

#### **CERTIFICATE OF ANALYSIS**

PRODUCT : STAR ANISE OIL

BATCH NUMBER : 4369704

BEST BEFORE END : AUGUST 2022

Appearance : Clear, bright, pale yellow coloured liquid

Odour : Characteristic of aniseed

Identification : Conforms to monograph

Relative Density @ 20°C : 0.9832

Refractive Index @ 20°C : 1.5537

Optical Rotation @ 20°C : +0.58

Freezing point  $^{\circ}$ C : +16.1

Trans-Anethol : 88.7%



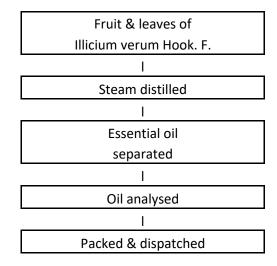
### **ALLERGENS LIST**

**PRODUCT: Star Anise** 

Product	CAS number		% max
Amyl cinnamic alcohol	101-85-9	Not found in nature	
Amyl cinnamic aldehyde	122-40-7	Not found in nature	
Anisyl alcohol	105-13-5		
Benzyl alcohol	100-51-6		
Benzyl benzoate	120-51-4		
Benzyl cinnamate	103-41-3		
Benzyl salicylate	118-58-1		
Cinnamic alcohol	104-54-1		
Cinnamic aldehyde	104-55-2		
Citral	5392-40-5		
Citronellol	106-22-9		
Coumarin	91-64-5		
Eugenol	97-53-0		
Farnesol	4602-84-0		
Geraniol	106-24-1		
Hexyl cinnamic aldehyde	101-86-0	Not found in nature	
Hydroxycitronellal	107-75-5	Not found in nature	
Hydroxymethylpentylcyclohexenecarboxaldehyde	31906-4-4	Not found in nature	
Isoeugenol	97-54-1		
2-(4-tert-butylbenzyl)propionaldehyde	80-54-6		
Limonene	5989-27-5		3
Linalol	78-70-6		1.5
Methylheptine carbonate	111-12-6	Not found in nature	
Methyl ionone	127-51-5	Not found in nature	
Oakmoss extract	9028-68-55		
Treemoss extract	84696-53-7		



# Process flow Chart STAR ANISE





### **CERTIFICATE OF GMO STATUS**

For the purpose of this statement 'genetically modified organism (GMO)' is defined in Directive 2001/18/EC as an organism in which the genetic material has been altered in a way that does not occur naturally by mating and/or natural recombination.

This is to certify that to the best of our knowledge and belief the essential oil of Star Anise that this company supplies is not produced by gene modification or derived from genetically modified organisms or from the use of genetically modified organisms.

If this oil is to be incorporated in any genetically modified food or animal feed then we certify that it complies with EC 1829/2003 and 1830/2003 regulations.

Neither MADAR Corporation Ltd. nor our suppliers can guarantee against or be held responsible for potential cross-pollination between crops, or any other unforeseen contamination risks.



## IFRA STANDARDS CONFORMITY CERTIFICATE

Fragrance compound

Product: Star Anise			

We certify that the above substance is in compliance with the Standards of the INTERNATIONAL FRAGRANCE ASSOCIATION (IFRA), 48th Amendment to the IFRA Code of Practice (published June, *2015*), It does not appear in the IFRA list of standards and so no information is available on its use in the IFRA Classes:

IFRA class(es) [see respective IFRA guidance for details]	Level of use (%)*	

<sup>\*</sup>Actual use level or maximum use level

The IFRA Standards are based on safety assessments by the Panel of Experts of the RESEARCH INSTITUTE FOR FRAGRANCE MATERIALS (RIFM).

**Recommendation:** Information about the presence and concentration of IFRA restricted/prohibited materials in the Star Aniseed Oil is as follows:

#### IFRA Restricted materials:

Ingredient name	CAS	Concentration %
Estragole	140-67-0	3.3
p-methoxybenzaldehyde	123-11-5	0.2

#### IFRA prohibited materials: None

Ingredient name	CAS	Details



#### Star Anise

This Safety Data Sheet contains information concerning the potential risks to those involved in handling, transporting and working with the material, as well as describing potential risks to the consumer and the environment. This information must be made available to those who may come into contact with the material or are responsible for the use of the material. This Safety Data Sheet is prepared in accordance with formatting described in the REACH Regulation (EC) No 1907/2006, and described in CLP Regulation (EC) No 1272/2008.

#### SECTION 1: Identification of the substance/mixture and of the company/undertaking

1.1 Product identifier **Product name Star Anise** 

EC number:	283-518-1
EC name:	Star anise, Illicium verum, ext
CAS number (EC	84650-59-9
inventory):	
Registration number	

1.2 Relevant identified uses of the substance or mixture and uses advised against

Multiple uses in the Flavour and Fragrance industries

1.3 Details of the supplier of the safety data sheet

> **MADAR Corporation Limited** 19-20 Sandleheath Industrial Estate Fordingbridge

**Hampshire** SP6 1PA

Tel: 01425 655555

E mail: sales@madarcorporation.co.uk

Cosmetic butters, Mystic Moments, New Directions, World of Moulds Approved sellers

1.4 **Emergency telephone number** 

In case of emergency Tel. 01425 655555 during office hours

#### **SECTION 2: Hazards Identification**

#### 2.1 Classification of the substance

Classification in accordance with the Dangerous Substances Directive 67/548/EEC

Xi+N

R40 - Limited evidence of a carcinogenic effect

R43 - May cause sensitisation by skin contact

R51/53 - Toxic to aquatic organisms, may cause long-term adverse effects in the aquatic environment

R68 - Possible risk of irreversible effects

S24 - Avoid contact with skin

S36/37 - Wear suitable protective clothing and gloves

S61 - Avoid release to the environment. Refer to special instructions

#### Classification in accordance with GHS Hazard codes

H303 - May be harmful if swallowed

H316 - Causes mild skin irritation

H317 - May cause an allergic skin reaction

H341 - Suspected of causing genetic defects

H351 - Suspected of causing cancer

H401 - Toxic to aquatic life

Classification in accordance with the Classification Labelling and Packaging Regulation EC (no) 1272/2008

#### **Hazard Phrases**

H317 - May cause an allergic skin reaction

H341 - Suspected of causing genetic defects

H351 - Suspected of causing cancer

#### **Precautionary Phrases**

P262 - Do not get in eyes, on skin, or on clothing

P280 - Wear protective gloves/protective clothing/eye protection/face protection

P281 - Use personal protective equipment as required

#### 2.2 Label elements

#### Signal Word **WARNING**

#### **Pictograms**



#### 2.3 Other hazards

#### **SECTION 3: Composition**

#### 3.1 Substances

Aniseed Oil China Star 100 %

#### **SECTION 4: First Aid Measures**

4.1 Description of first aid measures

EYE CONTACT: Irrigate the eyes with copious volumes of water for at least 15 minutes with the eye lids held open. Seek medical advice if inflammation persists

INHALATION: Remove person to fresh air, remove any contaminated clothing, in case of breathing difficulty seek medical advice.

SKIN CONTACT: Wash affected area with soap and running water, if irritation persists seek medical advice.

INGESTION: Dilute internally with water, do not induce vomiting. Seek medical advice immediately.

- 4.2 Most important symptoms and effects, both acute and delayed
- 4.3 Indication of any immediate medical attention and special treatments needed

Symptomatic treatment as required

#### **SECTION 5: Firefighting Measures**

- 5.1 Extinguishing media Foam, CO<sub>2</sub>, Dry Powder
- 5.2 Special hazards arising from the substance or mixture **Combustion products: Carbon** monoxide, Carbon dioxide, Smoke
- 5.3 Advice for fire fighters Do Not Use Water as extinguishing media. No special fire fighting equipment required.

#### **SECTION 6: Accidental Release Measures**

6.1 Personal precautions, protective equipment and emergency procedures

Wear clothing suitable for an emergency

6.2 **Environmental precautions** 

> Contain the leak with earth or sand. Prevent from entering drains, sewers and water courses. If this cannot be done, advise the local authority.

6.3 Methods and materials for containment and clearing up

Absorb spillage onto sand or earth. Transfer to a suitable container for disposal.

#### **SECTION 7: Handling and Storage**

7.1 Precautions for safe handling

Handle in a well ventilated area, away from sources of ignition, DO NOT SMOKE.

7.2 Conditions for safe storage, including any incompatibilities

Store in well-filled, tightly closed containers away from heat, light and sources of ignition.

#### 7.3 Specific end uses

Used in Flavours and Fragrances.

#### SECTION 8. Exposure Controls/Personal Protection

#### 8.1 Control parameters No data available

Substance	8 hour exposure limit	15 minute exposure limit	Source, Type

#### DNELs for workers No data available

Exposure	Route	DNEL	Dose descriptor	
pattern			·	
Acute - systemic effects	Dermal			
Acute - systemic effects	Inhalation			
Acute - local effects	Dermal			
Acute - local effects	Inhalation			
Long-term - systemic effects	Dermal			
Long-term - systemic effects	Inhalation			
Long-term - local effects	Dermal			
Long-term - local effects	Inhalation			

#### PNECs No data available

Compartment	PNEC	Dose descriptor
Fresh water		
Sewage treatment		

#### 8.2 Exposure controls

Engineering controls - Use suitable handling equipment

Respiratory protection – Use only in well ventilated areas. Use protection in poor ventilation.

Hand Protection - Wear gloves

Eye protection - Wear goggles

Skin protection - Wear suitable protective clothing

#### **SECTION 9: Physical and Chemical Properties**

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

Appearance: Clear, mobile liquid Odour: Characteristic of aniseed Odour threshold: No data available

pH: Not applicable

Melting point: Not applicable Boiling point: Not applicable

Flashpoint: >93°C

Evaporation rate: No data available

Flammability: Combustible

Upper/lower flammability limits: No data available

Vapour pressure: No data available Vapour density: No data available Relative density: 0.0.979 – 0.985 Solubility in water: Insoluble

Solubility in other solvents: Soluble

Partition coefficient (log Kow): No data available Autoignition temperature: No data available Decomposition temperature: No data available

Viscosity: No data available

Explosive properties: No data available

**Oxidising properties: None** 

9.2 Other information

Particle size: Not applicable

#### **SECTION 10: Stability and Reactivity**

- 10.1 Reactivity: Will react with oxidising agents
- 10.2 Chemical stability: Stable under proper storage conditions.
- 10.3 Possibility of hazardous reactions: Not if stored correctly
- 10.4 Conditions to avoid: Do not leave containers open to the air. Avoid storage at elevated temperatures and sources of ignition.
- 10.5 Incompatible materials: Oxidising agents
- 10.5 Hazardous decomposition products: On combustion may produce smoke, carbon monoxide and carbon dioxide.

#### **SECTION 11: Toxicological Information**

#### 11.1 Information on toxicological effects

This product has not been tested. Judgements on the expected toxicity of this product have been made based upon consideration of its major components.

#### **Toxicokinetics**

- (a) acute toxicity: LD<sub>50</sub> 2570 mg/kg (Rat). Dermal 5000mg/kg (Rabbit)
- (b) skin corrosion/irritation: Causes skin irritation
- (c) serious eye damage/irritation: May cause eye irritation
- (d) respiratory/skin sensitisation: May cause an allergic skin reaction
- (e) germ cell mutagenicity: No data available
- (f) carcinogenicity: Limited evidence of a carcinogenic effect

(g) reproductive toxicity: No data available (h) STOT-single exposure: No data available (i) STOT-repeated exposure: No data available

(j) aspiration hazard: No data available

#### **SECTION 12: Ecological Information**

- 12.1 Toxicity: No data available
- 12.2 Persistence and degradability: No data available
- 12.3 Bioaccumulative 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

#### **SECTION 13: Disposal Considerations**

13.1 Waste treatment methods – Do not dispose into drainage systems. Ensure disposal is within local and national guidelines. Consult a specialist waste disposal company for correct disposal procedure and/or seek other expert advice.

#### **SECTION 14: Transport Information**

	ADR	IMDG	ICAO
14.1 UN Number	No class		
14.2 UN Proper shipping	Aniseed Oil		
name			
14.3 Transport hazard	No class		
class(es)			
14.4 Packing group	No class		
14.5 Environmental			
hazards			
14.6 Special precautions			
for user			
14.7 Transport in bulk			
according to Annex II of			
MARPOL 73/78 and the			
IBC Code			

#### **SECTION 15: Regulatory Information**

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

This substance is listed as existing in Europe

15.2 Chemical Safety Assessment

A Chemical Safety Assessment has not been carried out for this product.

#### **SECTION 16: Other Information**

#### **Revision information:**

List of Abbreviations used in this SDS:

**CAS** Chemical Abstracts Service

CLP Classification, Labelling and Packaging Regulation (EC) no 1272/2008

DSD Dangerous Substances Directive 67/548/EEC

**DPD** Dangerous Preparations Directive 1999/45/EC

**EC** European Commnity/Commission

PBT Persistent, Bioaccumulative and Toxic

REACHRegistration, Evaluation, Authorisation and Restriction of Chemicals Regulation (EC) no 1907/2006

vPvB very Persistent, very Bioaccumulative

References: Food Cosmetics Toxicology 13 715 (1975)

The information in this safety data sheet is based on the properties of the material known to MADAR Corporation Ltd at the time the data sheet was issued. The safety data sheet is intended to provide information for a health and safety assessment of the material and the circumstances under which it is packaged, stored or applied in the workplace. This document is not intended for quality assurance purposes.



## **SPECIFICATION**

#### **STAR ANISE**

Botanical source : Illicium verum

Method of production : Steam distillation

Appearance : A colourless mobile liquid

Odour : Characteristic

Density @ 20°C : 0.970 – 0.990 g/ml

Optical Rotation @ 20°C : -2 to +2

Refractive Index @ 20°C : 1.550 – 1.565

Congealing point : minimum 15°C



## Vegan Certificate

We hereby confirm that, to the best of our knowledge and belief, no animals or animal products are used or present in the production or processing of the Star Anise that MADAR Corporation Limited supplies.