

# CERTIFICATE OF ANALYSIS MORINGA OIL

Batch Number: 4350109
Best Before End: February 2021

A pale yellow to yellow/orange, mobile liquid. May solidify at

Appearance: lower temperatures.

TEST	SPECIFICATION	ANALYSIS
Specific Gravity @ 20°C	0.912 – 0.922	0.916
Acid Value	1.0 maximum	0.56
Iodine Value	80 - 95	Pass
Peroxide Value	5.0 maximum	0.56
Saponification Value	185 - 197	190.6
Mositure Content	0.5% maximum	Complies



# **Allergen Declaration**

# Moringa Oil

INCI Name Moringa Oleifera Seed Oil. Product Code WHC820

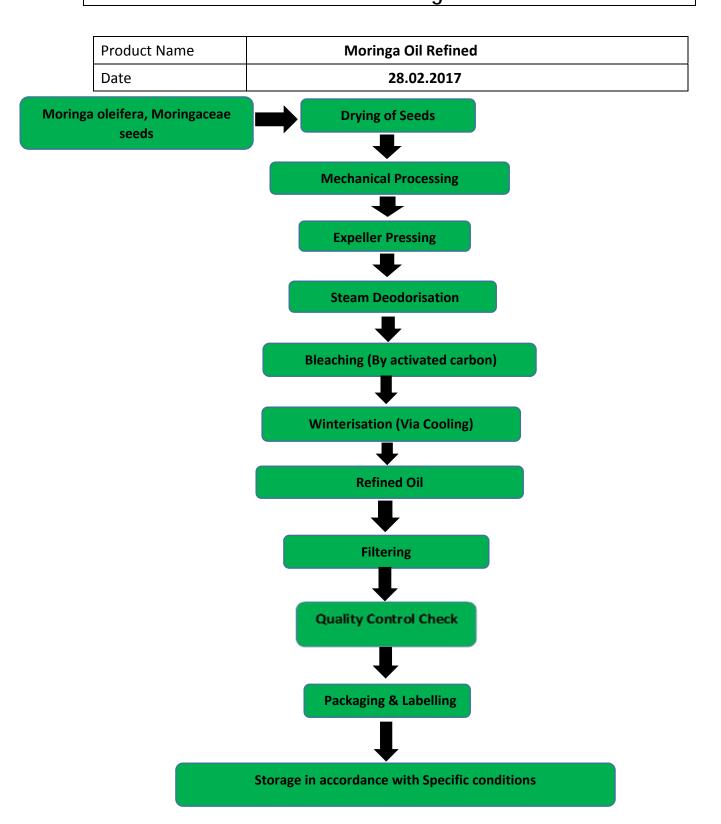
Material	CAS Number	Cosmetic Allergens Inclusion (%)
AMYL CINNAMAL	122-40-7	-
BENZYL ALCOHOL	100-51-6	-
CINNAMYL ALCOHOL	104-54-1	-
CITRAL	5392-40-5	-
EUGENOL	97-53-0	-
HYDROXYCITRONELLAL	107-75-5	-
ISO EUGENOL	97-54-1	-
AMYL CINNAMYL ALCOHOL	101-85-9	-
BENZYL SALICYLATE	118-58-1	-
CINNAMAL	104-55-2	-
COUMARIN	91-64-5	-
GERANIOL	106-24-1	-
HYDROXYISOHEXYL 3-CYCLOHEXENE CARBOXALDEHYDE	31906-04-4	-
ANISE ALCOHOL	105-13-5	-
BENZYL CINNAMATE	103-41-3	-
FARNESOL	4602-84-0	-
BUTYLPHENYLMETHYLPROPIONAL	80-54-6	-
LINALOOL	78-70-6	-
BENZYL BENZOATE	120-51-4	-
CITRONELLOL	106-22-9	-
HEXYL CINNAMAL	101-86-0	-
LIMONENE	5989-27-5	-
METHYL 2-OCTYNOATE	111-12-6	-
ALPHA-ISOMETHYLIONONE	127-51-5	-
EVERNIA PRUNASTRI EXTRACT	90028-68-5	-
EVERNIA FURFURACEA EXTRACT	90028-67-4	- -

#### DISCLAIMER:

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# **Manufacturing Flow Chart**





Document Date: December 2018

# **STATEMENT**

We hereby certify that the Moringa Refined Oil we sell is free of genetically modified materials and components. No ingredients, additives or processing aids of GM origin are used in the processing and purifying of the oil.









# **MATERIAL SAFETY DATA SHEET**

### **01. IDENTIFICATION OF THE SUBSTANCE/MIXTURE & OF THE COMPANY/UNDERTAKING**

1:1-Product Identifiers:					
Product name		Moringa Oil R	Moringa Oil Refined. WHC820		
Biological Defini	tion	Moringa Oleifera Seed Oil is the oil extracted from the seeds of Moringa oleifera, Moringaceae.			
INCI Name		Moringa Oleifera Seed Oil.			
Synonyms & Tra	ide Names	-			
Reach Registrati	ion Number	Number -			
FEMA No.	-	FDA No.	-	CoE No.	-
CAS-No	93165-54-9	EC No.	296-941-1	EINECS No.	296-941-1

1:2 – Relevant Identified Uses of the substance or mixture and uses advised against:		
Identified Uses	No additional data available	
1:3 – Details of the supplier of the Safety data sheets.		
Company Name	Madar Corporation 19-20 Sandleheath Industrial Estate, SP6 1PA, UK Tel: 01425 655555 Email: technical@madarcorporation.co.uk	

### **02. HAZARDS IDENTIFICATION**

2:1 Classification of the substance or mixture		
Classification (1999/45)	Not classed as a hazardous substance	
Classification (EC 1272/2008)	Not classed as a hazardous substance	
2.2 - Label Elements		
Label Elements in accordance with	None	
(EC) No 1272/2008		
2:3 - Other hazards		
Signal Word	None	
Contains	No hazardous substances	



Hazard Statements	None
Precautionary Statements	None
Supplementary Precautionary	None
Statements	
PBT or vPvB according to Annex XIII	No
Adverse physio-chemical properties	None
Adverse effects on human health	None

# **03. COMPOSITION/INFORMATION ON INGREDIENTS**

3:1 - Substances	
Substances	100% Moringa Oleifera Seed Oil Cas No. 93165-54-9 Not classed as a hazardous substance.
3:2 - Mixtures	
Mixtures	Not applicable

### **04. FIRST AID MEASURES**

4:1 – Description of first aid measures		
Inhalation	Expose to fresh air. If discomfort occurs; seek medical advice.	
Ingestion	Rinse mouth with water. Seek medical advice immediately.	
Skin Contact	Remove contaminated clothing. Wash skin with soap and water. Seek medical attention if any irritation persists or there is any sign of tissue damage.	
Eye Contact	Immediately flush with plenty of water for up to 15 minutes. Remove any contact lenses and open eyes wide apart. Seek medical attention if irritation persists. Continue to rinse.	
4:2 – Most important symptoms and effects, both acute and delayed		
Symptoms and effects	No additional data available	
4:3 – Indication of any immediate medical attention and special treatment needed		
Special requirements	No additional data available	



### **05. FIRE-FIGHTING MEASURES**

5:1 - Extinguishing Media	
Suitable extinguishing Media	Foam, Carbon dioxide or dry powder.
Unsuitable extinguishing Media-DO NOT USE	Water
5:2 - Special Hazards arising from su	ibstance or mixture
Specific hazards	Avoid inhalation of vapours. Wear protective clothing.
5:3 – Advice for firefighters	
Special firefighting procedures/ protective actions.	Wear self-contained breathing apparatus. Closed containers may build up pressure when exposed to heat and should be cooled with water spray.

## **06. ACCIDENTAL RELEASE MEASURES**

6:1 - Personal Precautions, protective equipment and emergency procedures.		
Personal precautions	Maintain good occupational and personal hygiene. Avoid contact with skin and eyes.	
6:2 - Environmental Precautions		
Environmental Precautions	Do not discharge into drains, water courses or onto the ground. Dispose of in line with Local authority guidelines.	
6:3 – Methods and materials for co	ntainment and cleaning up	
Spill Clean Up Methods	Cover with an inert, inorganic, non-combustible absorbent material (e.g. dry-lime, sand, soda ash). Place in covered containers and dispose of in accordance with current laws and regulations. Larger spillages may be pumped	
6:4 – Reference to other sections		
Reference to other sections	Section 8 – Exposure controls/ personal protection for further information on personal precautions, Section 13 – Disposal considerations for further information on waste treatment.	



## **07. HANDLING AND STORAGE**

7:1 – Precautions for safe handling		
Usage precautions	Keep containers leak proof, tightly closed and dry, when not in use. Protect against sun/light. Keep away from open flames. Do not overheat. Prevent spills and leakages to avoid slip hazard. Provide suitable mechanical equipment for the safe handling of drums and heavy packages.	
7:2 - Conditions for safe Storage including any incompatibilities		
Storage Precautions	Intrusion into soil to be avoided. Store the product in cool (max. at room temperature) and well-ventilated environment. Limit oxygenation (contact with air); keep containers tightly closed. Keep away from sources of ignition. Provide suitable mechanical equipment for the safe handling of drums and heavy packages. Electrical equipment and fittings must comply with local regulations.	
Suitable Packaging	No additional data available	
7:3 – Specific end use (s)		
End Uses	No additional data available	

## **08. EXPOSURE CONTROLS/PERSONAL PROTECTION**

8:1 – Control parameters	
Components with workplace control parameters	None
8:2 – Exposure controls	
Protective Equipment	
Process conditions	No special measures required.
Engineering Measures	No special measures required.



Respiratory Equipment	Not normally required unless the oil is heated in which case attention must be paid to ensuring adequate ventilation and deployment of NIOSH-approved respirators.
Hand Protection	Wear protective gloves.
Eye Protection	Wear protective glasses / goggles.
Other Protection	No special measures required.
Hygiene Measures	Good personal hygiene practices are always advisable, especially when working with chemicals / oils.
Personal protection	Wear protective equipment to protect from splashes and spills.
Skin protection	No special measures required. If handling hot oil, wear protective clothing to avoid skin contact.
Environmental exposure controls	Avoid discharging into drainage water.

### **09. PHYSICAL AND CHEMICAL PROPERTIES**

9:1 - Information on basic physical and chemical properties.	
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Appearance	Oily liquid, colourless, clear.
Colour	Colourless, clear.
Odour	Typical - slight, mild.
Relative Density	0.912 - 0.922 @ 20°C
Flash Point (°C)	>300
Refractive Index	1.464 - 1.474 @ 20°C
Melting Point (°C)	No additional data available.
Boiling Point (°C)	No additional data available.
Vapour Pressure	No additional data available.
Solubility in Water @20°C	Insoluble in water. Soluble in common organic solvents.
Auto-ignition temperature (°C)	No additional data available.
9:2 - Other information	
Other Information	No additional data available.



# **10. STABILITY AND REACTIVITY**

10:1- Reactivity	
Reactivity	Stable under the recommended handling and storage conditions.  Presents no significant reactivity hazards, by itself or in contact with water.
10:2 - Chemical stability	
Stability	Stable under the recommended handling and storage conditions
10:3 - Possibility of hazardor	us reactions
Possible hazardous reactions	None Known
10:4 - Conditions to avoid	
Conditions to Avoid	Avoid strong acids, alkalis and oxidising agents.
10:5 – Incompatible materials	
Incompatible materials	Strong oxidising agents, strong acids, strong alkalis.
10:6 - Hazardous Decomposition Products	
Hazardous Decomposition Products	None known on proper use and handling

## **11. TOXOLOGICAL INFORMATION**

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11:1 Information on toxicological effects	
Acute Toxicity	Not considered toxic.
Skin corrosion / irritation	Not a skin irritant.
Serious eye damage / irritation	No additional data available.
Respiratory or skin sensitisation	Not a skin sensitiser.
Germ Cell Mutagenicity	Not listed as mutagenic.



Carcinogenicity	No additional data available.
Reproductive toxicity	Not reprotoxic.
STOT-single exposure	No additional data available.
STOT-repeated exposure	No additional data available.
Aspiration hazard	Does not present an aspiration hazard.
Photo-toxicity	Not photo-toxic.
Other Information	No additional data available.

## 12. ECOLOGICAL INFORMATION

12:1- Toxicity	
Ecotoxicity	Not considered eco- toxic
12:2 - Persistence & degrada	bility
Persistence & degradability	Biodegradable
12:3 - Bioaccumulative Poter	ntial
Bioaccumulative Potential	Potential for bio-concentration in aquatic organism is low.
12:4 – Mobility in soil	
Mobility	No additional data available.
12:5 – Results of PBT and vPvB assessment	
PBT Assessment Results	No additional data available.
12:6 Other adverse effects	



Precautions	Do not allow product to enter streams, sewers or other waterways.

## **13. DISPOSAL CONSIDERATIONS**

13:1 Waste treatment methods	
Disposal Methods	Wherever possible recover all spillages. Collect and dispose of waste product at an authorised disposal facility. Product remainders should not intrude soil
	or waters.

## 14. TRANSPORT INFORMATION

Warning Icon	Not bound by transport regulations
14:1 – UN Number	
UN No Road – ADR/RID/ADN	Not bound by transport regulations
UN No Sea- IMDG	Not bound by transport regulations
UN No Air – IATA	Not bound by transport regulations
14:2 – UN proper ship	ping name
Road – ADR/RID/ADN	Not bound by transport regulations
Sea- IMDG	Not bound by transport regulations
Air - IATA	Not bound by transport regulations
14:3 – Transport Haza	rd class (es)
Road – ADR/RID/ADN	Not bound by transport regulations
Sea- IMDG	Not bound by transport regulations
Air- IATA	Not bound by transport regulations
14:4 - Packaging group	



Road – ADR/RID/ADN	Not bound by transport regulations	
Sea- IMDG	Not bound by transport regulations	
Air - IATA	Not bound by transport regulations	
14:5 – Environmental h	azard	
Environmentally hazardous No additional data available substance/ marine pollutant.		
14:6 - Special precautions for user		
Precautions	See sections 6-8	
14:7 – Transport in bulk according to Annex II of MARPOL 73/79 and the IBC code		
	Not defined	

# **15. REGULATORY INFORMATION**

15:1 - Safety health an	d environmental regulations/ legislation specific for the substance or
mixture.	u environmental regulations/ legislation specific for the substance of
EU Directives	Commission Regulation (EU) No 453/2010 of 20 May 2010 amending Regulation (EC) No 1907/2006 of the European Parliament Council of 18 <sup>th</sup> Dec 2006 Concerning the Registration, Evaluation, Authorisation and Restriction of Chemicals (REACH), establishing a European Chemicals Agency, amending Directive 199/45/EC and repealing Council Regulation Council Regulation (EEC) No793/93 and Commission Regulation (EC) No1488/94 as well as Council Directive 76/769/EEC and Commission Directives 91/155/EEC, 93/67/EEC, and 93/105/EEC and 2000/21/EC including amendments.
Statutory Instruments	The Chemicals (Hazard Information and Packaging for Supply Regulations 2009 (S.I. 2009 No 716).
Approved Code of Practice	Classification and Labelling of Substances and Preparations Dangerous for Supply. Safety Data Sheets for Substances and Preparations
Guidance Notes	Workplace Exposure Limits EH40. CHIP for everyone HSG 108.



15:2 Chemical Safety assessment	
Assessment information	A chemical assessment for this product has not been carried out.

#### **16. OTHER INFORMATION**

Risk Phrases in Full	None
Hazard Statements in Full	None
Other Information	None

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# PRODUCT SPECIFICATION

# **Moringa Oil**

Product Code WHC850

Description	Moringa Oleifera Seed Oil is the oil extracted from the seeds of Moringa oleifera,		
	Moringaceae.		
Appearance	Mobile oily clear, colourless liquid		
Odour	Slight/mild typical		
INCI Name	Moringa Oleifera Seed Oil		
CAS Number	93165-54-9	EC Number	296-941-1

#### **TEST SPECIFICATION**

Analytical Test	Specification Range
Specific Gravity @ 20°C (g/ml)	0.912 – 0.922
Refractive Index @ 20°C	1.464 – 1.474
Acid Value (mgKOH/g)	Max 1.0
Saponification value (mgKOH/g)	185.0 – 197.0
Free Fatty Acid (% As Oleic)	Max 0.5
Peroxide Value (Meq /Kg)	Max 5.0 (at time of production analysis)
Moisture Content (%)	Max 0.5
Fatty Acid Profile (%)	
C 16:0 Palmitic Acid	Max 10.5
C 16:1 Palmitoleic Acid	Max 0.5
C 18:0 Stearic Acid	Max 12.0
C 18:1 Oleic Acid	65.0 – 80.0
C 18:2 Linoleic Acid	10.0 – 22.0
C 20:0 Arachidic Acid	Max 2.0

#### **STORAGE**

Store product in full, tightly closed containers in a cool dry place away from heat and sunlight.

#### **STABILITY**

When stored for more than 24 months, quality should be checked before use.

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# **Vegetarian & Vegan Suitability Statement**

PRODUCT NAME: Moringa Oil

MADAR Corporation Limited can confirm that the above listed product does not contain dairy or any other animal product, by product or derivative and is therefore suitable for vegetarian and vegan use.