

# MSDS

## MATERIAL SAFETY DATA SHEET

**Product: BAC CBD****Issue date: 18-04-2016**

### 1. IDENTIFICATION OF THE SUBSTANCE/MIXTURE AND OF THE COMPANY/UNDERTAKING

#### 1.1 Product identifiers

Product Name: (-)-Cannabidiol  
Other Name: CBD  
CAS Number: 13956-29-1  
IUPAC Name: 2-[(1R,6R)-3-Methyl-6-(1-methylethenyl)-2-cyclohexen-1-yl]-5-pentyl-1,3-benzenediol

#### 1.2 Relevant identified uses of the substance

or mixture and uses advised against

Identified Uses: Laboratory chemicals, Manufacture of substances

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

Company: BG Products B.V.  
Edisonstraat 16N  
2809 PB, Gouda, The Netherlands  
Telephone: +31 (0) 182 687530  
E-mail address: info@baconline.nl

### 2. HAZARDS IDENTIFICATION

#### 2.1 Classification of the substance or mixture

This substance does not meet the classification criteria of the EC Directives 67/548/EEC, 1999/45/EC or 1272/2008.

#### 2.2 Label elements

This substance does not meet the classification criteria of the EC Directives 67/548/EEC, 1999/45/EC or 1272/2008.

#### 2.3 Other hazards

none

### 3. COMPOSITION/INFORMATION ON INGREDIENTS

#### 3.1 Substances

Product Name: Cannabidiol  
Synonyms: CBD  
Formula: C<sub>21</sub>H<sub>30</sub>O<sub>2</sub>  
Molecular Weight: 314.47

### 4. FIRST AID MEASURES

#### 4.1 Description of first aid measures

General advice: Consult a doctor and show this safety data sheet.  
If inhaled: Remove to fresh air and monitor breathing. If breathing becomes difficult, give oxygen. If breathing stops, give artificial respiration.

Consult a doctor: In case of skin contact  
Immediately wash skin with copious amounts of soap and water for at least 15 minutes. Remove contaminated clothing and shoes and wash before reuse.  
Consult a doctor.

In case of eye contact: Flush with copious amounts of water for at least 15 minutes. Consult a doctor.  
If swallowed: Rinse mouth with water. Do not induce vomiting unless directed to do so by medical personnel. Never give anything by mouth to an unconscious person.  
Consult a doctor.

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

To the best of our knowledge, the chemical, physical and toxicological properties have not been thoroughly investigated.

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

Show this safety data sheet to the doctor in attendance. Immediate medical attention is required.

## 5. FIRE-FIGHTING MEASURES

- |   |                              |   |
|---|------------------------------|---|
| 5.1 Extinguishing media                                   | Suitable extinguishing media | Use water spray, alcohol-resistant foam, dry chemical or carbon dioxide.  |
| 5.2 Special hazards arising from the substance or mixture |                              | In combustion, may emit toxic fumes.  |
| 5.3 Precautions for fire-fighters                         |                              | Wear suitable protective clothing to prevent contact with skin and eyes and self-contained breathing apparatus. |

## 6. ACCIDENTAL RELEASE MEASURES

- |   |  |  |
|---|--|--|
| 6.1 Personal precautions, protective equipment and emergency procedures |  | Do not take action without suitable protective clothing - see section 8 of MSDS. Evacuate personnel to safe areas. Ensure adequate ventilation. Avoid breathing vapors, mist, dust or gas.   |
| 6.2 Environmental precautions   |  | Do not let product enter drains.   |
| 6.3 Methods and materials for containment and cleaning up               |  | Cover spillage with suitable absorbent material. Using non-spark tools, sweep up material and place in an appropriate container. Decontaminate spill site with 10% caustic solution and ventilate area until after disposal is complete. Hold all material for appropriate disposal as described under section 13 of MSDS. |
| 6.4 Reference to other sections   |  | For required PPE see section 8. For disposal see section 13.   |

## 7. HANDLING AND STORAGE

- |   |  |   |
|---|--|---|
| 7.1 Precautions for safe handling                                 |  | Use in a chemical fume hood, with air supplied by an independent system. Avoid inhalation, contact with eyes, skin and clothing. Avoid the formation of dust and aerosols. Use in a well-ventilated area. Keep away from sources of ignition. Avoid prolonged or repeated exposure. |
| 7.2 Conditions for safe storage, including any incompatibilities. |  | Store in cool, well-ventilated area. Keep away from direct sunlight. Keep container tightly sealed until ready for use. Recommended storage temperature: Store at -20C  |
| 7.3 Specific end uses   |  | Use in a laboratory fume hood where possible. Refer to employer's COSHH risk assessment.  |

## 8. EXPOSURE CONTROLS/PERSONAL PROTECTION

- |                                   |  |  |
|-----------------------------------|--|--|
| 8.1 Control parameters            |  | Components with workplace control parameters<br>Contains no substances with occupational exposure limit values.  |
| 8.2 Exposure controls             |  | Appropriate engineering controls<br>Use in a fume hood where applicable. Ensure all engineering measures described under section 7 of MSDS are in place. Ensure laboratory is equipped with a safety shower and eye wash station.  |
| 8.3 Personal protective equipment |  | Eye/face protection<br>Use appropriate safety glasses.<br>Skin protection<br>Use appropriate chemical resistant gloves (minimum requirement use standard BS EN 374:2003). Gloves should be inspected before use. Wash and dry hands thoroughly after handling.<br>Body protection<br>Wear appropriate protective clothing.<br>Respiratory protection<br>If risk assessment indicates necessary, use a suitable respirator. |

## 9. PHYSICAL AND CHEMICAL PROPERTIES

- |   |  |  |
|---|--|--|
| 9.1 Information on basic physical and chemical properties |  |  |
| Appearance  |  | White solid                                      |
| Vapor pressure/ density                                   |  | No data available                                |
| Odor  |  | No data available                                |
| Relative density  |  | No data available                                |
| Odor threshold  |  | No data available                                |
| Solubility(ies)   |  | Soluble to 75 mM in ethanol and to 75 mM in DMSO |
| pH  |  | Does not apply                                   |

Partition coefficient	No data available
Melting point	66°C (151 °F)
Auto-ignition temperature	No data available
Boiling point / range	No data available
Decomposition temperature	No data available
Flash point	206°C
Viscosity	Does not apply
Flammability (sol)	No data available
Explosive properties	No data available
Upper / lower flammability or explosive limits	No data available
Oxidizing properties	No data available
9.2 Other safety information	No data available

## 10. STABILITY AND REACTIVITY

10.1 Reactivity	Stable under recommended transport or storage conditions.
10.2 Chemical stability	Stable under recommended transport or storage conditions.
10.3 Possibility of hazardous reactions	Hazardous reactions will not occur under normal transport or storage conditions. Decomposition may occur on exposure to conditions or materials listed below.
10.4 Conditions to avoid	Heat, moisture.
10.5 Incompatible materials	Strong acids/alkalis, strong oxidizing/reducing agents.
10.6 Hazardous decomposition products	In combustion may emit toxic fumes. No known decomposition information.

## 11. TOXICOLOGICAL INFORMATION

11.1 Information on toxicological effects	
Acute Toxicity	IVN-MUS LDSO: 50mg/kg; IVN-DOG LDSO: >2S4mg/kg; IVN-MKY LDSO: 212mg/kg; ORL-MKY TDL: 27gm/kg; ORL-MUS TDL: 7S0mg/kg
Skin corrosion/irritation	Classification criteria are not met based on available data
Serious eye damage/irritation	Classification criteria are not met based on available data
Respiratory or skin sensitization	Classification criteria are not met based on available data
Germ cell mutagenicity	Classification criteria are not met based on available data
Carcinogenicity	Classification criteria are not met based on available data
Reproductive toxicity	Classification criteria are not met based on available data
Specific target organ toxicity - single exposure	Classification criteria are not met based on available data
Specific target organ toxicity - repeated exposure	Classification criteria are not met based on available data
Aspiration hazard	Classification criteria are not met based on available data
Symptoms / Routes of exposure	
Inhalation:	There may be irritation of the throat with a feeling of tightness in the chest.
Ingestion:	There may be irritation of the throat.
Skin:	There may be mild irritation at the site of contact.
Eyes:	There may be irritation and redness.
Delayed / Immediate Effects:	No known symptoms.
Additional Information	RTECS No: VH1600000 Exposure may cause irritation of eyes, mucous membranes, upper respiratory tract and skin. To the best of our knowledge, the chemical, physical and toxicological properties have not been fully investigated

## 12. ECOLOGICAL INFORMATION

12.1 Toxicity	No data available
12.2 Persistence and degradability	No data available
12.3 Bio-accumulative potential	No data available
12.4 Mobility in soil	No data available
12.5 Results of PBT and vPvB assessment	No data available
12.6 Other adverse effects	May be harmful to the aquatic environment.

**13. DISPOSAL CONSIDERATIONS**

## 13.1 Waste treatment methods

Product

Transfer to a suitable container and arrange for collection by specialized disposal company in accordance with National legislation

## 13.2 Contaminated packaging

Dispose of in a regulated landfill site or other method for hazardous or toxic wastes in accordance with National legislation.

**14. TRANSPORT INFORMATION**

Classified according to the criteria of the UN Model Regulations as reflected in the IMDG Code, ADR, RID and IATA.

## 14.1 UN-Number

No criteria for

## 14.2 UN proper shipping name

No criteria for

## 14.3 Transport hazard class(es)

No criteria for

## 14.4 Packaging group

No criteria for

## 14.5 Environmental hazards

This product is not classified as environmentally hazardous according to the UN Model Regulations, nor a marine pollutant according to the IMDG Code.

## 14.6 Special precautions for users

No data available

**15. REGULATORY INFORMATION**

This material safety data sheet complies with the Regulation(EC) No 1907/2006 as amended by Regulation (EU) No 453/2010

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

No data available

## 15.2 Chemical safety assessment

A Chemical Safety Assessment has not been made for this product.

**16. OTHER INFORMATION**

## Further Information

The above information is believed to be correct but does not purport to be all inclusive and should be used as a guide only for experienced personnel. Always consult your safety advisor and follow appropriate local and national safety legislature. The absence of warning must not, under any circumstance, be taken to mean that no hazard exists.