2

Reproductive toxicity: Category 1B

Carcinogenicity: Category 2

STOT – repeated exposure: Category 2

**Hazard Statements:**

May cause harm to unborn child.

Avoid contact with skin and eyes.

Suspected of causing cancer.

May cause damage to organs through prolonged or repeated exposure.

**2.2 Label elements**

**Labelling according to Regulation (EC) No. 1272/2008**

**Hazard pictograms:**



GHS07



GHS08

**Signal Word:** Danger

**Hazardous ingredients:** Formamide

**Hazard statements:** H315 – Causes skin irritation  
H319 – Causes eye irritation  
H351 – Suspected of causing cancer  
H360 – May damage the unborn child  
H373 - May cause damage to organs through prolonged or repeated exposure

**Precautionary statements:** P201 – Obtain special instructions before use  
P262 – Do not get in eyes, on skin, or on clothing  
P280 – Wear protective gloves/protective clothing/eye protection/face protection  
P301+P309+P310 – IF SWALLOWED, call a poison center or physician  
P302+P352 – IF ON SKIN, wash with plenty of soap and water  
P305+P338+P351 – IF IN EYES, rinse cautiously with water for several minutes  
Remove contact lenses, if present and easy to do. Continue rinsing.  
P313 – IF EXPOSED or concerned, get medical advice/attention  
P501 – Dispose of contents/container to local/regional/nation/international regulation

**2.3 Other hazards**

No additional information available

### 3. Composition/information on ingredients

#### 3.1 Substance

Not applicable

#### 3.2 Mixture

##### Hazardous components

| Name      | CAS #   | EC #      | %      | Classification  |
|-----------|---------|-----------|--------|---|
| Formamide | 75-12-7 | 200-842-0 | 50-71% | Skin irrit. – 2<br>Eye irrit – 2<br>Repr. – 1B<br>Carc. – 2<br>STOT – 2 |

### 4. Composition/information on ingredients

#### 4.1 Description of first aid measures

##### After inhalation

May cause irritation to the respiratory tract. Move person into fresh air and seek medical advice.

##### After contact with eyes

Flush with copious amounts of water for at least 15 minutes while keeping eyes open. Seek medical attention.

##### After contact with skin

May cause skin irritation. Wash with copious amounts of water and remove clothing that came into contact with the solutions. Seek medical attention. Wash clothing before wearing.

##### After ingestion

If person is conscious, give large amounts of water to drink. Seek medical attention immediately.

#### 4.2 Most important symptoms and effects, both acute and delayed

After contact with skin: Irritation

After contact with eyes: Irritation

#### 4.3 Indication of any immediate medical attention and special treatment needed

Treat symptomatically.

### 5. Firefighting measures

#### 5.1 Extinguishing media

Suitable extinguishing media: Carbon dioxide, extinguishing powder, or water jet.

Fight larger fires with water jet or alcohol-resistant foam.

## 5.2 Special hazards arising from the substance or mixture

Product is not self-igniting.

Product is not explosive.

## 5.3 Advice for firefighters

Respiratory protection not normally required unless exposure limits for released components are exceeded. Keep breathing equipment ready.

# 6. Accidental release measures

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

### General measures

Wear chemical resistant safety goggles, gloves, and rubber boots.

Keep breathing equipment ready.

## 6.2 Environmental precautions

Do not allow to enter drainage system, surface, or ground water.

## 6.3 Methods and material for containment and cleaning up

Absorb with liquid-binding material (sand, diatomite, acid binders, universal binders, sawdust).

Ventilate area and wash spill site after material pickup is complete.

## 6.4 Reference to other sections

**Safe handling:** See Section 7

**Personal protection equipment:** See Section 8

**Disposal:** See Section 13

# 7. Handling and storage

## 7.1 Precautions for safe handling

This product has not been viability tested. It should be treated as if it were infectious using the appropriate Good Laboratory Practice and experienced staff with appropriate training.

No special precautions necessary if used correctly.

Wear gloves when handling.

Avoid contact with skin and eyes, avoid inhalation or ingestion.

## 7.2 Conditions for safe storage, including any incompatibilities

**Storage conditions:** Store at  $\leq -20^{\circ}\text{C}$

Store in the dark / away from light.

Avoid multiple/frequent freeze/thaw cycles. Aliquots should be prepared if repeated use is needed.

Protect from heat and direct sunlight.

### 7.3 Specific end use(s)

No additional information available.

## 8. Exposure controls/personal protection

### 8.1 Control parameters

#### Exposure limits (EH40)

| CAS No. | Substance | ppm | mg/m <sup>3</sup> | Category      | Origin |
|---------|-----------|-----|-------------------|---------------|--------|
| 75-12-7 | Formamide | 20  | 37                | TWA (8h)      | WEL    |
| 75-12-7 | Formamide | 30  | 56                | STEL (15 min) | WEL    |

### 8.2 Exposure controls

|  |   |
|--|---|
| <b>Appropriate engineering controls:</b> | Ensure good ventilation of the workstation.   |
| <b>Protective and hygiene measures:</b>  | Keep away from foodstuffs, beverages, and food.<br>Immediately remove contaminated clothing.<br>Wash hands during breaks and at the end of the work.<br>Store protective clothing separately. |
| <b>Eye/face protection:</b>              | Safety glasses recommended.   |
| <b>Hand protection:</b>                  | Protective gloves must be worn.<br>The quality of the protective gloves must be chosen specific to the conditions of use.<br>Gloves should be changed immediately after wetting.              |
| <b>Skin protection:</b>                  | Use of suitable protective clothing.  |
| <b>Respiratory protection:</b>           | Not necessary, if room is well-ventilated.<br>Take precautions if chemical concentrations exceed the exposure limits (if any) listed above.   |
| <b>Environmental exposure controls:</b>  | Avoid release to the environment.   |

## 9. Physical and chemical properties

### 9.1 Information on basic physical and chemical properties

|                                   |                   |
|-----------------------------------|-------------------|
| <b>Physical state:</b>            | Liquid            |
| <b>Color:</b>                     | Various           |
| <b>Odor:</b>                      | Odorless          |
| <b>pH:</b>                        | 7.0-8.0           |
| <b>Relative evaporation rate:</b> | No data available |

|  |                              |
|--|------------------------------|
| <b>Melting point:</b>                  | No data available            |
| <b>Freezing point:</b>                 | No data available            |
| <b>Boiling point:</b>                  | No data available            |
| <b>Flash point:</b>                    | 154°C / 309°C                |
| <b>Auto-ignition temperature:</b>      | No data available            |
| <b>Decomposition temperature:</b>      | No data available            |
| <b>Flammability (solid, gas):</b>      | Product is not self-igniting |
| <b>Vapor pressure:</b>                 | No data available            |
| <b>Relative vapor density at 20°C:</b> | 1.1 g/cm <sup>3</sup>        |
| <b>Relative density:</b>               | No data available            |
| <b>Solubility:</b>                     | Soluble                      |
| <b>Viscosity:</b>                      | No data available            |
| <b>Explosive properties:</b>           | No data available            |
| <b>Oxidizing properties:</b>           | No data available            |
| <b>Explosive limits:</b>               | Product is not explosive     |

## 9.2 Other information

No additional information available.

## 10. Stability and Reactivity

### 10.1 Reactivity

This product is non-reactive under normal conditions of use, storage, and transport.

### 10.2 Chemical stability

This product is stable under recommended conditions of use, storage, and transport.

### 10.3 Possibility of hazardous reactions

No known hazardous reactions.

### 10.4 Conditions to avoid

None.

### 10.5 Incompatible materials

Avoid mixing with strong oxidizing and reducing agents and strong acids and bases.

Avoid excess heat and protect from light.

### 10.6 Hazardous decomposition products

No information available.

## 11. Toxicological information

### 11.1 Information on toxicological effects

**Acute toxicity:** Not classified.

| CAS No. | Chemical Name | Exposure Route | Dose               | Species |
|---------|---------------|----------------|--------------------|---------|
| 75-12-7 | Formamide     | Oral           | LD50: >5800 mg/kg  | Rat     |
| 75-12-7 | Formamide     | Dermal         | LD50: >17000 mg/kg | Rabbit  |
| 75-12-7 | Formamide     | Inhalation     | LC50: >3900 ppm    | Rat     |

**Irritation and corrosivity:** May cause skin and eye irritation.

**Sensitizing effects:** No sensitizing effects known.

**Germ cell mutagenicity:** Not classified.

**Carcinogenicity:** Not classified.

**Reproductive toxicity:** May damage fertility or the unborn child.

**STOT- single exposure:** Not classified.

**STOT- repeated exposure:** Not classified.

**Aspiration hazard:** Not classified.

## 12. Ecological information

### 12.1 Toxicity

**Fish toxicity:** This product has not been tested.

**Daphnia toxicity:** This product has not been tested.

**Algae toxicity:** This product has not been tested.

**Bacteria toxicity:** This product has not been tested.

### 12.2 Persistence and degradability

This product has not been tested.

### 12.3 Bioaccumulative potential

This product has not been tested.

### 12.4 Mobility in soil

This product has not been tested.

### 12.5 Results of PBT and vPvB assessment

This product has not been tested.

### 12.6 Other adverse effects

No additional information available.

## 13. Disposal considerations

### 13.1 Waste treatment methods

|                                  |   |
|----------------------------------|---|
| <b>Disposal recommendations:</b> | Do not allow undiluted product or large quantities of it to reach ground water, water bodies or sewage system.<br><br>Dispose in accordance with local, regional, and national environmental regulations. |
| <b>Contaminated packaging:</b>   | Non contaminated packaging can be used for recycling.<br><br>For disposal of contaminated packaging, please refer to applicable local regulations.  |

## 14. Transport information

In accordance with ADR/RID/IMDG/IATA/ADN

| ADR                                    | RID            | IMDG           | IATA           | ADN            |
|--|----------------|----------------|----------------|----------------|
| <b>14.1 UN Number</b>                  |                |                |                |                |
| Not applicable                         | Not applicable | Not applicable | Not applicable | Not applicable |
| <b>14.2 UN proper shipping name</b>    |                |                |                |                |
| Not applicable                         | Not applicable | Not applicable | Not applicable | Not applicable |
| <b>14.3 Transport hazard class(es)</b> |                |                |                |                |
| Not applicable                         | Not applicable | Not applicable | Not applicable | Not applicable |
| <b>14.4 Packing group</b>              |                |                |                |                |
| Not applicable                         | Not applicable | Not applicable | Not applicable | Not applicable |
| <b>14.5 Environmental hazards</b>      |                |                |                |                |
| Not applicable                         | Not applicable | Not applicable | Not applicable | Not applicable |

### 14.6 Special precautions for user

Not applicable.

### 14.7 Maritime transport in bulk according to IMO instruments

Not applicable.

## 15. Regulatory information

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

#### EU regulatory information

REACH, annex XIV

Substances of very high concern (SVHC), REACH, article 59

Formamide (CAS No. 75-12-7)

REACH, annex XVII

Entry 3

Entry 30



Directive 2012/18/EU, annex I

None of the ingredients listed.

#### **National regulatory information**

United States

SARA 313 Components: Not listed

California Prop. 65: Not listed

#### **15.2 Chemical safety assessment**

A chemical safety assessment has not been carried out.

### **16. Other information**

#### **Abbreviations and Acronyms**

**ADR:** Accord européen sur le transport des marchandises dangereuses par Route (European Agreement concerning the International Carriage of Dangerous Goods by Road)

**ADN:** European Agreement concerning the International Carriage of Dangerous Goods by Inland Waterways (Accord européen relatif au transport international des marchandises dangereuses par voies de navigation intérieures)

**CAS:** Chemical Abstracts Service

**EC:** Effect Concentration

**GHS:** Globally Harmonised System of Classification, Labelling and Packaging of Chemicals

**IATA:** International Air Transport Association

**IMDG:** International Maritime Code for Dangerous Goods

**LC:** Lethal Concentration

**PBT:** persistent, bioaccumulative, toxic

**REACH:** Registration, Evaluation and Authorization of Chemicals

**RID:** Regulations concerning the international carriage of dangerous goods by rail

**STOT:** Specific target organ toxicity

**vPvB:** very persistent, very bioaccumulative

**UN:** United Nations

*The information contained herein is believed to be correct at time of issue but may not be all-inclusive and should be used as a guide only. Further, it is recommended that the product be handled and used by appropriately trained personnel only. Empire Genomics Inc. shall not be held liable for any damage resulting from handling or from contact with the product.*