



SAFETY DATA SHEET

Clara BioSolv Recycled Vegetable Oil Methyl Esters via Transesterification

Version: 1.1

Date of Issue: July 30, 2025

Revision: -

SECTION 1. IDENTIFICATION

Product identifier: Clara BioSolv

Synonyms: Recycled Vegetable Oil Methyl Ester, Used Cooking Oil Methyl Ester

Recommended use: Solvent / Degreaser for industrial cleaning applications

Restrictions on use: Not for human consumption. Not for use on food contact surfaces. **Supplier:** Clara Biofuels S.A.

Address: Aldea El Canchón Finca Santa Rita, Casa 11, Callejón Los Morales, Zona 8, del Municipio de Santa Catarina Pinula, Guatemala

Technical Contact: (+502) 4199-3625

Email: info@clarabiofuels.com

Emergency Telephone: 122 (fire and ambulance); Police: 110

SECTION 2. HAZARDS IDENTIFICATION

GHS Classification:

- Skin Irritation – Category 2
- Eye Irritation – Category 2B
- Aspiration Hazard – Category 1

Signal word: DANGER

GHS Pictograms

Pictogram Meaning
Health Hazard (silhouette with star) Aspiration hazard / serious health effects



Label Elements Summary

Element Description	
Hazard statements	Causes skin irritation; Causes eye irritation; May be fatal if swallowed and enters airways.

1

Element Description	
Precautionary prevention	P264, P280, P270, P273 (wash hands, wear gloves/eye protection, do not eat/drink, avoid release)
Precautionary response	P302+P352 (IF ON SKIN), P305+P351+P338 (IF IN EYES), P301+P310 (IF SWALLOWED), P331 (do NOT induce vomiting), P101 (if medical advice needed)

Hazard statements:

- Causes skin irritation.
- Causes eye irritation.
- May be fatal if swallowed and enters airways (aspiration hazard).

Precautionary statements:

Prevention:

- Wash hands thoroughly after handling.
- Wear protective gloves and eye/face protection.
- Do not eat, drink or smoke when using this product.
- Avoid release to the environment in uncontrolled quantities.

Response:

- IF ON SKIN: Wash with plenty of soap and water. If skin irritation occurs: Get medical advice/attention.
- IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses if present and easy to do. Continue rinsing. If eye irritation persists: Get medical attention.

- IF SWALLOWED: Do NOT induce vomiting. Immediately call a POISON CENTER or physician.
- IF ASPIRATED: Seek immediate medical attention.

Storage:

- Store in a cool, well-ventilated place. Keep container tightly closed. Agitate regularly before use.

Disposal:

- Dispose of contents/container in accordance with local/regional/national regulations.

Other hazards:

- Not classified as a flammable liquid under normal conditions (flash point >93°C). - May degrade natural rubber, some elastomers, and similar materials on prolonged contact. - Product is not safe for human ingestion or use on surfaces that contact food.
- Keep out of reach of pets and children.

(Adapted from the provided reference SDS for a methyl ester-based cleaning solvent.)

SECTION 3. COMPOSITION/INFORMATION ON INGREDIENTS

Substance / Mixture: Mixture

Description: Recycled vegetable oil methyl esters produced via transesterification.

Typical impurities:

- Methanol, residual: ≤0.2% (trace levels from processing)

No other hazardous constituents at concentrations requiring disclosure under GHS for this

formulation. SECTION 4. FIRST AID MEASURES

Exposure route	First aid
Eye contact	Rinse cautiously with water for several minutes; remove contact lenses if present; continue rinsing. If irritation persists, get medical attention.
Skin contact	Wash with plenty of soap and water; remove contaminated clothing and launder before reuse. If irritation develops or persists, seek medical advice.
Inhalation	Move to fresh air. If breathing is difficult or irritation persists, get medical attention.
Ingestion	Do NOT induce vomiting. Aspiration into lungs can cause chemical pneumonitis; seek immediate medical attention.

Eye contact: Rinse cautiously with water for several minutes. Remove contact lenses if present and easy to do. Continue rinsing. If irritation persists, get medical attention.

Skin contact: Wash with plenty of soap and water. Remove contaminated clothing and launder before reuse. If irritation develops or persists, seek medical advice.

Inhalation: Move to fresh air. If breathing is difficult or irritation persists, get medical attention. **Ingestion:** Do NOT induce vomiting. Aspiration into lungs can cause chemical pneumonitis; seek immediate medical attention.

Protection of first-aiders: Avoid exposure; use appropriate PPE. If aspiration is suspected, ensure airway protection.

Notes to physician: Treat symptomatically. Monitor for respiratory complications if aspiration occurred. **Eye contact:** Rinse cautiously with water for several minutes. Remove contact lenses if present and easy to do. Continue rinsing. If irritation persists, get medical attention.

Skin contact: Wash with plenty of soap and water. Remove contaminated clothing and launder before reuse. If irritation develops or persists, seek medical advice.

Inhalation: Move to fresh air. If breathing is difficult or irritation persists, get medical attention. **Ingestion:** Do NOT induce vomiting. Aspiration into lungs can cause chemical pneumonitis; seek immediate medical attention.

Protection of first-aiders: Avoid exposure; use appropriate PPE. If aspiration is suspected, ensure airway protection.

Notes to physician: Treat symptomatically. Monitor for respiratory complications if aspiration

occurred. **SECTION 5. FIRE-FIGHTING MEASURES**

Suitable extinguishing media: Use extinguishing media appropriate for surrounding fire (e.g., foam, dry chemical, CO₂, water spray).

Unsuitable media: None known specific to the product.

Specific hazards: Not readily flammable, but heated containers may rupture; product can accumulate static charge—use grounding/bonding during transfer. Aspiration hazard if product enters lungs. **Protective**

equipment for firefighters: Self-contained breathing apparatus and full protective gear. **Special actions:** Prevent runoff from fire control from entering drains or waterways.

SECTION 6. ACCIDENTAL RELEASE MEASURES

Personal precautions: Avoid skin and eye contact. Use appropriate PPE (gloves, goggles). Ensure adequate ventilation.

Environmental precautions: Prevent entry into sewers, waterways, and soil.

Methods for containment and cleanup:

- Small spills: Absorb with inert material (e.g., sand, vermiculite), collect and place in suitable container for disposal.
- Large spills: Dike and pump into recovery vessel if safe; absorb residuals and dispose properly.
- Eliminate ignition sources if present; ground equipment to prevent static discharge.

SECTION 7. HANDLING AND STORAGE

Precautions for safe handling:

- Avoid contact with skin and eyes.
- Do not ingest.
- Avoid breathing mists if aerosolized.
- Use grounding and bonding during transfers to minimize static buildup.

- Use containers and transfer equipment constructed of stainless steel, high-density polyethylene (HDPE), or other materials known to be compatible with methyl esters. Avoid prolonged contact with natural rubber or other elastomers unless they have been confirmed compatible (e.g., Viton, PTFE).
- Keep container tightly closed when not in use.
- Do not store in containers made of materials incompatible with degradation (note: prolonged contact may affect certain elastomers/rubber).

Conditions for safe storage:

- Store in tightly closed, labeled containers in a cool, dry, well-ventilated area away from strong oxidizers. - Store between 5°C and 35°C to maintain product consistency and minimize viscosity increase or potential microbial growth.
- Shelf life / Storage stability: When stored under recommended conditions in compatible containers, product remains within specification for 9 months from date of manufacture.
- Keep out of reach of pets and unauthorized personnel.
- Keep out of reach of pets and unauthorized personnel.
- Keep out of reach of pets and unauthorized personnel.

SECTION 8. EXPOSURE CONTROLS / PERSONAL PROTECTION

Engineering controls: Ventilation to maintain exposures below any applicable limits.

Personal protective equipment:

Type Recommendation
Eye/face protection Safety glasses with side shields or splash goggles
Skin protection Chemical-resistant gloves (e.g., nitrile)

4

Type Recommendation
Respiratory protection
Not normally required; if mist or aerosol is generated, use appropriate respirator for organic vapors
- Eye/face: Safety glasses with side shields or splash goggles.
- Skin: Chemical-resistant gloves (e.g., nitrile).
- Respiratory: Not normally required; if mist or aerosol is generated and exposure limits are a concern, use appropriate respirator following assessment.
Hygiene: Wash hands after handling; do not eat/drink/ smoke in handling areas.

SECTION 9. PHYSICAL AND CHEMICAL PROPERTIES

Appearance: Amber liquid.

Odor: Slight, characteristic (mild vegetable ester).

pH: Neutral (typical).

Flash point: Closed cup: >93°C (>199°F).

Boiling point: >140°C (typical decomposition range).

Vapor pressure: Low at ambient temperature.

Relative density: Approx. 0.86–0.89 g/mL.

Viscosity: Kinematic at 40°C: <5 cSt (typical).

Solubility: Insoluble in water (may form emulsions under agitation).

Explosive limits: Not applicable / not available.

SECTION 10. STABILITY AND REACTIVITY

Reactivity: Not reactive under normal conditions.

Chemical stability: Stable under recommended storage conditions.

Conditions to avoid: Excessive heat, strong oxidizing agents.

Incompatible materials: Strong oxidizers. Prolonged contact with certain rubbers/elastomers can cause degradation.

Hazardous decomposition products: Under extreme heat, may produce carbon monoxide, carbon dioxide, and other typical combustion products.

SECTION 11. TOXICOLOGICAL INFORMATION

Acute toxicity: Low oral and dermal toxicity; aspiration hazard if swallowed.

Skin corrosion/irritation: Causes mild skin irritation with prolonged contact (defatting).

Serious eye damage/irritation: Causes eye irritation.

Respiratory or skin sensitization: Not expected to be a sensitizer.

Carcinogenicity: Not classified.

5

Clarification: This formulation does not contain combustion-derived particulate matter or other known human carcinogens commonly associated with fuel combustion emissions.

Mutagenicity / Reproductive toxicity / STOT: No known significant effects at typical exposure. **Aspiration hazard:** Category 1 – can cause chemical pneumonitis if aspirated.

SECTION 12. ECOLOGICAL INFORMATION

Ecotoxicity: Low acute toxicity to aquatic organisms; biodegradable.

Persistence and degradability: Readily biodegradable under aerobic conditions.

Bioaccumulative potential: Low potential.

Mobility in soil: Low water solubility reduces migration; may adsorb to sediments. **Other adverse effects:** None known under normal use.

SECTION 13. DISPOSAL CONSIDERATIONS

Waste treatment methods:

- Dispose of in accordance with applicable local/regional/national environmental regulations.
- Do not discharge untreated into drains or surface waters.
- Contaminated packaging should be emptied and can be recycled if cleaned; otherwise, dispose as product residue.

SECTION 14. TRANSPORT INFORMATION

UN Number: Not regulated.

UN Proper Shipping Name: Not applicable.

Transport Hazard Class(es): None.

Packing Group: None.

Environmental hazards: No regulated environmental hazard; avoid release to waterways as product can form surface films affecting oxygen transfer.

Special precautions for user: Transport in closed, secure containers; avoid spills.

SECTION 15. REGULATORY INFORMATION

Comply with Guatemalan regulatory requirements: this product should be managed under the Ley de Protección y Mejoramiento del Medio Ambiente (Decreto 90-97) and any applicable MARN (Ministerio de Ambiente y Recursos Naturales) rules for handling, reporting, and disposal. There is no centralized chemical inventory similar to REACH, but users must consult MARN for environmental permits or notifications if the product is used or disposed of in a way that could impact soil or water. Ensure workplace use meets Ministerio de Trabajo y Previsión Social occupational safety requirements, and labels, safety information, and consumer warnings are provided in Spanish. If imported or exported, comply with SAT customs and any applicable transport regulations; assess whether classification triggers hazardous waste or transport rules and notify authorities accordingly.

Verification advice: End users should verify applicability with Guatemalan authorities (MARN, Ministerio de Trabajo y Previsión Social, SAT) and consult local regulatory or legal counsel if there is any uncertainty about compliance.

SECTION 16. OTHER INFORMATION

Revision history: Modified to remove fuel references; repurposed as solvent/degreaser. **Update trigger:** This SDS will be reviewed annually or upon significant formulation or process change. **Key to abbreviations:** GHS = Globally Harmonized System.

Disclaimer: The information in this SDS is based on current knowledge and experience and is believed to be accurate for the described product. Users should evaluate the suitability of the information for their particular purposes.

Additional Notes:

- **Not for human consumption.**
- **Not to be used on surfaces in direct contact with food.**
- **Keep out of reach of pets and children.**
- **Avoid prolonged contact with rubber/elastomer seals or hoses; inspect compatibility prior to use.** 7