



SAFETY DATA SHEET

US OSHA Hazard Communication Standard (29 CFR 1910.1200) and Canada WHMIS 2015 which includes the amended Hazardous Products Act (HPA) and the Hazardous Products Regulation (HPR)

Issuing Date 03-Apr-2024 Revision Date 01-Nov-2024 Revision Number 2

1. Identification

Product identifier

Product Name Signature Series Ultra-Low Viscosity 100% Synthetic Automatic Transmission Fluid

Other means of identification

Product Code(s) ULV

Synonyms None

Recommended use of the chemical and restrictions on use

Recommended use Transmission fluid

Restrictions on use Avoid formation of mists

Details of the supplier of the safety data sheet

<u>Supplier Address</u>	<u>Manufacturer Address</u>
AMSOIL INC. Bay Adelaide Centre, East Tower 22 Adelaide St. W Toronto, ON, Canada M5H 4E3 T:+1 877-822-5172	AMSOIL INC. One AMSOIL Center Superior, WI 54880, USA T: +1 715-392-7101

E-mail compliance@amsoil.com

Emergency telephone number

Emergency telephone CHEMTREC: Within USA and Canada: 1-800-424-9300
Outside the USA and Canada: +1 703-741-5970
(collect calls accepted) 24/7

2. Hazard(s) identification

Classification

Aspiration hazard	Category 1
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Label elements

Danger

Hazard statements
May be fatal if swallowed and enters airways.



Precautionary Statements - Response

Ingestion
IF SWALLOWED: Immediately call a POISON CENTER or doctor.
Do NOT induce vomiting.
Precautionary Statements - Storage
Store locked up.
Precautionary Statements - Disposal
Dispose of contents and container to an approved waste disposal plant.

Other information
Harmful to aquatic life with long lasting effects.

3. Composition/information on ingredients

Substance

Not applicable.

Mixture

Chemical name	CAS No.	Weight-%
Reaction products of 1-decene, hydrogenated	68649-12-7	0-78.5
Reaction products of 1-decene, 1-dodecene and 1-octene, hydrogenated	163149-28-8	0-78.5
Reaction products of 1-decene and 1-dodecene, hydrogenated	151006-60-9	0-78.5
Base Oil	72623-87-1	7-13
Base oil	64742-54-7	0-5
Base oil	64742-65-0	0-5

*The exact percentage (concentration) of composition has been withheld as a trade secret.

Chemical Additions
The classification as a carcinogen does not apply as it can be shown that the substance(s) contain(s) less than 3% DMSO extract as measured by IP 346.

4. First-aid measures

Description of first aid measures

General advice	Immediate medical attention is required. Show this safety data sheet to the doctor in attendance.
Inhalation	Aspiration into lungs can produce severe lung damage. If breathing has stopped, give artificial respiration. Get medical attention immediately. Remove to fresh air. Avoid direct contact with skin. Use barrier to give mouth-to-mouth resuscitation. If breathing is difficult, (trained personnel should) give oxygen. Get immediate medical attention. Delayed

	pulmonary edema may occur.
Eye contact	Rinse thoroughly with plenty of water, also under the eyelids. Remove contact lenses, if present and easy to do. Continue rinsing. Get medical attention if irritation develops and persists.
Skin contact	Wash skin with soap and water. Take off contaminated clothing. Get medical attention if irritation develops and persists.
Ingestion	ASPIRATION HAZARD IF SWALLOWED - CAN ENTER LUNGS AND CAUSE DAMAGE. Do NOT induce vomiting. If vomiting occurs spontaneously, keep head below hips to prevent aspiration. Rinse mouth. Never give anything by mouth to an unconscious person. Get immediate medical attention.
Self-protection of the first aider	Ensure that medical personnel are aware of the material(s) involved, take precautions to protect themselves and prevent spread of contamination. Avoid direct contact with skin. Use barrier to give mouth-to-mouth resuscitation. Use personal protective equipment as required.

Most important symptoms and effects, both acute and delayed

Symptoms	Difficulty in breathing. Coughing and/ or wheezing. Dizziness.
Effects of Exposure	No information available.

Indication of any immediate medical attention and special treatment needed

Note to physicians	Because of the danger of aspiration, emesis or gastric lavage should not be employed unless the risk is justified by the presence of additional toxic substances.
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5. Fire-fighting measures

Suitable Extinguishing Media	Water spray, carbon dioxide (CO2), dry chemical, alcohol-resistant foam. Use extinguishing measures that are appropriate to local circumstances and the surrounding environment.
Unsuitable extinguishing media	Do not use a solid water stream as it may scatter and spread fire.
Specific hazards arising from the chemical	Containers can burst or explode when heated, due to excessive pressure build-up. Thermal decomposition can lead to release of irritating gases and vapors.
Hazardous combustion products	Carbon monoxide, carbon dioxide and unburned hydrocarbons (smoke).
Explosion data	
Sensitivity to mechanical impact	None.
Sensitivity to static discharge	None.
Special protective equipment and precautions for fire-fighters	Firefighters should wear self-contained breathing apparatus and full firefighting turnout gear. Use personal protection equipment.

6. Accidental release measures

Personal precautions, protective equipment and emergency procedures

Personal precautions	Ensure adequate ventilation. Use personal protective equipment as required.
Other information	Refer to protective measures listed in Sections 7 and 8.
For emergency responders	Use personal protection recommended in Section 8.



Methods and material for containment and cleaning up

Methods for containment	Prevent further leakage or spillage if safe to do so.
Methods for cleaning up	Contain and collect spillage with non-combustible absorbent material, (e.g. sand, earth, diatomaceous earth, vermiculite) and place in container for disposal according to local / national regulations (see Section 13). Clean contaminated surface thoroughly. After cleaning, flush away traces with water.
Reference to other sections	For additional information see: Section 8: Exposure controls/personal protection; Section 12: Ecological information; Section 13: Disposal considerations.

7. Handling and storage

Precautions for safe handling

Advice on safe handling	Handle in accordance with good industrial hygiene and safety practice. Avoid contact with used product. Do not eat, drink or smoke when using this product. Take off contaminated clothing and wash before reuse. Wash thoroughly after handling.
Conditions for safe storage, including any incompatibilities	
Storage Conditions	Keep containers tightly closed in a dry, cool and well-ventilated place. Store locked up. Keep out of the reach of children. Store away from other materials.

8. Exposure controls/personal protection

Control parameters

Exposure Limits	The following constituents are the only constituents of the product which have a PEL, TLV or other recommended exposure limit. At this time, the other constituents have no known exposure limits. Under conditions which may generate mists, the following exposure limits are recommended: Long-term exposure limit (8-hour TWA): 5 mg/m³. Short-term exposure limit (15-minute): 10 mg/m³.
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Chemical name	ACGIH TLV	OSHA PEL	NIOSH
Base oil 64742-54-7	TWA: 5 mg/m³(inhalable fraction)	Not applicable N/A	Not applicable N/A
Base oil 64742-65-0	TWA: 5 mg/m³(inhalable fraction)	PEL: 5 mg/m³(mist)	REL: 5 mg/m³(mist) STEL: 10 mg/m³(mist) REL: 350 mg/m³ Ceiling limit: 1,800 mg/m³

Biological occupational exposure limits	This product, as supplied, does not contain any hazardous materials with biological limits established by the region specific regulatory bodies.
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Appropriate engineering controls

Engineering controls	Ensure adequate ventilation, especially in confined areas.
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Individual protection measures, such as personal protective equipment

Eye/face protection	If there is a risk of contact: Wear safety glasses with side shields (or goggles).
Hand protection	If there is a risk of contact: Wear suitable gloves. Ensure that the breakthrough time of the glove material is not exceeded. Refer to glove supplier for information on breakthrough time for specific gloves.



Skin and body protection	If there is a risk of contact: Wear suitable protective clothing.
Respiratory protection	No protective equipment is needed under normal use conditions. If exposure limits are exceeded or irritation is experienced, ventilation and evacuation may be required. In case of mist, spray or aerosol exposure wear suitable personal respiratory protection and protective suit.
Environmental exposure controls	Avoid release to the environment. Local authorities should be advised if significant spillages cannot be contained.
General hygiene considerations	Handle in accordance with good industrial hygiene and safety practice. Do not eat, drink or smoke when using this product. Wash hands before breaks and immediately after handling the product.

9. Physical and chemical properties

Information on basic physical and chemical properties

Appearance	
Physical state	Liquid
Color	Red
Odor	Mild hydrocarbon
Odor threshold	No information available

Property	Values	Remarks • Method
pH		No data available
Melting point / freezing point		No data available
Initial boiling point and boiling range		No data available
Flash point	220 °C / 428.0 °F	Cleveland Open Cup ASTM D 92
Evaporation rate		No data available
Flammability		No data available
Flammability Limit in Air		
Upper flammability or explosive limits		No data available
Lower flammability or explosive limits		No data available
Vapor pressure		No data available
Relative vapor density		No data available
Relative density	0.8309	No data available
Water solubility		No data available
Solubility(ies)		No data available
Partition coefficient		No data available
Autoignition temperature		No data available
Decomposition temperature		No data available
Kinematic viscosity	20.5 cSt @ 40 °C 4.5 cSt @ 100 °C	ASTM D445
Dynamic viscosity		No data available

Other information	
Explosive properties	No information available.
Oxidizing properties	No information available.
Softening point	No information available
Pour Point	-62 °C [ASTM D 97]
Fire Point	242 °C (COC)[ASTM D 92]
Molecular weight	No information available
VOC content	No information available
Liquid Density	No information available
Bulk density	No information available

10. Stability and reactivity

Reactivity	None under normal use conditions.
Chemical stability	Stable under normal conditions.
Possibility of hazardous reactions	None under normal processing.
Conditions to avoid	None known based on information supplied.
Incompatible materials	None known based on information supplied.
Hazardous decomposition products	Thermal decomposition can lead to release of irritating gases and vapors. Carbon monoxide, carbon dioxide and unburned hydrocarbons (smoke).

11. Toxicological information

Information on likely routes of exposure

Inhalation	Specific test data for the substance or mixture is not available. Aspiration into lungs can produce severe lung damage. May cause pulmonary edema. Pulmonary edema can be fatal. May cause irritation of respiratory tract.
Eye contact	Specific test data for the substance or mixture is not available. May cause irritation.
Skin contact	Repeated exposure may cause skin dryness or cracking.
Ingestion	Specific test data for the substance or mixture is not available. Potential for aspiration if swallowed. May cause lung damage if swallowed. Aspiration may cause pulmonary edema and pneumonitis. May be fatal if swallowed and enters airways.

Symptoms related to the physical, chemical and toxicological characteristics

Symptoms	Difficulty in breathing. Coughing and/ or wheezing. Dizziness.
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Acute toxicity

Numerical measures of toxicity
Based on available data, the classification criteria are not met

Component Information

Chemical name	Oral LD50	Dermal LD50	Inhalation LC50
Reaction products of 1-decene, hydrogenated	> 5000 mg/kg (Rat)	> 2000 mg/kg (Rat)	-
Reaction products of 1-decene and 1-dodecene, hydrogenated	-	-	< 4800 mg/m³ (Rat) 4 h
Base Oil	> 5000 mg/kg (Rat)	> 2000 mg/kg (Rabbit)	>5 mg/L (Rat) 4 h
Base oil	> 5000 mg/kg (Rat)	> 5000 mg/kg (Rabbit)	> 5530 mg/m³ (Rat) 4 h
Base oil	> 5000 mg/kg (Rat)	> 5000 mg/kg (Rabbit)	> 5530 mg/m³ (Rat) 4 h

Delayed and immediate effects as well as chronic effects from short and long-term exposure

Skin corrosion/irritation	No information available.
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Serious eye damage/eye irritation No information available.

Respiratory or skin sensitization No information available.

Germ cell mutagenicity No information available.

Carcinogenicity The supplier declares that it can be shown that the substance(s) contain less than 3% DMSO extract as measured by IP 346.

The table below indicates whether each agency has listed any ingredient as a carcinogen.

Chemical name	ACGIH	IARC	NTP	OSHA
Base oil 64742-54-7	A2	Group 1	Known	x
Base oil 64742-65-0	A2	-	Known	X

Legend
ACGIH (American Conference of Governmental Industrial Hygienists)
A2 - Suspected Human Carcinogen
IARC (International Agency for Research on Cancer)
Group 1 - Carcinogenic to Humans
NTP (National Toxicology Program)
Known - Known Carcinogen
Occupational Safety and Health Administration of the US Department of Labor
X - Present

Reproductive toxicity No information available.

STOT - single exposure No information available.

STOT - repeated exposure No information available.

Aspiration hazard May be fatal if swallowed and enters airways.

12. Ecological information

Ecotoxicity Harmful to aquatic life with long lasting effects.

Chemical name	Algae/aquatic plants	Fish	Toxicity to microorganisms	Crustacea
Base Oil 72623-87-1	-	LC50: >5000mg/L (96h, Oncorhynchus mykiss)	-	EC50: >1000mg/L (48h, Daphnia magna)
Base oil 64742-54-7	-	LC50: >5000mg/L (96h, Oncorhynchus mykiss)	-	EC50: >1000mg/L (48h, Daphnia magna)
Base oil 64742-65-0	-	LC50: >5000mg/L (96h, Oncorhynchus mykiss)	-	EC50: >1000mg/L (48h, Daphnia magna)

Persistence and degradability No information available.

Bioaccumulation There is no data for this product.

Component Information

Chemical name	Partition coefficient
Reaction products of 1-decene, hydrogenated 68649-12-7	5

Other adverse effects No information available.



13. Disposal considerations

Disposal methods

Waste from residues/unused products	Dispose of in accordance with local regulations, Dispose of waste in accordance with environmental legislation.
Contaminated packaging	Do not reuse empty containers.

14. Transport information

DOT	Not regulated
TDG	Not regulated
IATA	Not regulated
IMDG	Not regulated

15. Regulatory information

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

International Regulations

- The Montreal Protocol on Substances that Deplete the Ozone Layer Not applicable
- The Stockholm Convention on Persistent Organic Pollutants Not applicable
- The Rotterdam Convention Not applicable

International Inventories

Contact supplier for inventory compliance status

US Federal Regulations

SARA 313

Section 313 of Title III of the Superfund Amendments and Reauthorization Act of 1986 (SARA). This product does not contain any chemicals which are subject to the reporting requirements of the Act and Title 40 of the Code of Federal Regulations, Part 372.

SARA 311/312 Hazard Categories

Should this product meet EPCRA 311/312 Tier reporting criteria at 40 CFR 370, refer to Section 2 of this SDS for appropriate classifications.

CWA (Clean Water Act)

This product does not contain any substances regulated as pollutants pursuant to the Clean Water Act (40 CFR 122.21 and 40 CFR 122.42).

CERCLA

This material, as supplied, does not contain any substances regulated as hazardous substances under the Comprehensive Environmental Response Compensation and Liability Act (CERCLA) (40 CFR 302) or the Superfund Amendments and Reauthorization Act (SARA) (40 CFR 355). There may be specific reporting requirements at the local, regional, or state level pertaining to releases of this material.



US State Regulations

California Proposition 65

This product contains the following Proposition 65 chemicals:

Chemical name	California Proposition 65
Ethylbenzene - 100-41-4	Carcinogen
Sulfur dioxide - 7446-09-5	Developmental
Naphthalene - 91-20-3	Carcinogen
Methanol - 67-56-1	Developmental
Trimethyl phosphate - 512-56-1	Carcinogen
Benzene - 71-43-2	Carcinogen Developmental Male Reproductive
Toluene - 108-88-3	Developmental
Lead - 7439-92-1	Carcinogen Developmental Female Reproductive Male Reproductive
Cadmium - 7440-43-9	Carcinogen Developmental Male Reproductive

U.S. State Right-to-Know Regulations

Chemical name	New Jersey	Massachusetts	Pennsylvania
Base oil 64742-55-8	-	X	-
Base oil 64742-56-9	-	X	-
Dibutyl phosphonate 1809-19-4	-	X	X
Xylene 1330-20-7	X	X	X
Ethylbenzene 100-41-4	X	X	X
Sulfur dioxide 7446-09-5	X	X	X
Naphthalene 91-20-3	X	X	X
Methanol 67-56-1	X	X	X
Trimethyl phosphate 512-56-1	-	X	-
Benzene 71-43-2	X	X	X
Phosphoric acid 7664-38-2	X	X	X
Toluene 108-88-3	X	X	X
Arsenic 7440-38-2	X	X	X
Lead 7439-92-1	X	X	X
Phenol,	X	X	X

2,6-bis(1,1-dimethylethyl)-4-met hyl- 128-37-0			
Cadmium 7440-43-9	X	X	X

U.S. EPA Label Information

EPA Pesticide Registration Number Not applicable

16. Other information

NFPA	Health hazards 2	Flammability 1	Instability 0	Special hazards -
HMIS	Health hazards 2	Flammability 1	Physical hazards 0	Personal protection X

Key or legend to abbreviations and acronyms used in the safety data sheet

Legend
SVHC: Substances of Very High Concern for Authorization:
PBT: Persistent, Bioaccumulative, and Toxic (PBT) Substances
vPvB: Very Persistent and very Bioaccumulative (vPvB) Substances
STOT: Specific Target Organ Toxicity
ATE: Acute Toxicity Estimate
LC50: 50% Lethal Concentration
LD50: 50% Lethal Dose

Legend Section 8: Exposure controls/personal protection			
TWA	TWA (time-weighted average)	STEL	STEL (Short Term Exposure Limit)
Ceiling	Maximum limit value	Sk*	Skin designation
+	Sensitizers		

Key literature references and sources for data used to compile the SDS

U.S. Environmental Protection Agency ChemView Database
European Food Safety Authority (EFSA)
Environmental Protection Agency
Acute Exposure Guideline Level(s) (AEGL(s))
U.S. Environmental Protection Agency Federal Insecticide, Fungicide, and Rodenticide Act
U.S. Environmental Protection Agency High Production Volume Chemicals
Food Research Journal
Hazardous Substance Database
International Uniform Chemical Information Database (IUCLID)
Japan GHS Classification
Australia National Industrial Chemicals Notification and Assessment Scheme (NICNAS)
NIOSH (National Institute for Occupational Safety and Health)
National Library of Medicine's ChemID Plus (NLM CIP)
U.S. National Toxicology Program (NTP)
New Zealand's Chemical Classification and Information Database (CCID)
Organization for Economic Co-operation and Development Environment, Health, and Safety Publications
Organization for Economic Co-operation and Development High Production Volume Chemicals Program
Organization for Economic Co-operation and Development Screening Information Data Set
World Health Organization

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Revision Note	SDS sections updated: 2, 3, 8, 11, 12, 15.

Disclaimer



The information provided in this Safety Data Sheet is correct to the best of our knowledge, information and belief at the date of its publication. The information given is designed only as a guidance for safe handling, use, processing, storage, transportation, disposal and release and is not to be considered a warranty or quality specification. The information relates only to the specific material designated and may not be valid for such material used in combination with any other materials or in any process, unless specified in the text.

End of Safety Data Sheet

