



## CERTIFICATE OF ANALYSIS

**Product:** Cocamidopropyl Betaine  
**Best Before Date:** March 2027  
**Batch No.:** 4535810

| Active matter             | %     | 29.0 – 31.0 |
|---------------------------|-------|-------------|
| Free amido amine          | %     | ≤ 0.5       |
| Sodium chloride           | %     | ≤ 6.0       |
| pH (10% aqueous solution) |       | 4.5 – 6.0   |
| Sodium monochloroacetate  | mg/kg | ≤ 20        |
| Colour                    | APHA  | ≤ 80        |
| Free amine                | %     | ≤ 0.5       |

### Additional information

Appearance at 25°C Colour  
Odour  
Density at 25°C

Liquid  
Colourless to yellowish clear liquid Nearly odour  
free  
1.05 g/cm<sup>3</sup>

This grade is a high quality product which has very low levels of impurities therefore reducing the potential for irritation.

Cocamidopropyl Betaine is a mild amphoteric surfactant which has excellent synergistic effects when combined with other surfactants, meanwhile reducing the irritating effects of other surfactants.

Cocamidopropyl Betaine will contribute a fine, stable and rich foam with high thickening.



Issue 19.07.21

## ALLERGEN DECLARATION

### Product: Cocamidopropyl Betaine

| <b>COSMETIC ALLERGENS</b>                                                                                      |                                                 |                   |                                   |
|----------------------------------------------------------------------------------------------------------------|-------------------------------------------------|-------------------|-----------------------------------|
| The following is from the 7 <sup>th</sup> amendment of the cosmetic directive of the European Union Annex iii. |                                                 |                   |                                   |
| <b>Annex IIIa reference</b>                                                                                    |                                                 | <b>CAS Number</b> | <b>Total Allergen Inclusion %</b> |
| 67                                                                                                             | Amyl cinnamal                                   | 122-40-7          | 0.00                              |
| 68                                                                                                             | Benzyl alcohol                                  | 100-51-6          | 0.00                              |
| 69                                                                                                             | Cinnamyl alcohol                                | 104-54-1          | 0.00                              |
| 70                                                                                                             | Citral                                          | 5392-40-5         | 0.00                              |
| 71                                                                                                             | Eugenol                                         | 97-53-0           | 0.00                              |
| 72                                                                                                             | Hydroxy-citronellal                             | 107-75-5          | 0.00                              |
| 73                                                                                                             | Isoeugenol                                      | 97-54-1           | 0.00                              |
| 74                                                                                                             | Amylcin-namyl alcohol                           | 101-85-9          | 0.00                              |
| 75                                                                                                             | Benzyl salicylate                               | 118-58-1          | 0.00                              |
| 76                                                                                                             | Cinnamal                                        | 104-55-2          | 0.00                              |
| 77                                                                                                             | Coumarin                                        | 91-64-5           | 0.00                              |
| 78                                                                                                             | Geraniol                                        | 106-24-1          | 0.00                              |
| 79                                                                                                             | Hydroxy-methylpentylcyclohexenecarboxaldehyd    | 31906-04-4        | 0.00                              |
| 80                                                                                                             | Anisyl alcohol                                  | 105-13-5          | 0.00                              |
| 81                                                                                                             | Benzyl cinnamate                                | 103-41-3          | 0.00                              |
| 82                                                                                                             | Farnesol                                        | 4602-84-0         | 0.00                              |
| 83                                                                                                             | Butylphenyl Methylpropanol                      | 80-54-6           | 0.00                              |
| 84                                                                                                             | Linalool                                        | 78-70-6           | 0.00                              |
| 85                                                                                                             | Benzyl benzoate                                 | 120-51-4          | 0.00                              |
| 86                                                                                                             | Citronellol                                     | 106-22-9          | 0.00                              |
| 87                                                                                                             | Hexyl cinnam-aldehyd                            | 101-86-0          | 0.00                              |
| 88                                                                                                             | Limonene                                        | 5989-27-5         | 0.00                              |
| 89                                                                                                             | Methyl heptin carbonate                         | 111-12-6          | 0.00                              |
| 90                                                                                                             | Alpha-Isomethyl Ionone                          | 127-51-5          | 0.00                              |
| 91                                                                                                             | Oak Moss Extracts (Evernia Prunastri Extract)   | 90028-68-5        | 0.00                              |
| 92                                                                                                             | Tree Moss Extracts (Evernia Furfuracea extract) | 90028-67-4        | 0.00                              |



## MANUFACTURING FLOW CHART

### 1.1 PRODUCT NAME:

Cocamidopropyl Betaine

### Synonyms:

C8-18 (even numbered) Alkylamidopropyl Betaine,

Cocamidopropyl Betaine,

C8-18-AAPB

### INCI name:

1-Propanaminium, 3-amino-N-(carboxymethyl)-N,N-dimethyl-, N-C8- 18 acyl derivs.,hydroxides, inner salts

### REACH Registered No.

01-2119488533-30-XXXX

CAS No. 1314-13-2

EC No. 931-296-8

Madar Corporation Limited Cocamidopropyl Betaine is an amphoteric surfactant of variable composition and is the reaction product of cocoamidopropylamine (CAPA) and monochloroacetic acid (MCA). The reaction occurs in the presence of water and sodium hydroxide as shown in Figure 1. This product is synthesised from CAPA, whose formation from hydrogenated coconut oil and dimethylaminopropylamine (DMAPA) is shown in Figure 2. As the product is derived from coconut oil a mixture of alkylamidopropyl betaines of differing alkyl chain lengths is produced. The alkylamidopropyl betaines of all lengths are referred to collectively as cocoamidopropyl betaine.

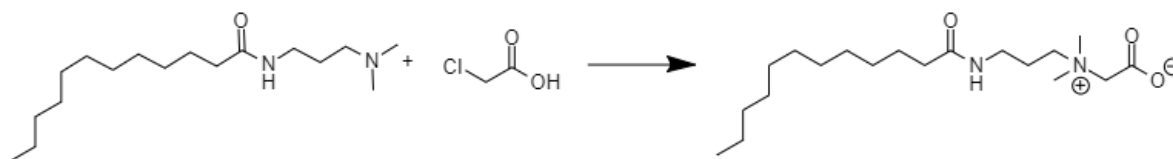


Figure 1: Reaction scheme for the production of C8-C18 alkylamidopropyl betaine from alkylamidopropylamine and chloroacetic acid using the C12 chain length as an example. This reaction occurs in the presence of water and sodium hydroxide.

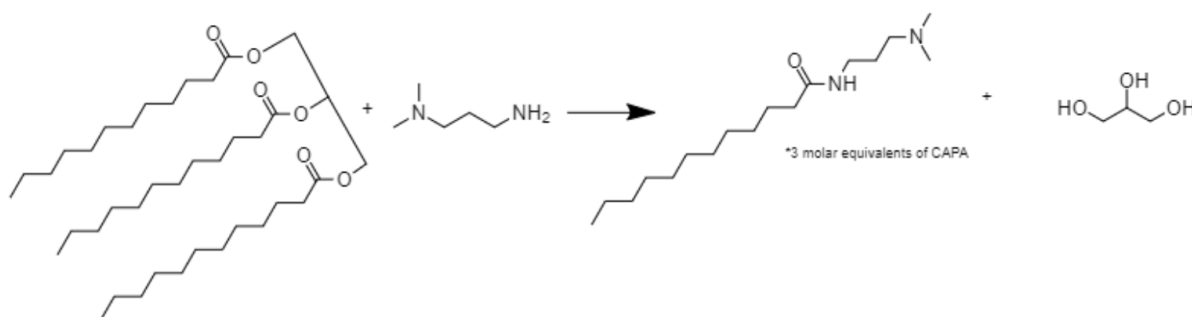


Figure 2: Reaction scheme for the production of cocoamidopropylamine (CAPA) from triglyceride (oil) and DMAPA using the C12 chain length as an example.

Other components of Madar Corporation Limited Cocamidopropyl Betaine include low level residual raw materials MCA, dichloroacetic acid (DCA), which is present at low levels in the MCA as a raw material and DMAPA. Furthermore, the intermediate CAPA and glycerol, the by-product from the creation of CAPA, are present in the final formulation. Sodium Benzoate is added 0.3% active as a preservative.



## **GMO STATEMENT**

**Product: Cocamidopropyl Betaine**

Cocamidopropyl Betaine which is supplied by Madar Corporation Limited is manufactured from petrochemical raw materials exclusively, using no materials of animal or vegetable origin. No gluten-containing raw materials or processing aids are used in the manufacture of Cocamidopropyl Betaine. Cocamidopropyl Betaine does not contain any GMO (Genetically Modified Organism) material and do not contain detectable levels of genetically modified materials, (known as PCR negative).

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Cocamidopropyl Betaine

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## 1. IDENTIFICATION OF THE SUBSTANCE/PREPARATION AND COMPANY NAME

### 1.1 PRODUCT NAME:

Cocamidopropyl Betaine

### Synonyms:

C8-18 (even numbered) alkylamidopropyl betaine, Cocamidopropyl Betaine, C8-18-AAPB

### INCI name:

1-Propanaminium, 3-amino-N-(carboxymethyl)-N,N-dimethyl-, N-C8- 18 acyl derivs.,hydroxides, inner salts

### REACH Registered No.

01-2119488533-30-XXXX

### REACH registration notes:

UK REACH Registration number UK-01-5359967481-8-0006 All substances contained in this preparation have already been registered by the supplier or further up our supply chain by our raw materials suppliers or they are exempt from registration.

**CAS No.** 97862-59-4

**EC No.** 931-296-8

**1.2 RELEVANT IDENTIFIED USES OF THE SUBSTANCE OR MIXTURE AND USES ADVISED AGAINST:** Amphoteric surfactant)

### 1.3 DETAILS OF THE SUPPLIER:

Madar Corporation Limited

19 - 20 Sandleheath Industrial Estate

Fordingbridge

SP6 1PA

Tel. +44 (0)1425 655 555

e-mail: [technical@madarcorporation.co.uk](mailto:technical@madarcorporation.co.uk)

## 2. HAZARDS IDENTIFICATION

### 2.1. CLASSIFICATION OF THE SUBSTANCE OR MIXTURE:

**Physical hazards:** Not Classified

**Health hazards:** Eye Dam. 1 - H318

**Environmental hazards:** Aquatic Chronic 3 - H412.

**Adverse physiochemical, human health and environmental effects**

No additional information available.

### 2.2. LABEL ELEMENTS:

**Labelling according to Regulation (EC) No 1272/2008:**

**Ec No.:** 931-296-8

**Hazard pictograms (CLP):**

GHS04



**Signal word (CLP):** Danger



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**Hazard statements :**

H318 Causes serious eye damage.  
H412 Harmful to aquatic life with long lasting effects.

**Precautionary statements**

P273 Avoid release to the environment.  
P280 Wear protective gloves/ protective clothing/ eye protection/ face protection.  
P305+P351+P338 IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing.  
P310 Immediately call a POISON CENTER/ doctor.  
P501 Dispose of contents/ container in accordance with national regulations.

**Contains**

1-Propanaminium, 3-amino-N-(carboxymethyl)-N,N-dimethyl-, N-C8- 18 acyl derivs., hydroxides, inner salts

**3. COMPOSITION/INFORMATION ON INGREDIENTS**

**3.1. SUBSTANCES:**

1-Propanaminium, 3-amino-N-(carboxymethyl)-N,N-dimethyl-, N-C8- 18 acyl derivs., hydroxides, inner salts  
30-60%

**CAS No:**

97862-59-4

**Classification:**

Eye Dam. 1 - H318  
Aquatic Chronic 3 - H412

**4. FIRST AID MEASURES**

**4.1. DESCRIPTION OF FIRST AID MEASURES:**

**General advice:**

Consult a physician for specific advice. Chemical burns must be treated by a physician. Get medical attention if any discomfort continues. Show this Safety Data Sheet to the medical personnel. Treat symptomatically. First aid personnel should wear appropriate protective equipment during any rescue

**Inhalation:**

Unlikely route of exposure as the product does not contain volatile substances. Get medical attention if symptoms are severe or persist. Consult a physician for specific advice. Show this Safety Data Sheet to the medical personnel.

**Skin contact:**

IF ON SKIN (or hair): Get medical attention promptly if symptoms occur after washing. Show this Safety Data Sheet to the medical personnel.

**Eye contact:**

IF IN EYES: Get medical attention immediately. May cause permanent damage if eye is not immediately irrigated. Show this Safety Data Sheet to the medical personnel. If liquid has entered the eyes, proceed as follows. Rinse immediately with plenty of water. Remove contact lenses, if present and easy to do. Continue rinsing. Continue to rinse for at least 15 minutes and get medical attention.

**If swallowed:**

IF SWALLOWED: Get medical attention immediately. Rinse mouth thoroughly with water. Consult a physician for specific advice. Show this Safety Data Sheet to the medical personnel.

**Protection of first aiders:**

First aid personnel should wear appropriate protective equipment during any rescue.



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#### **4.2. MOST IMPORTANT SYMPTOMS AND EFFECTS, BOTH ACUTE AND DELAYED:**

##### **General information:**

See Section 11 for additional information on health hazards. Treat symptomatically.

##### **Inhalation:**

Unlikely to be hazardous by inhalation because of the low vapour pressure of the product at ambient temperature.

##### **Ingestion:**

May cause discomfort if swallowed. The product is considered to be a low hazard under normal conditions of use.

##### **Skin contact:**

Skin irritation should not occur when used as recommended. May be slightly irritating to skin.

##### **Eye contact:**

Causes serious eye damage. Irritation of eyes and mucous membranes. Severe irritation, burning, tearing and blurred vision.

#### **4.3. INDICATION OF ANY IMMEDIATE MEDICAL ATTENTION AND SPECIAL TREATMENT NEEDED:**

##### **Notes for doctor:**

Treat symptomatically.

##### **Specific treatments:**

Treat symptomatically.

#### **5. FIRE FIGHTING MEASURES**

##### **5.1. EXTINGUISHING MEDIA:**

###### **Suitable extinguishing media:**

Water spray, fog or mist. Use fire-extinguishing media suitable for the surrounding fire. The product is not flammable. The product is non-combustible.

###### **Unsuitable extinguishing media**

None known.

##### **5.2. SPECIAL HAZARDS ARISING FROM THE SUBSTANCE OR MIXTURE:**

###### **Specific hazards:**

In case of fire: Containers can burst violently or explode when heated, due to excessive pressure build-up.

###### **Hazardous Combustion products:**

Carbon monoxide (CO). Oxides of carbon. Oxides of nitrogen. Nitrous gases (NO<sub>x</sub>).

##### **5.3. ADVICE FOR FIREFIGHTERS:**

###### **Protective actions during firefighting:**

In case of fire: Stop leak if safe to do so. Cool containers exposed to heat with water spray and remove them from the fire area if it can be done without risk. Contain and collect extinguishing water. Control run-off water by containing and keeping it out of sewers and watercourses. If risk of water pollution occurs, notify appropriate authorities.

###### **Special protective equipment for firefighters:**

Wear positive-pressure self-contained breathing apparatus (SCBA) and appropriate protective clothing. Use protective equipment appropriate for surrounding materials.





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## **6. ACCIDENTAL RELEASE MEASURES**

### **6.1.PERSONAL PRECAUTIONS, PROTECTIVE EQUIPMENT AND EMERGENCY PROCEDURES:**

#### **Personal precautions:**

Ensure procedures and training for emergency decontamination and disposal are in place. No action shall be taken without appropriate training or involving any personal risk. Keep unnecessary and unprotected personnel away from the spillage. Do not touch or walk into spilled material. Avoid contact with skin and eyes. Wear protective clothing as described in Section 8 of this safety data sheet. Take care as floors and other surfaces may become slippery. Do not handle broken packages without protective equipment. Treat the spilled material according to the instructions in the clean-up section. Wash thoroughly after dealing with a spillage.

#### **For non-emergency personnel:**

Keep unnecessary and unprotected personnel away from the spillage.

#### **For emergency responders:**

No information available.

### **6.2. ENVIRONMENTAL PRECAUTIONS:**

#### **Environmental precautions:**

May cause long lasting harmful effects to aquatic life.

### **6.3. METHODS AND MATERIALS FOR CONTAINMENT AND CLEANING UP:**

#### **Methods for cleaning up:**

When handling waste, the safety precautions applying to handling of the product should be considered. Stop leak if safe to do so. To prevent release, place container with damaged side up. Do not touch or walk into spilled material. Take care as floors and other surfaces may become slippery. Small Spillages: Wipe up with an absorbent cloth and dispose of waste safely. Collect and place in suitable waste disposal containers and seal securely. Containers with collected spillage must be properly labelled with correct contents and hazard symbol. The requirements of the local water authority must be complied with if contaminated water is flushed directly to the sewer. Residues and empty containers should be taken care of as hazardous waste according to local and national provisions. Dispose of waste to licensed waste disposal site in accordance with the requirements of the local Waste Disposal Authority. For waste disposal, see Section 13.

### **6.4. REFERENCE TO OTHER SECTIONS:**

For personal protection, see Section 8. See Section 11 for additional information on health hazards. See Section 12 for additional information on ecological hazards. Collect and dispose of spillage as indicated in Section 13.

## **7. HANDLING AND STORAGE**

### **7.1. PRECAUTIONS FOR SAFE HANDLING:**

#### **Usage precautions:**

For use in industrial installations or professional treatment only. Acquisition, possession or use by the general public is restricted. Do not handle until all safety precautions have been read and understood. For personal protection, see Section 8. Eye wash facilities and emergency shower must be available when handling this product. Good personal hygiene procedures should be implemented.

#### **Advice on general occupational hygiene:**

Do not eat, drink or smoke when using this product. Eye wash facilities and emergency shower must be available when handling this product. Good personal hygiene procedures should be implemented. Wash contaminated skin thoroughly after handling. Change work clothing daily before leaving workplace.

### **7.2.CONDITIONS FOR SAFE STORAGE, INCLUDING ANY INCOMPATIBILITIES:**

#### **Storage precautions:**

Refer to the "storage and shelf life information" in the product specification for storage advice. Protect from freezing and direct sunlight. Protect containers from damage. Keep away from food, drink and animal feeding stuffs.



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**Storage class:**

No information available.

**7.3. SPECIFIC END USES:**

The identified uses for this product are detailed in Section 1.2.

**8. EXPOSURE CONTROLS/PERSONAL PROTECTION**

**8.1. CONTROL PARAMETERS**

**Occupational exposure limits:**

No information available.

**Ingredient comments:**

No information available.

**Biological limit values:**

No information available.

**DNEL:**

No information available.

**DMEL:**

No information available.

**PNEC:**

No information available.

**8.2. EXPOSURE CONTROLS:**

**Appropriate engineering controls:**

Observe any occupational exposure limits for the product or ingredients. Use process enclosures, local exhaust ventilation or other engineering controls as the primary means to minimise worker exposure.

**Personal protective equipment:**

The following recommendations are made based on information available for the major chemical component.

**Eye/face protection:**

Eyewear complying with an approved standard should be worn if a risk assessment indicates eye contact is possible. Wear tight-fitting, chemical splash goggles or face shield. Personal protective equipment for eye and face protection should comply with European Standard EN166.

**Hand protection:**

The breakthrough time for any glove material may be different for different glove manufacturers. When used with mixtures, the protection time of gloves cannot be accurately estimated. Chemical-resistant, impervious gloves complying with an approved standard should be worn if a risk assessment indicates skin contact is possible. The most suitable glove should be chosen in consultation with the glove supplier/manufacturer, who can provide information about the breakthrough time of the glove material. Specific work environments and material handling practices may vary, therefore safety procedures should be developed for each intended application. Considering the data specified by the glove manufacturer, check during use that the gloves are retaining their protective properties and change them as soon as any deterioration is detected. Frequent changes are recommended. To protect hands from chemicals, gloves should comply with European Standard EN374.

**Other skin and body protection:**

Wear protective clothing. **Lubrisolve Engineering Solutions Ltd**

**Units 1 - 3 Downslade Business Units, Downslade Lane, Upton, Long Sutton, Somerset TA10 9NY**

**Telephone: +44(0)1458-241241 E-mail: enquiries@lubrisolve.co.uk**



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**Hygiene measures:**

Good personal hygiene procedures should be implemented. Wash hands thoroughly after handling. Wash promptly if skin becomes contaminated. Remove contaminated clothing and protective equipment before entering eating areas. Remove contaminated clothing and wash the skin thoroughly with soap and water after work. Wash at the end of each work shift and before eating, smoking and using the toilet. Do not eat, drink or smoke when using this product. Eye wash facilities and emergency shower must be available when handling this product.

**Respiratory protection:**

Use approved respirator if air contamination is above an acceptable level. No specific requirements are anticipated under normal conditions of use.

**Thermal hazards:**

No specific requirements are anticipated under normal conditions of use.

**Environmental exposure controls:**

Emissions from ventilation or work process equipment should be checked to ensure they comply with the requirements of environmental protection legislation. Store in a demarcated bunded area to prevent release to drains and/or watercourses. Residues and empty containers should be taken care of as hazardous waste according to local and national provisions.

**9. PHYSICAL AND CHEMICAL PROPERTIES**

**9.1. INFORMATION ON BASIC PHYSICAL AND CHEMICAL PROPERTIES:**

|                                                      |                                                             |
|------------------------------------------------------|-------------------------------------------------------------|
| <b>Physical state:</b>                               | Liquid                                                      |
| <b>Appearance:</b>                                   | Clear liquid                                                |
| <b>Colour:</b>                                       | No information available.                                   |
| <b>Odour:</b>                                        | No information available.                                   |
| <b>Odour threshold:</b>                              | No information available.                                   |
| <b>pH:</b>                                           | pH (concentrated solution): 4.5 – 5.5                       |
| <b>Melting point/freezing point:</b>                 | No information available.                                   |
| <b>Initial boiling point and boiling range:</b>      | No information available.                                   |
| <b>Flash point:</b>                                  | No information available.                                   |
| <b>Evaporation rate:</b>                             | No information available.                                   |
| <b>Evaporation Factor:</b>                           | No information available.                                   |
| <b>Flammability (solid, gas):</b>                    | No information available.                                   |
| <b>Upper/lower flammability or explosive limits:</b> | No information available.                                   |
| <b>Other flammability:</b>                           | No information available.                                   |
| <b>Vapour pressure:</b>                              | No information available.                                   |
| <b>Vapour density:</b>                               | No information available.                                   |
| <b>Relative density:</b>                             | 1.05 @ 25°C                                                 |
| <b>Bulk density:</b>                                 | No information available.                                   |
| <b>Solubility(ies):</b>                              | No information available.                                   |
| <b>Partition coefficient:</b>                        | Log Kow: 4.232                                              |
| <b>Auto-ignition temperature:</b>                    | No information available.                                   |
| <b>Decomposition temperature:</b>                    | No information available.                                   |
| <b>Viscosity:</b>                                    | No information available.                                   |
| <b>Explosive properties:</b>                         | No information available.                                   |
| <b>Explosive under the influence of A flame:</b>     | Not considered to be explosive.                             |
| <b>Oxidising properties:</b>                         | Does not meet the criteria for classification as oxidising. |
| <b>Comments:</b>                                     | No information available.                                   |

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## 9.2 OTHER INFORMATION:

|                            |                           |
|----------------------------|---------------------------|
| <b>Other information:</b>  | No information available. |
| Refractive index:          | No information available. |
| Particle size:             | No information available. |
| Molecular weight:          | No information available. |
| Volatility:                | No information available. |
| Saturation concentration:  | No information available. |
| Critical temperature:      | No information available. |
| Volatile organic compound: | No information available. |

## 10. STABILITY AND REACTIVITY

### 10.1. REACTIVITY:

There are no known reactivity hazards associated with this product.

### 10.2. CHEMICAL STABILITY:

Stable at normal ambient temperatures and when used as recommended. Refer to the "storage and shelf life information" in the product specification for storage advice. Contents may develop pressure upon prolonged storage.

### 10.3. POSSIBILITY OF HAZARDOUS REACTIONS:

No potentially hazardous reactions known.

### 10.4. CONDITIONS TO AVOID:

Containers can burst violently or explode when heated, due to excessive pressure build-up. Avoid freezing. No specific requirements are anticipated under normal conditions of use.

### 10.5. INCOMPATIBLE MATERIALS:

Strong acids. Strong alkalis

### 10.6. HAZARDOUS DECOMPOSITION PRODUCTS:

Does not decompose when used and stored as recommended.

## 11. TOXICOLOGICAL INFORMATION

### 11.1. INFORMATION ON TOXICOLOGICAL EFFECTS:

|                                     |                                                                               |
|-------------------------------------|-------------------------------------------------------------------------------|
| <b>Other health effects:</b>        | No information available.                                                     |
| <b>Toxicological effects:</b>       | Information given is based on data of the components and of similar products. |
| <b>Acute toxicity - oral:</b>       | LD <sub>50</sub> 2335 mg/kg, Oral, Rat.                                       |
| <b>Acute toxicity - dermal:</b>     | LD <sub>50</sub> >2000 mg/kg, Dermal, Rat.                                    |
| <b>Acute toxicity – inhalation:</b> | No information available.                                                     |

### Skin corrosion/irritation

|                                       |                                                                   |
|---------------------------------------|-------------------------------------------------------------------|
| <b>Skin corrosion/irritation:</b>     | Rabbit not irritating.                                            |
| <b>Animal data:</b>                   | No information available.                                         |
| <b>Human skin model test:</b>         | No information available.                                         |
| <b>Extreme pH:</b>                    | No information available.                                         |
| <b>Serious eye damage/irritation:</b> | Rabbits Causes serious eye damage.                                |
| <b>Respiratory sensitisation:</b>     | No information available.                                         |
| <b>Skin sensitisation:</b>            | Guinea pig maximization test (GPMT) - Guinea pig: Not sensitising |

### Germ cell mutagenicity:

|                                 |                               |
|---------------------------------|-------------------------------|
| <b>Genotoxicity - in vitro:</b> | Gene mutation: Negative       |
| <b>Genotoxicity - in vivo</b>   | Micronucleus assay: Negative. |

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**Carcinogenicity:**

**Carcinogenicity:** No information available.  
**Target organ for carcinogenicity:** No information available.  
**IARC carcinogenicity:** No information available.  
**NTP carcinogenicity:** No information available.

**Reproductive toxicity:**

**Reproductive toxicity – fertility:** Fertility - NOAEL 247 mg/kg, Oral, Rat.  
**Reproductive toxicity – development:** - NOAEL: 1000 mg/kg, Oral.

**Specific target organ toxicity - single exposure:**

**STOT – single exposure:** No information available.  
**Target organs:** No information available.

**Aspiration hazard:**

**Aspiration hazard:** No information available.  
**Toxicokinetics:** No information available.  
**General information:** No information available.  
**Inhalation:** No information available.  
**Ingestion:** No information available.  
**Skin contact:** No information available.  
**Eye contact:** No information available.  
**Acute and chronic health hazards:** No information available.  
**Route of exposure:** No information available.  
**Target organs:** No information available.  
**Medical symptoms:** No information available.  
**Medical considerations:** No information available.

**12. ECOLOGICAL INFORMATION**

**Eco toxicity:** May cause long lasting harmful effects to aquatic life.

**12.1. TOXICITY**

**Toxicity:** No information available.

**Acute aquatic toxicity**

**Acute toxicity - fish:** LC<sub>50</sub>, 96 hours: 1.11 mg/l, Pimephales promelas (Fat-head Minnow) Read-across data.  
**Acute toxicity - aquatic invertebrates:** EC<sub>50</sub>, LC<sub>50</sub>, 48 hours: 1.9 mg/l, Daphnia magna  
 LC<sub>50</sub>, EC<sub>50</sub>, 48 hours: 7 mg/l, Marinewater invertebrates  
**Acute toxicity - aquatic plants:** No information available.  
**Acute toxicity – microorganisms:** No information available.  
**Acute toxicity – terrestrial:** No information available.

**Chronic aquatic toxicity**

**Chronic toxicity - fish early life stage:** EC10, LC10, NOEC, 100 days: 0.135 mg/l, Oncorhynchus mykiss (Rainbow trout)  
**Short term toxicity - embryo and sac fry stages:** No information available.  
**Chronic toxicity - aquatic invertebrates:** No information available.  
**Toxicity to soil:** No information available.

**Toxicity to terrestrial plants:** No information available.

**12.2. PERSISTENCE AND DEGRADABILITY:**

**Persistence and degradability:** No information available.

**Phototransformation:** No information available.

**Stability (hydrolysis):** Calculation method.

Air

- Half-life : 9 hours @ °C 9/ 14

**Biodegradation:** Activated sludge - Degradation 91.6: 28 days.  
The substance is readily biodegradable.

**Biological oxygen demand:** No information available.

**Chemical oxygen demand:** No information available.

**12.3. BIOACCUMULATIVE POTENTIAL:**

**Bioaccumulative potential** Based on available data the classification criteria are not met.  
Bioaccumulation is unlikely.  
log Kow: 4.232

**Partition coefficient**

**12.4. MOBILITY IN SOIL**

**Mobility:** No information available.

**Adsorption/desorption coefficient:** No information available.

**Henry's law constant:** No information available.

**Surface tension:** No information available.

**12.5. RESULTS OF PBT/vPvB ASSESSMENT:**

This product does not contain any substances classified as PBT or vPvB.

**12.6. OTHER ADVERSE EFFECTS:**

None known.

**13. DISPOSAL CONSIDERATIONS**

**13.1. WASTE TREATMENT METHODS:**

**General information:**

This material and its container must be disposed of in a safe way. Care should be taken when handling emptied containers that have not been thoroughly cleaned or rinsed out. This material and its container must be disposed of as hazardous waste. Residues and empty containers should be taken care of as hazardous waste according to local and national provisions. The generation of waste should be minimised or avoided wherever possible. Disposal of this product, process solutions, residues and by-products should at all times comply with the requirements of environmental protection and waste disposal legislation and any local authority requirements. Confirm disposal procedures with environmental engineer and local regulations. Waste codes should be assigned by the user, preferably in discussion with the waste disposal authorities

**Disposal methods:**

This material and its container must be disposed of as hazardous waste. Residues and empty containers should be taken care of as hazardous waste according to local and national provisions. The generation of waste should be minimised or avoided wherever possible. Collect and place in suitable waste disposal containers and seal securely. Dispose of waste to licensed waste disposal site in accordance with the requirements of the local Waste Disposal Authority. The requirements of the local water authority must be complied with if contaminated water is flushed directly to the sewer. Waste should not be disposed of untreated to the sewer unless fully compliant with the requirements of the local water authority.

**Waste class:**

No information available.



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#### 14. TRANSPORT INFORMATION

General The product is not covered by international regulations on the transport of dangerous goods (IMDG, IATA, ADR/RID).

##### 14.1. UN number

Not applicable.

##### 14.2. UN proper shipping name

Not applicable.

##### 14.3. Transport hazard class(es)

No transport warning sign required.

##### 14.4. Packing group

Not applicable.

##### 14.5. Environmental hazards

Environmentally hazardous substance/marine pollutant

No.

##### 14.6. Special precautions for user

Not applicable.

##### 14.7. Transport in bulk according to Annex II of MARPOL and the IBC Code

Transport in bulk according to Annex II of MARPOL 73/78 and the IBC Code Not applicable.

#### 15. REGULATORY INFORMATION

##### 15.1. SAFETY, HEALTH AND ENVIRONMENTAL REGULATIONS/LEGISLATION SPECIFIC FOR THE SUBSTANCE OR MIXTURE:

###### National regulations:

Control of Substances Hazardous to Health Regulations 2002 (as amended).

EH40/2005 Workplace exposure limits.

Health and Safety at Work etc. Act 1974 (as amended).

###### EU legislation:

Commission Directive 2000/39/EC of 8 June 2000 establishing a first list of indicative occupational exposure limit values in implementation of Council Directive 98/24/EC on the protection of the health and safety of workers from the risks related to chemical agents at work (as amended).

Regulation (EC) No 1272/2008 of the European Parliament and of the Council of 16 December 2008 on classification, labelling and packaging of substances and mixtures (as amended). Regulation (EC) No 648/2004 of the European Parliament and of the Council of 31 March 2004 on detergents (as amended).

Regulation (EC) No 1907/2006 of the European Parliament and of the Council of 18 December 2006 concerning the Registration, Evaluation, Authorisation and Restriction of Chemicals (REACH) (as amended).

Commission Regulation (EU) No 2015/830 of 28 May 2015.

Directive 2012/18/EU of the European Parliament and of the Council of 4 July 2012 on the control of major-accident hazards involving dangerous substances.

###### Guidance:

Workplace Exposure Limits EH40.

###### Health and environmental listings:

No information available.

###### Authorisations (Annex XIV Regulation 1907/2006):

No information available.

###### Restrictions (Annex XVII Regulation 1907/2006):

This product contain no substances ( $\geq 0.1$  % w/w) of very high concern (SVHC)



## COCAMIDOPROPYL BETAINE

### Technical Data

| PROPERTY                  | UNITS | VALUE        |
|---------------------------|-------|--------------|
| Appearance @ 20°C         | -     | Clear Liquid |
| Free Amine                | %     | 0.3 Max      |
| Betaine Content           | %     | 28.0 – 32.0  |
| Colour Hazen              | -     | 200 Max      |
| pH Neat @ 25°C            | N/A   | 4.5 – 5.5    |
| Sodium Chloride           | %     | 4.5 – 6.0    |
| MCA                       | ppm   | 20.0 Max     |
| Glycolic Acid             | %     | 0.7 Max      |
| Specific Gravity @ 25°C   | -     | 1.05         |
| Total Plate Count (CFU/G) | -     | <10.0        |
| Gram Negative Bacteria    | -     | ABSENT       |
| DCA                       | ppm   | 20.0 Max     |
| Free Fatty Acid           | %     | 0.5 Max      |

**The content of this data sheet is given in good faith and without warranty.**

Madar Corporation Limited makes the limited warranty that at the date of delivery this product will be free from defects in materials and workmanship.

No warranty of merchantability, fitness for any use, or any other warranty is expressed or to be implied, regarding the accuracy of this data. The results to be obtained from the use thereof, or the hazards connected with the use of this product.

Lubrisolve Engineering Solutions Ltd. assumes no liability for any alleged ineffectiveness of the product or any injury or damage, direct or consequential, resulting from the use of this product unless such injury or damage is solely attributable to negligence on the part of Madar Corporation Limited

Issue 01.04.2020





## DECLARATION AND CONFORMITY VEGAN INGREDIENT STATEMENT

**Product: Cocamidopropyl Betaine**

Madar Corporation Limited, declare that our product does not contain any animal product and is suitable for Vegans.

March 2021.