**HURST SCIENTIFIC**

# Safety Data Sheet
# Giemsa Stain Solution

## SECTION 1: Identification

**1.1 GHS Product identifier**

| | |
|---|---|
| Product name | Giemsa Stain Solution |
| Product number | GMSA-100M, 500M, 1L, 2.5L & 5L |
| Brand | Hurstchem |

**1.2 Other means of identification** Giemsa Stain Solution

**1.3 Recommended use of the chemical and restrictions on use**
Laboratory Reagent

**1.4 Supplier's details**

| | |
|---|---|
| Name | Hurst Scientific |
| Address | 2/36 Hensbrook Loop<br>6112 Forrestdale WA<br>Australia |
| Telephone | 1300 778 068 |
| email | sales@hurstscientific.com.au |

**1.5 Emergency phone number** Australian Poisons Information Centre 131 126
Australian Emergency Services 000

## SECTION 2: Hazard identification

Classified as a **Hazardous** substance according to the Globally Harmonised System of Classification and Labelling of Chemicals (GHS) and Safe Work Australia criteria.

**2.1** *Classified as a **Dangerous goods** according to the ADG Code for the Transport of Dangerous Goods by Road and Rail (7th Edition).*

**GHS classification of the substance/mixture:**
- Flammable liquids, Cat. 2
- Acute toxicity, oral, Cat. 3
- Acute toxicity, inhalation, Cat. 3
- Acute toxicity, dermal, Cat. 3
- Specific target organ toxicity (single exposure), Cat. 1

**2.2 GHS label elements, including precautionary statements.**
**Pictogram (s)**

1. Flame; 2. Skull and crossbones; 3. Health hazard

| | |
|---|---|
| **Signal word** | **Danger** |

**Hazard statement(s)**

| | |
|---|---|
| H225 | Highly flammable liquid and vapor |
| H301 | Toxic if swallowed. |
| H331 | Toxic if inhaled. |
| H311 | Toxic in contact with skin |
| H370 | Causes damage to organs [organs, route] |

**Precautionary statement(s)**

| | |
|---|---|
| P210 | Keep away from heat/sparks/open flames/hot surfaces. No smoking. |
| P241 | Use explosion-proof electrical/ventilating/lighting/…/ equipment. |
| P260 | Do not breathe dust/fume/gas/mist/vapours/spray. |
| P264 | Wash … thoroughly after handling. |
| P280 | Wear protective gloves/protective clothing/eye protection/face protection. |
| P330 | Rinse mouth. |
| P301+P310 | IF SWALLOWED: Immediately call a POISON CENTER/doctor/... |
| P303+P361+P353 | IF ON SKIN (or hair): Take off immediately all contaminated clothing. Rinse skin with water/shower. |
| P304+P340 | IF INHALED: Remove person to fresh air and keep comfortable for breathing. |
| P308+P311 | IF exposed or concerned: Call a POISON CENTER/doctor/... |
| P370+P378 | In case of fire: Use … to extinguish. |
| P403+P235 | Store in a well-ventilated place. Keep cool. |
| P501 | Dispose of contents/container to … |

## SECTION 3: Composition/information on ingredients

### 3.2 Mixtures

**Components**

**1. Methanol**

| | |
|---|---|
| Concentration | 50 % |
| CAS no. | 67-56-1 |

**2. Glycerine**

| | |
|---|---|
| Concentration | 50 % |
| CAS no. | 56-81-5 |

**3. Giemsa Stain**

| | |
|---|---|
| Concentration | < 4 % |
| CAS no. | 51811-82-6 |

## SECTION 4: First-aid measures

### 4.1 Description of necessary first-aid measures

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|---|---|
| If inhaled | Evacuate to fresh air immediately. If unconscious place in recovery position, provide artificial respiration if breathing ceases. Seek immediate medical. attention. |
| In case of skin contact | Remove contaminated clothing and wash affected area with soap and water thoroughly and rinse with Methylated Spirits. Seek medical attention immediately. |

| | |
|---|---|
| In case of eye contact | Flush eyes with copious amounts of water for at least 15 minutes. Seek immediate medical attention. |
| If swallowed | DO NOT induce vomiting. Rinse mouth thoroughly with water. Seek immediate medical attention. Do not give anything by mouth to an unconscious person. If person vomits place person on their side in the recovery position. |

Personal protective equipment for first-aid responders
Eye wash station, safety shower and First Aid kit.

**4.3 Indication of immediate medical attention and special treatment needed, if necessary**
Should be treated symptomatically.

## SECTION 5: Fire-fighting measures

**5.1 Suitable extinguishing media**
Dry agent, carbon dioxide, foam, or water fog. Alcohol resistant foam is the preferred firefighting medium. Use water fog to cool intact containers and nearby storage areas.

**5.2 Specific hazards arising from the chemical.**
Toxic gases may evolve.

**5.3 Special protective actions for fire-fighters**
Wear SCBA (Self-Contained Breathing Apparatus) and full protective equipment or chemical splash suit.
Highly flammable liquid. Contain spill. May form flammable mixtures with air. The vapour is heavier than air and may travel along the ground; distant ignition and flashback are possible.

**Hazchem code** 2WE

## SECTION 6: Accidental release measures

**6.1 Personal precautions, protective equipment, and emergency procedures**
In the event of a spill eliminate all sources of ignition and take measures to prevent static discharge. Use water spray to disperse vapour. Clear area of all personnel not directly involved in the clean-up. Wear appropriate personal protective equipment to prevent skin and eye exposure and inhalation of vapours. Ventilate area well.

**6.3 Methods and materials for containment and cleaning up.**
Absorb with vermiculite or similar and place into a suitably labelled container. Dispose of waste according to local authority guidelines. Wash the affected area with a large volume of water. Do not contaminate drains or waterways.

## SECTION 7: Handling and storage

**7.1 Precautions for safe handling**
Use only in an adequately ventilated area away from all sources of ignition. Avoid breathing in mists or vapours. Wear appropriate protective clothing to avoid any exposure and practice good personal hygiene.

**7.2 Conditions for safe storage, including any incompatibilities.**
Store in tightly closed containers in a cool, dry and well-ventilated area away from heat, sources of ignition and incompatibles. Keep containers always closed – check regularly for damage or leaks.

## SECTION 8: Exposure controls/personal protection

**National exposure standards**
National Occupational Exposure Standard (NES), Safe Work Australia (formerly ASCC/NOHSC)
**Methanol: [TWA]** – 200 ppm (262 mg/$m_3$)

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|---|---|
| | **[STEL]** – 250 ppm (328 mg/m3)<br>All occupational exposures to atmospheric contaminants should be kept to as low a level as is workable (practicable) and in all cases to below the National Standard. |
| **Biological Limit Values** | Not allocated for this product. |
| **Engineering Controls** | Ensure adequate ventilation to maintain airborne concentrations below national exposure standards. |
| **Personal Protective Equipment** | Safety glasses or goggles, chemical-resistant gloves, and laboratory coat. |

## SECTION 9: Physical and chemical properties

**Basic physical and chemical properties**

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|---|---|
| Appearance | Purple liquid |
| Odor | Sweet Odour |
| Melting point/freezing point | -97.7°C |
| Boiling point or initial boiling point and boiling range | 64.7°C |
| Flammability | Highly Flammable |
| Lower and upper explosion limit/flammability limit | 5.5-35% |
| Flash point | 12°C |
| pH | 6.1 - 7.0 |
| Solubility | Soluble |
| Vapor pressure | 100mmHg @ 25$^{o}$C |
| Density and/or relative density | 01.1 |

## SECTION 10: Stability and reactivity

**10.1 Reactivity**
Hygroscopic. Highly flammable. Non-reactive under recommended conditions for use and storage.

**10.2 Chemical stability**
Stable under recommended conditions for use and storage.

**10.3 Possibility of hazardous reactions**
Polymerisation will not occur.

**10.4 Conditions to avoid.**
Heat, flame, sparks and sources of ignition.

**10.5 Incompatible materials**
Incompatible with oxidising agents (eg. hypochlorite's), acids (eg. nitric acid), alkalis (eg. hydroxides), heat and ignition sources.

**10.6 Hazardous decomposition products**
Toxic gases may evolve.

## SECTION 11: Toxicological information

**HEALTH EFFECTS**

**Acute:** **Eye contact** Vapour and liquid can irritate the eyes resulting in redness, pain, conjunctivitis and lacrimation.

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|---|---|
| **Skin contact** | Brief skin contact may cause minor and short-lasting irritation. Prolonged contact (e.g. Repeated daily contact) may cause drying and cracking of the skin due to the de-fatting action. Dermatitis may also occur in some individuals. |
| **Inhalation** | Vapour may cause irritation of the nose, throat, and upper respiratory tract. Can cause drowsiness, nausea, and dizziness. |
| **Ingestion** | May cause nausea, vomiting and diarrhea. Large quantities may cause acidosis, optic nerve-damage, circulatory and respiratory complications, coma, and death. |
| **Chronic:** | Repeated exposure at over the occupational standard may lead to damage to liver, heart, kidneys, lungs, and other organs including the retina and optic nerve. |

**Skin Corrosion / Irritation** No classification.
**Serious Eye Damage / Irritation** No classification.
**Respiratory or Skin Sensitisation** No classification.
**Germ Cell Mutagenicity** No classification.
**Carcinogenicity** Does not contain any IARC listed chemicals.
**Reproductive Toxicity** No classification.
**Specific Target Organ Toxicity (STOT) – Single Exposure** No classification.
**Specific Target Organ Toxicity (STOT) – Repeated Exposure** No classification.
**Aspiration Hazard** No classification.
**TOXICITY DATA:** Not available for this mixture.

**Methanol:** LD50 (Oral, Rat): 8000 mg/kg
LC50 (Inhalation, Rat): 128.2mg/l/4h
LC50 (Inhalation, Rat): 87.5 mg/l/6h

## SECTION 12: Ecological information

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|---|---|
| Toxicity | Not available. |
| **Persistence and degradability** | Not available. |
| **Bioaccumulate potential** | Not expected to bio-accumulate. |
| **Mobility in soil** | Not available. |
| **Other adverse effects** | Environmental fate (exposure) Do not contaminate drains and waterways. May cause long term effects to the aquatic environment. |

## SECTION 13: Disposal considerations

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|---|---|
| Product disposal | Dispose of material via a licensed contractor and in accordance with local authority guidelines. |
| **Special precautions** | Nil. |

## SECTION 14: Transport information

Classified as **Dangerous goods** by the criteria of the Australian Dangerous Goods Code.

| | |
|---|---|
| UN Number | 1230 |
| UN Proper shipping name | Methanol |
| Class and subsidiary risk | 3 & 6.1 (Toxic Substances) |
| Packing group | II |

| | |
|---|---|
| Special precautions | Refer to incompatibilities in Section 7 and stability and reactivity information in Section 10. |
| Hazchem code | 2WE |

## SECTION 15: Regulatory information

**15.2 Chemical Safety Assessment**

- **TWA (Time Weighted Average):** The average airborne concentration of a particular substance when calculated over a normal eight hour working day, for a five-day week.
- **STEL (Short Term Exposure Limit):** The average airborne concentration over a 15-minute period which should not be exceeded at any time during a normal eight-hour workday.

## SECTION 16: Other information

**16.1 Further information/disclaimer**

**References**

1. Safe Work Australia, Preparation of Safety Data Sheets for Hazardous Chemicals Code of Practice, (2011).
2. Safe Work Australia, National Code of Practice for the Labelling of Workplace Hazardous Chemicals (2015).
3. Safe Work Australia, Workplace Exposure Standards for Airborne Contaminants (2013)
4. National Transport Commission Australian Code for the Transport of Dangerous Goods by Road and Rail (ADG Code); Can print: Canberra (2007), Volume 1, 7th Edition.
5. Standards Australia, Dangerous Goods Initial Emergency Response Guide: Australian Handbook (SAA/SNZ HB76); Homebush (2004).

**16.2 Preparation information**

Disclaimer

This SDS is prepared in accordance with the Safe Work Australia, Preparation of Safety Data Sheets for Hazardous Chemicals Code of Practice, (2011). The information contained within is believed to be accurate at the date of preparation/review. Hurst Scientific makes no claims of the accuracy or completeness of the information and excludes all liability for any loss or damage related to the supply or use of the information in this material safety data sheet. It is recommended the user make their own determinations as to the suitability of the information provided to the application in which the product is to be used.