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SECTION 1: IDENTIFICATION OF THE SUBSTANCE/ MIXTURE AND OF THE COMPANY/UNDERTAKING

1.1 PRODUCT IDENTIFIER

- Chemical name Fructose - CAS number 57-48-7

1.2 RELEVANT IDENTIFIED USES OF THE SUBSTANCE AND USES ADVISED AGAINST Liquid food ingredient.

1.3 DETAILS OF THE SUPPLIER

- Company identification

Americas:

Tate & Lyle Ingredients Americas LLC.

2200 E. Eldorado Street Decatur, IL 62521

Europe:

Tate & Lyle Slovakia s.r.o.

Boleraz 114 919 08 boleraz Slovakia

Asia-Pacific: Tate & Lyle

3 Biopolis Drive, #05-11 Synapse

Singapore 138623

1.4 EMERGENCY PHONE NR.

CHEMTREC Toll-Free:

1-800-424-9300 (USA and Canada)

Non Toll-Free +1-703-527-3887 (Global)

SECTION 2: HAZARDS IDENTIFICATION

2.1. CLASSIFICATION OF THE SUBSTANCE OR MIXTURE

According with the version of the Globally Harmonized System of Classification and labeling adopted in the United States and Regulation 1272/2008/EC [CLP]: Not classified

2.2. LABEL ELEMENTS SIGNAL WORD:

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Not applicable

HAZARD STATEMENTS:

Not applicable

SYMBOL: Not applicable

PRECAUTIONARY STATEMENTS:

Not applicable

2.3. OTHER HAZARDS

This product is not considered hazardous as defined in the OSHA hazard Communication Standard (29 CFR 1910.1200)<(>,<)> product is a liquid food ingredient.

FIRE AND EXPLOSION HAZARD:

Liquid product will not burn.

POTENTIAL ACUTE HEALTH EFFECTS FROM OCCUPATIONAL EXPOSURE:

Inhalation: No effects known or anticipated. Skin contact: No effects known or anticipated. Eye contact: No effects known or anticipated. Ingestion: No effects known or anticipated.

SECTION 3:COMPOSITION/INFORMATION OF INGREDIENTS

Chemical nameCAS numberEINECS numberFructose57-48-7200-333-3

SECTION 4:FIRST AID MEASURES

4.1 DESCRIPTION OF FIRST AID MEASURES

General advice Seek medical attention if irritation develops after first

aid application

- Inhalation No special treatment under normal circumstances.

- Skin contact No special treatment under normal circumstances. Clean with

soap and water.

- Eye contact No special treatment under normal circumstances. Rinse with

eye wash solution or clean water. If symptoms develop,

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obtain medical attention.

- Ingestion No special treatment under normal circumstances.

4.2 MOST IMPORTANT SYMPTOMS AND EFFECTS, BOTH ACUTE AND DELAYED None Anticipated

4.3 INDICATION OF ANY IMMEDIATE MEDICAL ATTENTION AND SPECIAL TREATMENT NEEDED. None Anticipated

SECTION 5: FIRE-FIGHTING MEASURES

5.1 EXTINGUISHING MEDIA
Use media appropriate for surrounding fire.

5.2 SPECIFIC HAZARDS FIRE AND EXPLOSION HAZARD: None, liquid product will not burn.

5.3 SPECIFIC PROTECTIVE EQUIPMENT AND PRECAUTIONS FOR FIRE-FIGHTERS Wear self-contained breathing apparatus and full protective gear. Use water spray to cool fire exposed containers.

FLAMMABILITY CLASS (OSHA) Not applicable

HAZARDOUS COMBUSTION PRODUCTS Carbon dioxide and carbon monoxide

SECTION 6:ACCIDENTAL RELEASE MEASURES

6.1 PERSONAL PRECAUTIONS None under normal conditions.

6.2 ENVIRONMENTAL PRECAUTIONS

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Prevent further leakage or spillage if safe to do so. No special environmental precautions required

6.3 METHODS FOR CLEANING UP

OCCUPATIONAL SPILL:

No specific cleaning procedure is necessary. If washing down spilled area is necessary, use copious amounts of water and control runoff. Follow local, state and federal regulations for product disposal.

6.4 REFERENCE TO OTHER SECTIONS

See Section 7 for information on safe handling

See Section 8 for information on personal protection equipment

See Section 13 for disposal information

SECTION 7: HANDLING AND STORAGE

7.1 PRECAUTIONS FOR SAFE HANDLING

No specific handling is necessary.

7.2 CONDITIONS OF SAFE STORAGE, INCLUDING ANY INCOMPATIBILITIES

Follow the storage conditions as described in the specification sheet.

7.3 SPECIFIC END USE(S)

Not applicable

SECTION 8: EXPOSURE CONTROLS / PERSONAL PROTECTION

8.1 CONTROL PARAMETERS

Not hazardous as defined in OSHA 29 CFR 1910.1200. Product is a liquid food ingredient.

Exposure limits: Not applicable

8.2 EXPOSURE CONTROLS

APPROPRIATE ENGINEERING CONTROLS:

Ventilation: Normal industrial hygiene measures should be sufficient.

APPROPRIATE PERSONAL PROTECTIVE EQUIPMENT:

Eye protection: Safety glasses are recommended.

Emergency wash facilities: Eye wash is recommended for conditions where splashing is likely.

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Special protective clothing: Not normally required.

Gloves: Not normally required. Respirator: Not normally required.

FOR FIREFIGHTING AND OTHER IMMEDIATELY DANGEROUS TO LIFE OR HEALTH CONDITIONS:

See section 5

SECTION 9: PHYSICAL AND CHEMICAL PROPERTIES

9.1 INFORMATION ON BASIC PHYSICAL AND CHEMICAL PROPERTIES

- Physical form Syrup

- Color Transparent water like to light yellow

- Odor Bland

- pH (concentration) Data on specification sheet if available.

- Boiling point No data - Flash point No data - Melting/freezing point No data - Decomposition temperature No data - Auto-ignition temperature No data - Explosion properties No data - Oxidising properties No data - Vapour pressure No data - Vapor density No data - Relative density No data - Bulk density No data - Specific gravity No data

- Viscosity Data on specification sheet if available.

Water solubility
 Soluble
 Solubility (non aqueous)
 Partition coefficient
 Dissociation constant
 Evaporation rate
 Soluble
 No data
 No data

9.2 OTHER INFORMATION

SECTION 10: STABILITY AND REACTIVITY

10.1 REACTIVITY Stable

10.2 CHEMICAL STABILITY

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Stable under normal conditions. Polymerization will not occur.

10.3 POSSIBILITY OF HAZARDOUS REACTIONS Not applicable

10.4 CONDITIONS TO AVOID Avoid contact with strong oxidizers.

10.5 INCOMPATIBLE MATERIALS Oxidizing agents, strong acids

10.6 Hazardous decomposition products: Nothing unusual

SECTION 11: TOXICOLOGICAL INFORMATION

11.1 INFORMATION ON TOXICOLOGICAL EFFECTS This (these) product(s) is(are) food ingredients.

ACUTE HEALTH EFFECTS:

Inhalation: No effects known or anticipated. Skin contact: No effects known or anticipated. Eye contact: No effects known or anticipated. Ingestion: No effects known or anticipated.

CHRONIC HEALTH EFFECTS: None known or anticipated.

CARCINOGEN STATUS:

OSHA: Not listed. NTP: Not listed. IARC: Not listed.

SECTION 12: ECOLOGICAL INFORMATION

12.1 TOXICITY No data

12.2 PERSISTENCE/DEGRADABILITY Readily biodegradable

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12.3 BIOACCUMULATIVE POTENTIAL Food and feed ingredient, not relevant.

12.4 MOBILITY IN SOIL Not applicable

12.5 BPT, vPvB

The substance does not meet the criteria for PBT or vPvB.

12.6 OTHER ADVERSE EFFECTS None known

SECTION 13: DISPOSAL CONSIDERATIONS

13.1 WASTE TREATMENT METHODS

Follow local, state and federal regulations for product disposal. Not a hazardous waste unless contaminated with hazardous products.

SECTION 14: TRANSPORTATION INFORMATION

International regulations (RID/ADR; RTMDR; IMDG; IATA/OACI): Not classified as dangerous for transport.

DOT shipping label: Non-hazardous

SECTION 15: REGULATORY INFORMATION

15.1 SAFETY, HEALTH AND ENVIRONMENTAL REGULATIONS

According with the version of the Globally Harmonized System of Classification and labeling adopted in the United States and Regulation 1272/2008/EC(CLP): Not classified

15.2 CHEMICAL SAFETY ASSESSMENT

US FEDERAL REGULATIONS:

Clean Air Act:

ODS: Not applicable.

TSCA Status: Not applicable.

SARA (EPCRA) Section 313 (40 C.F.R. § 372.65): Not applicable.

STATE REPORTING REQUIREMENTS: California Proposition 65: Not applicable.

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SECTION 16: OTHER INFORMATION

DISCLAIMER OF LIABILITY

The information in this SDS is collected from reliable sources. However, the information is provided without any warranty, expressed or implied. The conditions or methods of handling, storage, use or disposal of the product might be beyond our control and knowledge. For the avoidance of doubt, we shall in no such circumstances be under any liability in respect of loss, damage or expenses arising from handling, storage, use or disposal of the product by your company and/or your subcontractors. This SDS is only applicable for the product mentioned in the identification chapter and title. If the product is used as a component in another product, this SDS may not be applicable on the composite material.

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