

# Safety Data Sheet

According to Regulation (EC) No. 1907/2006

Print date – 24/03/15

MSDS - 6700

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

MSDS-ID: Unolux Dual Bond – Liquid (FBD084)

### **Manufacturer:**

Manufacturer/supplier:	Made for UnoDent Ltd.	Tel: 01376 500582
Address:	10 Perry Way, Witham, Essex CM8 3SX, UK	Fax: 01376 500581
Information sector:	Technical Department	Tel: 01376 500582
Emergency information:	Technical Department	
Emergency e-mail:	<a href="mailto:info@unodent.com">info@unodent.com</a>	

## **SECTION 2: Hazards identification**

### **2.1. Classification of the substance or mixture**

Indications of danger: F - Highly flammable

R phrases:

Highly flammable.

May cause sensitisation by skin contact.

### **GHS classification**

Hazard Statements:

Highly flammable liquid and vapour.

### **2.2. Label elements**

Signal word: Danger

Pictograms: GHS02



### **Hazard statements**

H225 Highly flammable liquid and vapour.

### **Precautionary statements**

P233 Keep container tightly closed.

P210 Keep away from heat/sparks/open flames/hot surfaces. - No smoking.

P102 Keep out of reach of children.

## **SECTION 3: Composition/information on ingredients**

### **3.2. Mixtures**

#### **Chemical characterisation**

Ethanol.

Sum formula: C<sub>2</sub>H<sub>6</sub>O

Molecular weight: 46,07

### Hazardous components

EC No	Chemical name	Quantity
CAS No	Classification	
Index No	GHS classification	
REACH No		
200-578-6	ethanol, ethyl alcohol	
64-17-5	F - Highly flammable R11	< 100 %
603-002-00-5	Flam. Liq. 2; H225	

Full text of R and H phrases: see Section 16.

## SECTION 4: First aid measures

### 4.1. Description of first aid measures

#### After inhalation

Move victim to fresh air. Put victim at rest and keep warm.

#### After contact with skin

After contact with skin, wash immediately with: Water and soap. Change contaminated clothing. Rub in high-fat content cream.

#### After contact with eyes

In case of contact with eyes, rinse immediately with plenty of water and seek medical advice.

#### After ingestion

If swallowed, immediately drink: Water. Consult physician.

## SECTION 5: Firefighting measures

### 5.1. Extinguishing media

#### Suitable extinguishing media

Atomized water. alcohol resistant foam. Carbon dioxide (CO<sub>2</sub>). Extinguishing powder. Sand.

#### Extinguishing media which must not be used for safety reasons

High power water jet.

### 5.2. Special hazards arising from the substance or mixture

Concentrated vapors are heavier than air. Vapours may form explosive mixtures with air.

### 5.3. Advice for firefighters

In case of fire: Wear self-contained breathing apparatus.

## SECTION 6: Accidental release measures

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

Keep away from sources of ignition - No smoking.

The following must be prevented: inhalation. skin contact. Eye contact.

### 6.2. Environmental precautions

Do not empty into drains or the aquatic environment.

### 6.3. Methods and material for containment and cleaning up

Absorb with liquid-binding material (e.g. sand, diatomaceous earth, acid- or universal binding agents).

## SECTION 7: Handling and storage

### 7.1. Precautions for safe handling

#### Advice on safe handling

Keep away from sources of ignition - No smoking. Provide adequate ventilation.

### 7.2. Conditions for safe storage, including any incompatibilities

#### Requirements for storage rooms and vessels

Keep container tightly closed in a cool, well-ventilated place.

Store only in original container.

## SECTION 8: Exposure controls/personal protection

### 8.1. Control parameters

#### Exposure limits (EH40)

CAS No	Substance	ppm	mg/m <sup>3</sup>	fibres/ml	Category	Origin
64-17-5	Ethanol	1000	1920		TWA (8 h)	WEL
		-	-		STEL (15 min)	WEL

### 8.2. Exposure controls



#### Protective and hygiene measures

When using do not eat or drink.

#### Respiratory protection

The following must be prevented: inhalation. Exceeding critical value: Filter respirator (full mask or mouth-piece) with filter: A

#### Hand protection

Tested protective gloves are to be worn: Suitable material: NBR (Nitrile rubber).

#### Eye protection

Tightly sealed safety glasses.

## SECTION 9: Physical and chemical properties

### 9.1. Information on basic physical and chemical properties

Physical state: liquid  
Colour: colourless-transparent  
Odour: characteristic

pH-Value:

#### Test method

neutral

#### Changes in the physical state

Melting point: ca. -115 °C  
Boiling point: ca. 80 °C  
Flash point: 12 °C

Lower explosion limits:	3.5 vol. %
Upper explosion limits:	15 vol. %
Ignition temperature:	425 °C
Vapour pressure:	
(at 20 °C)	59 hPa
Density (at 20 °C):	ca. 0,8 g/cm <sup>3</sup>
Water solubility:	complete miscible
Viscosity / dynamic:	
(at 20 °C)	1,3 mPa·s

## SECTION 10: Stability and reactivity

### 10.4. Conditions to avoid

heat.

### 10.5. Incompatible materials

Oxidizing agents. peroxides. acid. Alkali metals.

## SECTION 11: Toxicological information

### 11.1. Information on toxicological effects

#### Acute toxicity

Acute toxicity, oral LD50: (species: Rat.): > 6200 mg/kg; Acute toxicity, inhalant 95.6 mg / l / 4 h

CAS No	Chemical name				
	Exposure routes	Method	Dose	Species	Source
64-17-5	ethanol, ethyl alcohol				
	oral	LD50	6200 mg/kg	Rat	IUCLID
	inhalative (4 h) vapour	LC50	95,6 mg/l	Rat	RTECS

### Irritation and corrosivity

In case of prolonged or frequently repeated skin contact: irritant.; Following eye contact: irritant.

## SECTION 12: Ecological information

### 12.1. Toxicity

Acute fish toxicity (Leuciscus idus): LC50: > 8140 mg / l / 48 h (Ethanol);

Acute Daphnia toxicity (Daphnia magna): EC50: 9268 - 14221 mg / l / 48 h

CAS No	Chemical name					
	Aquatic toxicity	Method	Dose	h	Species	Source
64-17-5	ethanol, ethyl alcohol					
	Acute crustacea toxicity	EC50 mg/l	9268 - 14221	48	Daphnia magna	IUCLID

### 12.2. Persistence and degradability

Easily biodegradable (concerning to the criteria of the OECD)

### 12.3. Bioaccumulative potential

#### Partition coefficient n-octanol/water

CAS No	Chemical name	Log Pow
64-17-5	ethanol, ethyl alcohol	-0,31

## SECTION 13: Disposal considerations

### 13.1. Waste treatment methods

#### Advice on disposal

Remove according to the regulations.

#### Waste disposal number of waste from residues/unused products

180106 WASTES FROM HUMAN OR ANIMAL HEALTH CARE AND/OR RELATED RESEARCH (except kitchen and restaurant wastes not arising from immediate health care); wastes from natal care, diagnosis, treatment or prevention of disease in humans; chemicals consisting of or containing dangerous substances

Classified as hazardous waste.

## SECTION 14: Transport information

### Land transport (ADR/RID)

14.1. UN number:	1170
14.2. UN proper shipping name:	ETHANOL (ETHYL ALCOHOL)
14.3. Transport hazard class(es):	3
14.4. Packing group:	II
Hazard label:	3



Classification code:	F1
Special Provisions:	144 601
Limited quantity:	1 L
Transport category:	2
Hazard No:	33
Tunnel restriction code:	D/E

#### Other applicable information (land transport)

E2

### Marine transport (IMDG)

14.1. UN number:	1170
14.2. UN proper shipping name:	ETHANOL (ETHYL ALCOHOL)
14.3. Transport hazard class(es):	3

**14.4. Packing group:** II  
**Hazard label:** 3



**Special Provisions:** 144  
**Limited quantity:** 3 L  
**EmS:** F-E, S-D

**Other applicable information (marine transport)**

E2

**Air transport (ICAO)**

**14.1. UN number:** 1170  
**14.2. UN proper shipping name:** ETHANOL (ETHYL ALCOHOL)  
**14.3. Transport hazard class(es):** 3  
**14.4. Packing group:** II  
**Hazard label:** 3



**Special Provisions:** A3  
**Limited quantity Passenger:** 1 L  
**IATA-packing instructions - Passenger:** 353  
**IATA-max. quantity - Passenger:** 5 L  
**IATA-packing instructions - Cargo:** 364  
**IATA-max. quantity - Cargo:** 60 L

**Other applicable information (air transport)**

E2

: Y341

**14.5. Environmental hazards**

Dangerous for the environment: no

**SECTION 15: Regulatory information**

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

**National regulatory information**

**SECTION 16: Other information**

**Full text of R phrases referred to under Sections 2 and 3**

11 Highly flammable.

43 May cause sensitisation by skin contact.

**Full text of H statements referred to under Sections 2 and 3**

H225 Highly flammable liquid and vapour.

*(The data for the hazardous ingredients were taken respectively from the last version of the sub-contractor's safety data sheet.)*