

Safety Data Sheet

Avesta Moly Drop 960

This Safety Data Sheet contains information to help users understand the potential hazards relating to this product and provides advice for risk management. This information must be shown to or made available to those who may come into contact with the material or are responsible for the material. This Safety Data Sheet is prepared in accordance with GHS, as adopted by the UN Economic and Social Council (ECOSOC) in July 2003. Reference is also made to Australian the Hazardous Substances Information System (HSIS), released by the National Occupational Health and Safety Commission (NOSHC).

1. Identification of the Substance and Supplier

| Trade name | Avesta Moly Drop 960 |
|-------------|---|
| Description | Yellow paste containing a mixture strong inorganic acid for identification of Mo in stainless steels |
| Issue date: | 2010-09-15, 1 |
| Supplier: | Bohler Uddeholm (Australia) Pty Ltd 129-135 McCredie Road GUILDFORD NSW 2161 AUSTRALIA Tel: +61-2-9681 3100 Fax: +61-2-9632 6161 E-mail: <u>bwa@buau.com.au</u> |

In case of emergency call:

24 hour contact Ph: 131126 (National), +61-2-98453111 (International). In case of non-emergency assistance 9am to 5pm Monday to Friday: +61-2-9681 3100

2. Hazards Identification

The product is considered dangerous if in contact with skin, eyes or if ingested.

Classification GHS DANGER Skin Corrosion, Category 1A Acute toxicity, Category 4 Toxic if swallowed, Causes severe skin burns and eye damage (irritant by inhalation?)

Classification HSIS C Corrosive, R34, R37

Contact with skin and eyes may cause severe damage without rapid first aid. Inhalation of spray may cause irritation to the respiratory tract. Ingestion will lead to damage of the GI tract and considered toxic if swallowed. There are no known long-term health effects resulting from exposure at low concentrations.



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The product is not considered as Dangerous to the Environment, although due to the acidic nature of the product, care should be taken to avoid direct loss to the environment.

3. Composition

| CAS | Name | Content | Class (GHS) | HSIS |
|-----------|-------------------|---------|----------------------|------------|
| 7647-01-0 | Hydrochloric acid | 30-35% | Category 1 Corrosive | C R34, R37 |

Solution in water with < 1% thickening agent.

The classification descriptions given in this section relate to the components in their pure form and do not correspond to the classification of this preparation.

4. First Aid Measures

Inhalation

If exposed to spray or fumes, move to area of fresh air. If any signs of adverse effect, obtain medical advice. Treatment should be consistent with effects from acid exposure.

Skin contact

Wash skin immediately with water and keep affected areas under flowing water. Obtain medical advice if continued signs of irritation or discomfort are noted. Treatment should be consistent with effects from acid exposure. Wash clothing before re-use.

Eye contact

Flush eyes immediately with plenty of water for at least 5 minutes. Seek immediate medical advice. Treatment should be consistent with effects from acid exposure.

Ingestion

If swallowed, rinse mouth thoroughly and drink small quantity of water (500 ml). Obtain medical advice immediately.

Note to medical staff: Treat as for hydrochloric acid. Rapid first aid is essential in case of contact.

5. Fire fighting Measures

Not flammable

Extinguishing media

If in the vicinity of a fire, there are no known adverse reactions to any normal extinguishing media. . The material is not known to be reactive with any extinguishing media.

Special exposure hazards (from the material or its combustion products)

Normal combustion products are not considered to be specifically hazardous. Chlorine may be released on heating.

Special precautions for fire fighters

None





6. Accidental release measures

Personal precautions

Remove unnecessary personnel away from area of spill or contamination. During cleaning, protective clothing should be worn to avoid contact with skin and eyes.

Environmental precautions

Prevent spilled material or washings entering water courses or storm-water drainage systems. Diluted product and washings may be discharged into foul-water systems leading to waste water treatment plants.

Methods for cleaning up

Spills of up to 5 litres can be rinsed away to waste water drains with large quantities of water ensuring at least 10 X dilution factor. If not possible, absorb onto sand, sawdust or other suitable material. Residues should be collected and disposed of as chemical waste in suitably labelled containers. If the spillage is greater than 5 litres, contain spill and call in trained personnel. Follow supplier recommendations for neutralisation.

The area contaminated by the spill should be washed with water.

7. Handling and storage

Handling

Other than the use of goggles, acid resistant gloves and coveralls, no special handling precautions are required. Ensure adequate ventilation. See section 8 for more details.

Storage

Store in original containers between 0 – 30°C. No special precautions.

8. Exposure controls/personal protection

Hydrochloric acid No Australian exposure limits set (NOHSC) US OSHA Permissible Exposure Limit (PEL): 5 ppm (Ceiling) US ACGIH Threshold Limit Value (TLV):2 ppm (Ceiling), Not classifiable as a human carcinogen DNEL has not been determined, but no long term health effects are known.

Respiratory protection

None required during normal handling. Use in well ventilated areas and avoid formation of spray, aerosols or fumes. In enclosed areas, breathing apparatus suitable for chlorine should be used, for example, gas filter type B.

Hand protection

Suitable chemical resistant gloves recommended for use with acid materials and resistant to acids. Change gloves in accordance with manufacturer recommendations. If gloves are damaged during use, remove immediately and wash hands before replacing with new gloves.

Eve protection

Goggles must be worn when handling this product.

Skin protection

Coveralls recommended. These should be changed after use or if contaminated. Wash before re-use.





Environmental exposure controls

When handling small quantities (less than 5 litres), no special precautions required. If handling bulk material, precautions should be taken to avoid accidental release to water courses.

9. Physical and Chemical Properties

Appearance Freezing point Boiling point **Relative density** Water solubility Flash point Vapour pressure Viscous yellow paste < -1 °C Ca 108°C, fluid – gas vapour release at lower temperatures 1.3 g/cm³ Miscible in water, pH 1 Not flammable Acid fumes may be released, especially at elevated temperatures

10. Stability and Reactivity

Conditions to avoid

The material is considered to be stable under normal conditions. Store away from direct sunlight and avoid elevated temperatures

Materials to avoid

Avoid contact with alkaline materials and strong oxidising or reducing agents. Will corrode, iron, copper, aluminium, zinc, magnesium and their alloys. Also reacts with organic substances, including cyanides, sulphides, formaldehyde, amines, carbonates and other alkaline material.

Hazardous decomposition products

Chlorine may be released on decomposition.

11. Toxicological Information

The preparation has not been tested but the effects can be estimated using the criteria covered by GHS and through estimation using NOSHC guidance. Corrosive effects are predicted through consideration of the very low pH.

| Acute oral toxicity | Corrosive; considered to cause damage to GI tract if swallowed | |
|---------------------|---|--|
| _ | Measured LD50 reported 900 mg/kg | |
| Eyes | Will cause severe eye damage to low pH | |
| Skin | Considered corrosive to skin, GHS Category 1A | |
| Sensitiser | None of the components are considered to be sensitisers | |
| Inhalation | Inhalation of vapours, spray or aerosol may cause severe irritation to respiratory tract. | |
| Long-term toxicity | None of the components are listed as CMR* | |
| | | |

(*Carcinogenic, mutagenic or reproductive toxin)

12. Ecological Information

Not classified as dangerous to aquatic organisms, but the low pH may cause local damage if released into the environment.





LC50 Fish 96h: 232mg/L (Gambusia affinis)

The preparation has not been fully tested but there are no components present at concentrations that will cause the preparation to be classified as Dangerous to the Environment.

There are no components considered to be persistent or bioaccumulative.

13. **Disposal Considerations**

It is recommended to dispose of small quantities of this material (< 5 litres) by flushing with an excess of water to foul drainage. A dilution factor of > 10 is recommended. Larger quantities of waste should be treated as hazardous chemical waste in a manner that complies with local regulations. Advice should be sought from local agencies.

The containers should be rinsed thoroughly with water and can be disposed of as nonhazardous waste.

Careful neutralisation may be possible. Follow supplier recommendations.

14. Transport Information

UN proper description and shipping name: HYDROCHLORIC ACID SOLUTION Hazard class: 8, Corrosive Packing group: II **UN-Classification No:** 1789 Hazchem Code: 2R Classification code: C1 IMDG (Sea): Class 8 EmS F-A, S-B ADR/RID (road, rail): Class 8 IATA/DGR (air): Class 8

15. Regulatory Information

Classification GHS



DANGER Skin Corrosion, Category 1B Hazard Class Corrosive Causes severe skin burns and eye damage



DANGER Acute toxicity, Category 4 Harmful if swallowed

Classification HSIS

C Corrosive, R34, R37 (> 25% hydrochloric acid) Xn Harmful R22 (self classification based on acute oral toxicity data)

16. Other Information

Details of R phrases in Section 2, 3 and Section 15, Xn Harmful, R22 Harmful if swallowed C Corrosive, R34 Causes burns Xi Irritant, R37 Irritating to respiratory system

Check instructions for use before using. Only use as directed. Ensure training is provided for handling strong acids





Changes since last revision:

Layout and document number.

Manufacturer:

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