SDS Reference	**UN**
Version No.	**4**
Revision Date	**13/08/2015**
Origination Date	**June 2002**

Safety Data Sheet

REVISION

Product Name **ME17**

1. IDENTIFICATION OF SUBSTANCE / PREPARATION AND COMPANY

Product Name ME17

Synonym (s) -

Product Use/s ELECTRO-CHEMICAL MARKING SOLUTION

Company Identification

Universal Marking Systems Ltd
Unit 4, Dukes Mill
Station Approach **Telephone 01420 565 800**
Medstead, GU34 5EN

Emergency Telephone **01420 565 800**

e-mail address info@ums.co.uk

2. HAZARDS IDENTIFICATION

Classification of mixture (Regulation (EC) No. 1272/2008 (CLP))

Not classified.

Label elements

Hazard pictogram(s) None

Signal word None

Hazard statements None

Precautionary statements None

Further information None

Other hazards This product is low hazard but may cause slight irritation to the skin, eyes and respiratory system.

3. COMPOSITION / INFORMATION ON INGREDIENTS

Chemical name	CAS-No	EINECS/ELINCS	Classification (Reg. EC 1272/2008)	Conc. %
Sodium nitrite	7632-00-0	231-555-9	Ox. Sol. 3: H272 Acute Tox. 3: H301 Aquatic Acute 1: H400	< 0.5
Trisodium orthophosphate	7601-54-9	231-508-8	Skin Irrit. 2; H315 Eye Irrit. 2; H319 STOT SE3; H335	< 1

Further Information: Other components are either low hazard or are below the concentration limit for classification.

4. FIRST AID MEASURES

Inhalation	If inhaled, provide fresh air, warmth and rest.
Skin contact	Clean areas of skin affected with soap and plenty of water.
Eye contact	In case of contact with eyes, rinse immediately with plenty of water until irritation subsides.
Ingestion	Allow the patient to vomit on his own accord. DO NOT induce vomiting. Give copious water to drink and if necessary seek medical advice.
Further information	-

5. FIRE FIGHTING MEASURES

General hazard	THE PRODUCT IS NON-COMBUSTIBLE
Extinguishing media	To suit local surroundings (e.g. water spray, carbon dioxide, foam, chemical powder)
Extinguishing media not to be used	-
Special exposure hazards	Decomposition products released in a fire should be considered toxic if inhaled.
Protective equipment	Fire fighters should wear protective equipment appropriate for surrounding fire.
Further information	Residues formed by evaporation are powerfully oxidising, will sustain fire, and may explode.

6. ACCIDENTAL RELEASE MEASURES

Methods for cleaning up	LARGE LEAKS & SPILLAGES: Adhere to personal protective measures. Take up with absorbent material, e.g. sand, into tightly closable containers. DO NOT use organic absorbent material. Label container and dispose of as prescribed. MINOR LEAKS & SPILLAGES: Absorb spillage on a damp cloth. Ensure cloth is fully rinsed out afterwards. Wash contaminated area with plenty of water.
Environmental considerations	Do not allow large volumes to get into waste water or waterways; if this occurs, inform the relevant water authority at once.
Further information	Wash decontaminated area well with plenty of water.

7. HANDLING & STORAGE

Advice on safe handling	Handle in accordance with good hygiene and safety practice. Wear suitable protective clothing as detailed in section 8.
Storage conditions	Ensure adequate ventilation of the storage area. Keep containers tightly closed, cool and dry when not in use.
Further information	Avoid contact with organic or combustible materials. CAUTION: This includes wood, paper and rags. If these become contaminated and are allowed to dry out, they may spontaneously catch fire.

8. EXPOSURE CONTROLS / PERSONAL PROTECTION

Exposure limit values	No Workplace Exposure Limits (WEL) assigned. LTEL (8 hour TWA): - ppm - mg/m^3 STEL (15min) - ppm mg/m^3
Engineering controls	Ensure adequate ventilation of working area.
Personal protection	Observe normal standards for handling chemicals. Wash hands before breaks and after work. Wear personal protective equipment appropriate to the task (see below).
Eye protection	Safety glasses.
Skin protection	Lightweight chemical resistant gloves.
Respiratory protection	Not required.
Other personal protection	Protective overalls for dealing with large leaks and spillages.
Environmental exposure controls	No significant issues.
Further Information	Personal protective equipment should be selected as appropriate for the identified hazard(s). It should be regularly inspected for soundness against leaks, bad fitting and possible chemical penetration. Recommended safe use periods should never be exceeded.

9. PHYSICAL & CHEMICAL PROPERTIES

Physical form	Liquid supplied in 1 litre and 125 ml plastic bottles.
Colour	Not available.
Odour	Not available.
Molecular weight	Not applicable
Molecular formula	Not applicable
pH	Approx. 11.5
Boiling pt / range	100°C approx.
Melting pt / range	Not available
General Flammability	Non-combustible
Flash point	Non-combustible
Auto-ignition temperature	Non-combustible
Decomposition temperature	Not available
Relative Density	Approx. 1
Explosive properties	Not explosive
Oxidising properties	Mildly oxidising
Vapour pressure	Not available

9. PHYSICAL & CHEMICAL PROPERTIES

Vapour Density	Not available
Relative Evaporation Rate (n-Butyl Acetate = 1)	Not available
Viscosity	Not available
Water solubility	Miscible
Partition coefficient (log P or log K n-octanol / water)	Not available
Additional information	-

10. STABILITY & REACTIVITY

Stability	Stable under normal conditions. Nitrites oxidise slowly in air to form nitrates.
Conditions to avoid	Combustible materials and organic substances.
Incompatible Materials	Strong reducing agents and acids.
Hazardous decomposition products	May generate toxic fumes if involved in a fire.
Further information	Residues formed by evaporation are powerfully oxidising, will sustain fire, and may explode.

11. TOXICOLOGICAL INFORMATION

Acute toxicity	LD_{50} rat (oral)	180 mg/kg	data for Sodium nitrite RTECS RA1225000
	LC_{50} rat (inhalation)	5.5 mg/m3/4H	data for Sodium nitrite RTECS RA1225000
Acute irritation/corrosivity	Eye (rabbit): 500 mg/24H - MILD		data for Sodium nitrite
Sensitisation	No data available.		
Repeated dose toxicity	No data available.		
CMR effects	No data available.		
Further information	No significant toxicological data as this is a low hazard product.		

12. ECOLOGICAL INFORMATION

Ecotoxicity	EC_{50} Daphnia magna	66 mg/l/48H	data for Sodium nitrite
Mobility	Miscible with water.		
Persistence and degradability	No data available.		
Bioaccumulative potential	No data available.		
Results of PBT assessment	No data available.		
Other adverse effects	This product is low hazard and unlikely to cause environmental damage.		

13. DISPOSAL CONSIDERATIONS

Advice on disposal	In accordance with national (i.e. Hazardous Waste Regulations in the UK) and local authority regulations, e.g. incineration.
Contaminated packaging	Treat empty containers in the same way as the product or if possible wash out thoroughly and recycle.
Further information	In the UK, this product and its containers can be disposed of as normal industrial waste.

14. TRANSPORT INFORMATION

United Nations number	The product is not classified for transport
Proper shipping name	-
Class	-
Subsidiary risk/s	-
Packing group	-
Marine pollutant	-
Emergency action code	-
Hazard Identification Number	-
Further information	-

15. REGULATORY INFORMATION

Classification & labelling	in accordance with EC Regulation No. 1272/2008

16. OTHER INFORMATION

Key to H statements in Section 3	H272	May intensify fire; oxidiser.
	H301	Toxic if swallowed.
	H315	Causes skin irritation.
	H319	Causes serious eye irritation.
	H335	May cause respiratory irritation.
	H400	Very toxic to aquatic life.

Sources of data RTECS; suppliers' safety data sheets; ECHA Classification & Labelling Inventory

Date of Revision 13/08/2015

Reason for revision Amended information and advice to improve relevance for end users.

Sections revised 5, 6, 7, 8, 9, 10, 16

This information is based on our present state of knowledge and is intended to describe our products from the point of view of the safety requirements. It should not be construed as guaranteeing specific properties.

Printing date: 15/06/2018