SAFETY DATA SHEET

AESUB yellow

SECTION 1: Identification

1.1. Product identifier

Trade name

AESUB yellow

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

Relevant identified uses of the substance or mixture

Industrial purposes, Paint

Uses advised against

None known.

1.3. Details of the supplier of the safety data sheet

Company and address

Scanningspray Vertriebs GmbH
Johann-Strauss-Str. 13
45657 Recklinghausen
Germany
+49 (0)2361 8903 357
info@aesub.com

Contact person

Max Liese

E-mail

liese@aesub.com

SDS date

2023-05-30

SDS Version

1.0

1.4. Emergency telephone number

In an emergency call 911
Alberta / Northwestern Territories (PADIS): 1-800-332-1414
British Columbia (DPIC): 1-800-567-8911
Manitoba: 1-855-7POISON (1-855-776-4766)
New Brunswick: 911
Nova Scotia / Prince Edward Island (IWK): 1-800-565-8161
Ontario (OPC): 1-800-268-9017
Québec (CAPQ): 1-800-463-5060
Saskatchewan (PADIS): 1-866-454-1212
Yukon Territory: (867) 393-8700
Transport emergenices: Call CANUTEC at 1-888-CAN-UTEC (226-8832), 613-996-6666 or *666 on a cellular phone (24 hours)
See also section 4 “First aid measures”.

SECTION 2: Hazard(s) identification

2.1. Classification of the substance or mixture

Flam. Liq. 2; H225, Highly flammable liquid and vapour.
Asp. Tox. 1; H304, May be fatal if swallowed and enters airways.
Eye Irrit. 2; H319, Causes serious eye irritation.
STOT SE 3; H336, May cause drowsiness or dizziness.

2.2. Label elements

Hazard pictogram(s)

Signal word
Danger

Hazard statement(s)
Highly flammable liquid and vapour. (H225)
May be fatal if swallowed and enters airways. (H304)
Causes serious eye irritation. (H319)
May cause drowsiness or dizziness. (H336)

Precautionary statement(s)

General
-

Prevention
Keep away from heat, hot surfaces, sparks, open flames and other ignition sources. No smoking. (P210)
Keep container tightly closed. (P233)
Avoid breathing mist/vapour. (P261)
Wear face protection/protective gloves/protective clothing. (P280)

Response
IF SWALLOWED: Immediately call a POISON CENTER/doctor. (P301+P310)
Call a POISON CENTER/doctor if you feel unwell. (P312)
Do NOT induce vomiting. (P331)
If eye irritation persists: Get medical advice/attention. (P337+P313)
In case of fire: Use water mist/carbon dioxide/alcohol-resistant foam to extinguish. (P370+P378)

Storage
Store in a well-ventilated place. Keep container tightly closed. (P403+P233)
Store in a well-ventilated place. Keep cool. (P403+P235)

Disposal
Dispose of contents/container in accordance with local regulation. (P501)

Hazardous substances
cyclopentane
propan-2-ol;isopropyl alcohol;isopropanol
Lemon, ext.

Additional labelling
Not applicable.

2.3. Other hazards

Additional warnings
This mixture/product does not contain any substances considered to meet the criteria classifying them as PBT and/or vPvB.

SECTION 3: Composition/Information on Ingredients

3.1. Substances
Not applicable. This product is a mixture.

3.2. Mixtures

Product/substance	Identifiers	% w/w	Classification	Note
ethanol;ethyl alcohol	CAS No.: 64-17-5	50-75%	Flam. Liq. 2, H225 Eye Irrit. 2, H319 (SCL: 50.00 %)	
cyclopentane	CAS No.: 287-92-3	10-25%	Flam. Liq. 2, H225 Asp. Tox. 1, H304 STOT SE 3, H336	
propan-2-ol;isopropyl alcohol;isopropanol	CAS No.: 67-63-0	10-15%	Flam. Liq. 2, H225 Eye Irrit. 2, H319 STOT SE 3, H336	

See full text of H-phrases in section 16. Occupational exposure limits are listed in section 8, if these are available.

Other information
None known.

SECTION 4: First-aid measures

4.1. Description of first aid measures

General information

If breathing is irregular, drowsiness, loss of consciousness or cramps: Call 911 and give immediate treatment (first aid).
Contact a doctor if in doubt about the injured person's condition or if the symptoms persist. Never give an unconscious person water or other drink.

Inhalation

Upon breathing difficulties or irritation of the respiratory tract: Bring the person into fresh air and stay with him/her.

Skin contact

Remove contaminated clothing and shoes immediately. Ensure to wash exposed skin thoroughly with water and soap. Skin cleanser can be used. DO NOT use solvents or thinners.
If skin irritation occurs: Get medical advice/attention.

Eye contact

Upon irritation of the eye: Remove contact lenses. Flush eyes immediately with plenty of water or isotonic water (20-30 °C) for at least 5 minutes and continue until irritation stops. Make sure to flush under upper and lower eyelids. If irritation continues, contact a doctor. Continue flushing during transport.

Ingestion

IF SWALLOWED: Immediately call a POISON CENTER/doctor.
Do not induce vomiting! If vomiting occurs, keep head facing down so that vomit does not get into the lungs. Call a doctor or ambulance. Symptoms of chemical pneumonia can appear after several hours. People who have swallowed the product should therefore be kept under medical attention for at least 48 hours.

Burns

Rinse with water until pain stops then continue to rinse for 30 minutes.

4.2. Most important symptoms and effects, both acute and delayed

This product contains substances that can cause chemical pneumonia if swallowed. Symptoms of chemical pneumonia may appear after several hours.
Neurotoxic effects: This product contains organic solvents, which may cause adverse effects to the nervous system. Symptoms of neurotoxicity include: loss of appetite, headache, dizziness, ringing in ears, tingling sensations of skin, sensitivity to the cold, cramps, difficulty in concentrating, tiredness, etc. Repeated exposure to solvents can result in the breaking down of the skin's natural fat layer and may result in an increased absorption potential of other hazardous substances at the area of exposure.

4.3. Indication of any immediate medical attention and special treatment needed

IF exposed or concerned:
Get immediate medical advice/attention.

Information to medics

Bring this safety data sheet or the label from this product.

SECTION 5: Fire-fighting measures

5.1. Extinguishing media

Suitable extinguishing media: Alcohol-resistant foam, carbon dioxide, powder, water mist.
Unsuitable extinguishing media: Waterjets should not be used, since they can spread the fire.

5.2. Special hazards arising from the substance or mixture

Fire will result in dense smoke. Exposure to combustion products may harm your health. Closed containers, which are exposed to fire, should be cooled with water. Do not allow fire-extinguishing water to enter the sewage system and nearby surface waters.
If the product is exposed to high temperatures, e.g. in the event of fire, dangerous decomposition compounds are produced. These are:
Carbon oxides (CO / CO2)

5.3. Advice for firefighters

Wear self-contained breathing apparatus and protective clothing to prevent contact. Upon direct exposure contact a poison centre in order to obtain further advice. See section 1 "Emergency telephone number".

SECTION 6: Accidental release measures

6.1. Personal precautions, protective equipment and emergency procedures

Storages not yet ignited must be cooled by water mist. Remove flammable materials if conditions allow it. Ensure sufficient ventilation.
Avoid direct contact with spilled substances.
Avoid inhalation of vapours from spilled material.

6.2. Environmental precautions

Avoid discharge to lakes, streams, sewers, etc.

6.3. Methods and material for containment and cleaning up

Contain and collect spillage with non-combustible, absorbent material e.g. sand, earth, vermiculite or diatomaceous earth and place in container for disposal according to local regulations.
Wherever possible cleaning should be performed with normal cleaning agents. Avoid use of solvents.

6.4. Reference to other sections

See section 13 “Disposal considerations” on handling of waste.
See section 8 "Exposure controls/personal protection" for protective measures.

SECTION 7: Handling and storage

7.1. Precautions for safe handling

Ground and bond container and receiving equipment.
Use explosion-proof [electrical/lighting/ventilating] equipment.
Use non-sparking tools.
Take action to prevent static discharges.
Because of the danger of self-ignition, any waste from the product, spray mist and soiled rags etc. are to be kept in a fire-proof place in air-tight containers, alternatively the waste is to be burned.
The product should be tested for peroxides before distillation or evaporation and tested for peroxide formation or discarded after 1 year.
Peroxide formation may be present anywhere in the container, including the sides, bottom, exterior and threaded cap. Peroxide formation in ppm concentrations may not be visually observable and must be identified through the use of appropriate testing procedures. If any of the following conditions exist, the material may be explosively unstable and will require stabilization prior to use:
1. Material appears to be degraded and or contaminated.
2. Material appears to be discolored.
3. Deterioration or distortion of storage container.
4. Thermal shock (sunlight).
5. Age of material exceeds recommended storage time.
Avoid direct contact with the product.
Smoking, drinking and consumption of food is not allowed in the work area.
See section 8 "Exposure controls/personal protection" for information on personal protection.

7.2. Conditions for safe storage, including any incompatibilities

Store in tightly closed containers and store protected from moisture and light. Containers should be dated when opened and tested periodically for the presence of peroxides. Do not exceed storage time limits.
Containers that have been opened must be carefully resealed and kept upright to prevent leakage.
Take action to prevent static discharges.
Must be stored in a cool and well-ventilated area, away from possible sources of ignition.

Recommended storage material

Keep only in original packaging.

Storage temperature

Dry, cool and well ventilated

Incompatible materials

Flammable liquids

7.3. Specific end use(s)

This product should only be used for applications quoted in section 1.2.

SECTION 8: Exposure controls/personal protection

8.1. Control parameters

ALBERTA

ethanol;ethyl alcohol
Long term exposure limit (8 hours) (ppm): 1000
Long term exposure limit (8 hours) (mg/m³): 1880

cyclopentane

Long term exposure limit (8 hours) (ppm): 600
Long term exposure limit (8 hours) (mg/m³): 1720

propan-2-ol;isopropyl alcohol;isopropanol
Long term exposure limit (8 hours) (ppm): 200
Long term exposure limit (8 hours) (mg/m³): 492
Short term exposure limit (15 minutes) (ppm): 400
Short term exposure limit (15 minutes) (mg/m³): 984

Occupational Health and Safety Code 2009 Order, Alta Reg 87/2009 (revised in 2018)

BRITISH COLUMBIA
ethanol;ethyl alcohol
Short-Term Exposure Limit (STEL) / Ceiling Limit (C): 1000 ppm

cyclopentane
Time-Weighted Average Limit (TWA): 600 ppm

propan-2-ol;isopropyl alcohol;isopropanol
Time-Weighted Average Limit (TWA): 200 ppm
Short-Term Exposure Limit (STEL) / Ceiling Limit (C): 400 ppm

OHS Regulation Part 5: Chemical Agents and Biological Agents.

ONTARIO
ethanol;ethyl alcohol
Short-Term Exposure Limit (STEL) / Ceiling Limit (C): 1,000 ppm

cyclopentane
Time-Weighted Average Limit (TWA): 600 ppm

propan-2-ol;isopropyl alcohol;isopropanol
Time-Weighted Average Limit (TWA): 200 ppm
Short-Term Exposure Limit (STEL) / Ceiling Limit (C): 400 ppm

Regulation 833 (Control of Exposure to Biological or Chemical Agents) and Ontario Regulation 490/09 (Designated Substances)

QUEBEC
cyclopentane
Long term exposure limit (8 hours) (ppm): 600
Long term exposure limit (8 hours) (mg/m³): 1720

propan-2-ol;isopropyl alcohol;isopropanol
Long term exposure limit (8 hours) (ppm): 400
Long term exposure limit (8 hours) (mg/m³): 985

Regulation respecting occupational health and safety (Chapter S-2.1, r. 13)

SASKATCHEWAN
ethanol;ethyl alcohol
Long term exposure limit (8 hours) (ppm): 1000
Short term exposure limit (15 minutes) (ppm): 1250

cyclopentane
Long term exposure limit (8 hours) (ppm): 600
Short term exposure limit (15 minutes) (ppm): 900

propan-2-ol;isopropyl alcohol;isopropanol
Long term exposure limit (8 hours) (ppm): 200
Short term exposure limit (15 minutes) (ppm): 400

The Occupational Health and Safety Regulations, 2020, Chapter S15.1 Reg 10.

8.2. Exposure controls

Compliance with the given occupational exposure limits values should be controlled on a regular basis.

General recommendations

Smoking, drinking and consumption of food is not allowed in the work area.

Exposure scenarios

There are no exposure scenarios implemented for this product.

Exposure limits

Professional users are subjected to the legally set maximum concentrations for occupational exposure. See occupational hygiene limit values above.

Appropriate technical measures

The formation of vapours must be kept at a minimum and below current limit values (see above). Installation of a local exhaust system if normal air flow in the work room is not sufficient is recommended. Ensure eyewash and emergency showers are clearly marked.

Hygiene measures

In between use of the product and at the end of the working day all exposed areas of the body must be washed thoroughly. Always wash hands, forearms and face.

Measures to avoid environmental exposure

Keep damming materials near the workplace. If possible, collect spillage during work.

Individual protection measures, such as personal protective equipment

Generally

Use only protective equipment with a recognized certification mark, e.g. the UL mark.

Respiratory Equipment

Type	Class	Colour	Standards	
Combination filter A2B2E2K2-P2	Class 2	Brown/Gray/Yellow/Green /White	EN14387	

Skin protection

Recommended	Type/Category	Standards	
Dedicated work clothing should be worn.	-	-	

Hand protection

Material	Glove thickness (mm)	Breakthrough time (min.)	Standards	
Butyl	0,7	> 240	EN374-2, EN374-3, EN388, EN421	

Eye protection

Type	Standards	
Face shield alternatively safety glasses with side shields.	EN166	

SECTION 9: Physical and chemical properties

9.1. Information on basic physical and chemical properties

Physical state

Liquid

Colour

Transparent

Odour

Characteristic

Odour threshold (ppm)

Testing not relevant or not possible due to the nature of the product.

pH

Testing not relevant or not possible due to the nature of the product.

Density (g/cm³)
Testing not relevant or not possible due to the nature of the product.
Kinematic viscosity
Testing not relevant or not possible due to the nature of the product.
Phase changes
Melting point (°C)
-97,8
Boiling point (°C)
49.3 @ 760 mmHg
Vapour pressure
Testing not relevant or not possible due to the nature of the product.
Vapour density
Testing not relevant or not possible due to the nature of the product.
Decomposition temperature (°C)
Testing not relevant or not possible due to the nature of the product.
Evaporation rate (n-butylacetate = 100)
Data on fire and explosion hazards
Flash point (°C)
-25 @ 1.013
Flammability (°C)
The material is ignitable (361 °C).
Auto-ignition temperature (°C)
Testing not relevant or not possible due to the nature of the product.
Explosion limits (% v/v)
1.1 - 13.5
Solubility
Solubility in water
Testing not relevant or not possible due to the nature of the product.
n-octanol/water coefficient
Testing not relevant or not possible due to the nature of the product.
Solubility in fat (g/L)
Testing not relevant or not possible due to the nature of the product.
9.2. Other information
VOC (g/L)
715
Other physical and chemical parameters
No data available.

SECTION 10: Stability and reactivity

10.1. Reactivity
No data available.
10.2. Chemical stability
The product is stable under the conditions, noted in section 7 “Handling and storage”.
10.3. Possibility of hazardous reactions
None known.
10.4. Conditions to avoid
Avoid static electricity.
Do not expose to any forms of heat (e.g. solar radiation). May lead to excess pressure.
10.5. Incompatible materials
Flammable liquids
10.6. Hazardous decomposition products
The product is not degraded when used as specified in section 1.

SECTION 11: Toxicological information

11.1. Information on toxicological effects
Acute toxicity
Based on available data, the classification criteria are not met.

Skin corrosion/irritation
Based on available data, the classification criteria are not met.

Serious eye damage/irritation
Causes serious eye irritation.

Respiratory sensitisation
Based on available data, the classification criteria are not met.

Skin sensitisation
Based on available data, the classification criteria are not met.

Germ cell mutagenicity
Based on available data, the classification criteria are not met.

Carcinogenicity
Based on available data, the classification criteria are not met.

Reproductive toxicity
Based on available data, the classification criteria are not met.

STOT-single exposure
May cause drowsiness or dizziness.

STOT-repeated exposure
Based on available data, the classification criteria are not met.

Aspiration hazard
May be fatal if swallowed and enters airways.

Long term effects
Irritation effects: This product contains substances, which may cause irritation upon exposure to skin, eyes or lungs. Exposure may result in an increased absorption potential of other hazardous substances at the area of exposure. Neurotoxic effects: This product contains organic solvents, which may cause adverse effects to the nervous system. Symptoms of neurotoxicity include: loss of appetite, headache, dizziness, ringing in ears, tingling sensations of skin, sensitivity to the cold, cramps, difficulty in concentrating, tiredness, etc. Repeated exposure to solvents can result in the breaking down of the skin's natural fat layer and may result in an increased absorption potential of other hazardous substances at the area of exposure.

Other information
propan-2-ol;isopropyl alcohol;isopropanol has been classified by IARC as a group 3 carcinogen.

SECTION 12: Ecological information

12.1. Toxicity

Product/substance	cyclopentane
Species:	Fish
Duration:	96 hours
Test:	LL50
Result:	29.3 mg/L

Product/substance	propan-2-ol;isopropyl alcohol;isopropanol
Species:	Fish
Duration:	96 hours
Test:	LC50
Result:	10000 mg/L

Product/substance	propan-2-ol;isopropyl alcohol;isopropanol
Species:	Crustacean
Duration:	24 hours
Test:	LC50
Result:	10000 mg/L

12.2. Persistence and degradability

Product/substance	ethanol;ethyl alcohol
Biodegradable:	Yes
Test method:	
Result:	69% 5d

Product/substance	cyclopentane
Biodegradable:	No
Test method:	
Result:	0% 28d

12.3. Bioaccumulative potential

Product/substance ethanol;ethyl alcohol
Test method:
Potential bioaccumulation: No
LogPow: -0,77
BCF: No data available.
Other information:

Product/substance cyclopentane
Test method:
Potential bioaccumulation: No data available.
LogPow: 3 (pH: 7, 25 °C)
BCF: 70,8
Other information:

12.4. Mobility in soil

No data available.

12.5. Results of PBT and vPvB assessment

This mixture/product does not contain any substances considered to meet the criteria classifying them as PBT and/or vPvB.

12.6. Other adverse effects

None known.

SECTION 13: Disposal considerations

Waste treatment methods

None of the components are listed

Specific labelling

Contaminated packing

Packaging containing residues of the product must be disposed of similarly to the product.

SECTION 14: Transport information

	14.1 UN / ID	14.2 UN proper shipping name	14.3 Hazard class(es)	14.4 PG*	14.5 Env**	Other information:
DOT	UN1263	PAINT	Transport hazard class: 3 Label: 3 Classification code: F1 	II	No	Limited quantities: 5 L Tunnel restriction code: (D/E) See below for additional information.
IMDG	UN1263	PAINT RELATED MATERIAL	Transport hazard class: 3 Label: 3 Classification code: F1 	II	No	Limited quantities: 5 L EmS: F-E S-E See below for additional information.
IATA	UN1263	PAINT	Transport hazard class: 3 Label: 3 Classification code: F1 	II	No	See below for additional information.

* Packing group
** Environmental hazards

Additional information

ADR / See Table A, Section 3.2.1 for any information on special provisions, requirements, or warnings in connection

with transport. See section 5.4.3, for instructions in writing regarding mitigation of damages in relation to incidents or accidents during transport.
IMDG / See section 3.2.1, for any information on special provisions, requirements, or warnings in connection with transport.
IATA / See Table 4.2 for any information on special provisions, requirements, or warnings in connection with transport.
This product is within scope of the regulations of transport of dangerous goods.

14.6. Special precautions for user

Not applicable.

14.7. Transport in bulk according to Annex II of Marpol and the IBC Code

No data available.

SECTION 15: Regulatory information

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

15.2. Canadian lists

DSL / NDSL

ethanol;ethyl alcohol is listed in the non-confidential portion of DSL / NDSL
cyclopentane is listed in the non-confidential portion of DSL / NDSL
propan-2-ol;isopropyl alcohol;isopropanol is listed in the non-confidential portion of DSL / NDSL

15.4. Restrictions for application

Restricted to professional users.
People under the age of 18 shall not be exposed to this product.
Pregnant women and women breastfeeding must not be exposed to this product. The risk, and possible technical precautions or design of the workplace needed to eliminate exposure, must be considered.

15.5. Demands for specific education

No specific requirements.

Additional information

Not applicable.

15.7. Chemical safety assessment

No

Sources

Hazardous Products Regulations (SOR/2015-17)

SECTION 16: Other information

Full text of H-phrases as mentioned in section 3

H225, Highly flammable liquid and vapour.
H304, May be fatal if swallowed and enters airways.
H319, Causes serious eye irritation.
H336, May cause drowsiness or dizziness.

The full text of identified uses as mentioned in section 1

None known.

Abbreviations and acronyms

ANSI = American National Standards Institute
ATE = Acute Toxicity Estimate
BCF = Bioconcentration Factor
CAS = Chemical Abstracts Service
DSL = Domestic Substances List
NDSL = Non-domestic substances list
GHS = Globally Harmonized System of Classification and Labelling of Chemicals
HHNOC = Health Hazards Not Otherwise Classified
IARC = International Agency for Research on Cancer
IATA = International Air Transport Association
IMDG = International Maritime Dangerous Goods
LogPow = logarithm of the octanol/water partition coefficient
MARPOL = International Convention for the Prevention of Pollution From Ships, 1973 as modified by the Protocol of 1978. ("Marpol" = marine pollution)
OECD = Organisation for Economic Co-operation and Development
PBT = Persistent, Bioaccumulative and Toxic
PHNOC = Physical Hazards Not Otherwise Classified

RID = The Regulations concerning the International Carriage of Dangerous Goods by Rail
SCL = A specific concentration limit.
SOR = Statutory Orders and Regulations
STEL = Short-term exposure limits
STOT-RE = Specific Target Organ Toxicity - Repeated Exposure
STOT-SE = Specific Target Organ Toxicity - Single Exposure
TWA = Time weighted average
UN = United Nations
UVBC = Unknown or variable composition, complex reaction products or of biological materials
VOC = Volatile Organic Compound
vPvB = Very Persistent and Very Bioaccumulative
WHIMS = Workplace Hazardous Materials Information System

Additional information

The classification of the mixture in regard of health hazards is in accordance with the calculation methods given by WHMIS 2015
The classification of the mixture in regard to physical hazards has been based on experimental data.

The safety data sheet is validated by

Max Liese

Other

A change (in proportion to the last essential change (first cipher in SDS version, see section 1)) is marked with a blue triangle.
The information in this safety data sheet applies only to this specific product (mentioned in section 1) and is not necessarily correct for use with other chemicals/products.
It is recommended to hand over this safety data sheet to the actual user of the product. Information in this safety data sheet cannot be used as a product specification.
Country-language: CA-en