

1 Identification

Product identifier**Trade name:** Original ATE Brake Fluid TYP 200 (DOT 4)**Article number:** 03.9901-62xx.x/7062xx**Relevant identified uses of the substance or mixture and uses advised against**

No further relevant information available.

Application of the substance / the mixture hydraulic liquid**Details of the supplier of the safety data sheet****Manufacturer/Supplier:**

Continental Aftermarket & Services GmbH

Sodener Straße 9

D-65824 Schwalbach am Taunus

Tel: +49-6196-87-0

Information department:

Gefahrstoffmanagement Konzern, Zentrales Materiallabor

ate.sicherheit@contiautomotive.com

Emergency telephone number: +49-6132-84463 (24 h) 190 languages spoken

2 Hazard(s) identification

Classification of the substance or mixture

Health hazard

Suspected of damaging fertility or the unborn child.

Label elements**GHS label elements**

The product is classified and labeled according to the Globally Harmonized System (GHS).

Hazard pictograms GHS08**Signal word** Warning**Hazard-determining components of labeling:**

Tris[2-[2-(2-methoxyethoxy)ethoxy]ethyl] orthoborate

Hazard statements

H361 Suspected of damaging fertility or the unborn child.

Precautionary statements

P201 Obtain special instructions before use.

P202 Do not handle until all safety precautions have been read and understood.

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

P308+P313 IF exposed or concerned: Get medical advice/attention.

P405 Store locked up.

P501 Dispose of contents/container in accordance with local/regional/national/international regulations.

Other hazards**Results of PBT and vPvB assessment****PBT:** Not applicable.**vPvB:** Not applicable.

3 Composition/information on ingredients

Chemical characterization: Mixtures**Description:** Mixture of the substances listed below with nonhazardous additions.

(Contd. on page 2)



Trade name: Original ATE Brake Fluid TYP 200 (DOT 4)

(Contd. of page 1)

Dangerous components:		
30989-05-0	Tris[2-[2-(2-methoxyethoxy)ethoxy]ethyl] orthoborate Toxic to Reproduction 2	≥70-<90%
15520-05-5	2,2'-(Octylimino)bisethanol Eye Damage 1; Acute Toxicity - Oral 4; Skin Irritation 2	≥3-<10%
111-46-6	2,2'-oxybisethanol Acute Toxicity - Oral 4	<5%

Additional information: For the wording of the listed hazard phrases refer to section 16.

4 First-aid measures

Description of first aid measures

General information: Remove contaminated clothes and shoes immediately.

After inhalation: Supply fresh air; consult doctor in case of complaints.

After skin contact: Immediately wash with water and soap and rinse thoroughly.

After eye contact:

Rinse opened eye for several minutes under running water. Then consult a doctor.

After swallowing: Call a doctor immediately.

Information for doctor:

Most important symptoms and effects, both acute and delayed

No further relevant information available.

Indication of any immediate medical attention and special treatment needed

No further relevant information available.

5 Fire-fighting measures

Extinguishing media

Suitable extinguishing agents:

CO₂, extinguishing powder or water spray. Fight larger fires with water spray or alcohol resistant foam.

Use fire fighting measures that suit the environment.

For safety reasons unsuitable extinguishing agents: Water with full jet

Special hazards arising from the substance or mixture

May be released in case of fire: CO, CO₂, NO_x

Advice for firefighters

Protective equipment:

Wear self-contained respiratory protective device.

Do not inhale explosion gases or combustion gases.

Additional information

Dispose of fire debris and contaminated fire fighting water in accordance with official regulations.

6 Accidental release measures

Personal precautions, protective equipment and emergency procedures

Wear protective equipment. Keep unprotected persons away.

Ensure adequate ventilation

Environmental precautions:

Do not allow product to reach sewage system or any water course.

Do not allow to penetrate the ground/soil.

Methods and material for containment and cleaning up:

Absorb with liquid-binding material (sand, diatomite, acid binders, universal binders).

Dispose of the collected material according to regulations.

Reference to other sections

See Section 7 for information on safe handling.

See Section 8 for information on personal protection equipment.

(Contd. on page 3)



Trade name: Original ATE Brake Fluid TYP 200 (DOT 4)

(Contd. of page 2)

See Section 13 for disposal information.

Protective Action Criteria for Chemicals

PAC-1:		
111-46-6	2,2'-oxybisethanol	6.9 ppm
PAC-2:		
111-46-6	2,2'-oxybisethanol	140 ppm
PAC-3:		
111-46-6	2,2'-oxybisethanol	860 ppm

7 Handling and storage

Handling:

Precautions for safe handling Ensure good ventilation/exhaustion at the workplace.

Information about protection against explosions and fires: No special measures required.

Conditions for safe storage, including any incompatibilities

Storage:

Requirements to be met by storerooms and receptacles: Storage at room temperature.

Information about storage in one common storage facility:

Store away from flammable substances.

Store away from foodstuffs.

Further information about storage conditions:

This product is hygroscopic.

Store in dry conditions.

Keep receptacle tightly sealed.

Storage class according to TRGS 510: 10 combustible liquids.

Specific end use(s) No further relevant information available.

8 Exposure controls/personal protection

Additional information about design of technical systems: No further data; see section 7.

Control parameters

Components with limit values that require monitoring at the workplace:

The following constituent is the only constituent of the product which has a PEL, TLV or other recommended exposure limit.

At this time, the other constituents have no known exposure limits.

111-46-6 2,2'-oxybisethanol	
WEEL	Long-term value: 10 mg/m ³

Exposure controls

Personal protective equipment:

General protective and hygienic measures:

The usual precautionary measures for handling chemicals should be followed.

Do not inhale gases / fumes / aerosols.

Avoid contact with the eyes and skin.

Use skin protection cream for skin protection.

Breathing equipment:

Respiratory protection required in case of release of vapors / aerosols.

Use particulate filter with medium retention capacity for solid and liquid particles (eg EN 143 or 149, type P2 or FFP2).

Protection of hands:

The glove material has to be impermeable and resistant to the product/ the substance/ the preparation.

Selection of the glove material on consideration of the penetration times, rates of diffusion and the degradation

(Contd. on page 4)



Safety Data Sheet

acc. to OSHA HCS

Printing date 06/21/2023

Version 7

Reviewed on 05/01/2023

Trade name: Original ATE Brake Fluid TYP 200 (DOT 4)

(Contd. of page 3)

Material of gloves

The selection of the suitable gloves does not only depend on the material, but also on further marks of quality and varies from manufacturer to manufacturer.

Penetration time of glove material

Butyl caoutchouc (butyl rubber): minimum breakthrough time 480 min; minimum layer thickness: 0.7 mm

NBR (nitrile rubber): minimum breakthrough time 30 min; minimum layer thickness: 0.4 mm

The exact break trough time has to be found out by the manufacturer of the protective gloves and has to be observed.

Eye protection: Safety glasses

Body protection: Protective work clothing

Limitation and supervision of exposure into the environment

See section 6 and 7. No additional measures necessary.

9 Physical and chemical properties

Information on basic physical and chemical properties**General Information****Appearance:**

Form:	Fluid
Color:	Yellow
Odor:	Characteristic
Odor threshold:	Not determined.

pH-value at 20 °C (68 °F): 7-8 (50%) (FMVSS 116)

Change in condition

Melting point/Melting range:	<-70 °C (<-94 °F) (DIN 51583)
Boiling point/Boiling range:	>280 °C (>536 °F) (FMVSS 116)

Flash point: 141 °C (285.8 °F) (ASTM D 7094 (closed cup))

Flammability (solid, gaseous): Not applicable.

Auto igniting: >200 °C (>392 °F) (DIN 51794)

Decomposition temperature: ca. 360 °C (ca. 680 °F) (Analogy)

Ignition temperature: Product is not selfigniting.

Danger of explosion: Product does not present an explosion hazard.

Explosion limits:

Lower:	Not determined.
Upper:	Not determined.

Vapor pressure at 20 °C (68 °F): <0.1 hPa (<0.1 mm Hg)

Density at 20 °C (68 °F): 1.07-1.09 g/cm³ (8.929-9.096 lbs/gal) (DIN 51757)

Relative density Not determined.

Vapor density Not determined.

Evaporation rate Not determined.

Water at 20 °C (68 °F): 350 g/l
Soluble.

Partition coefficient (n-octanol/water): Not determined.

Viscosity:

Dynamic:	Not determined.
Kinematic at 20 °C (68 °F):	17-18 mm ² /s (FMVSS 116)

Solvent content:

VOC content: 2.00 %

(Contd. on page 5)



Safety Data Sheet

acc. to OSHA HCS

Printing date 06/21/2023

Version 7

Reviewed on 05/01/2023

Trade name: Original ATE Brake Fluid TYP 200 (DOT 4)

(Contd. of page 4)

Other information

No further relevant information available.

10 Stability and reactivity

Reactivity No further relevant information available.**Chemical stability****Thermal decomposition / conditions to be avoided:**

No decomposition if used according to specifications.

Possibility of hazardous reactions No dangerous reactions known.**Conditions to avoid** Avoid heat, sparks, open flames and other ignition sources.**Incompatible materials:** No further relevant information available.**Hazardous decomposition products:**

Carbon monoxide and carbon dioxide

Nitrogen oxides (NOx)

11 Toxicological information

Information on toxicological effects**Acute toxicity:****LD/LC50 values that are relevant for classification:****30989-05-0 Tris[2-[2-(2-methoxyethoxy)ethoxy]ethyl] orthoborate**

Oral LD50 >2,000 mg/kg (rat) (OECD 401)

Dermal LD50 >2,000 mg/kg (rat) (OECD 402)

15520-05-5 2,2'-(Octylimino)bisethanol

Oral LD50 1,157 mg/kg (rat) (OECD 401)

Dermal LD50 >2,000 mg/kg (rat) (OECD 402)

111-46-6 2,2'-oxybisethanol

Oral LD50 >5,000 mg/kg (rat)

Dermal LD50 >5,000 mg/kg (rabbit)

Primary irritant effect:**on the skin:** Based on available data, the classification criteria are not met.**on the eye:** Based on available data, the classification criteria are not met.**Sensitization:** Based on available data, the classification criteria are not met.**Additional toxicological information:****Carcinogenic categories****IARC (International Agency for Research on Cancer)**

None of the ingredients are listed.

NTP (National Toxicology Program)

None of the ingredients are listed.

OSHA-Ca (Occupational Safety & Health Administration)

None of the ingredients are listed.

Germ cell mutagenicity Based on available data, the classification criteria are not met.**Carcinogenicity** Based on available data, the classification criteria are not met.**Toxic to reproduction** Suspected of damaging fertility or the unborn child.**Specific target organ toxicity - single exposure**

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

Specific target organ toxicity - repeated exposure

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

(Contd. on page 6)

US



Safety Data Sheet

acc. to OSHA HCS

Printing date 06/21/2023

Version 7

Reviewed on 05/01/2023

Trade name: Original ATE Brake Fluid TYP 200 (DOT 4)

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

(Contd. of page 5)

12 Ecological information

Toxicity

Aquatic toxicity:

30989-05-0 Tris[2-[2-(2-methoxyethoxy)ethoxy]ethyl] orthoborate

EC50	>100 mg/l (Algae) (72 h)
	>100 mg/l (daphnia) (48 h)
LC50	>100 mg/L (fish) (96 h)

15520-05-5 2,2'-(Octylimino)bisethanol

EC50 (static)	1.35 mg/l (Algae) (OECD 201 72 h)
	>100 mg/l (bacteria) (OECD 209)
	19.1 mg/l (daphnia) (OECD 202 48 h)
LC50	22 mg/L (fish) (OECD 203 96 h)
ErC10 (static)	0.402 mg/L (Algae) (OECD 201 72 h)

111-46-6 2,2'-oxybisethanol

EC50	>100 mg/l (Algae)
	>100 mg/l (daphnia) (DIN 38412 T.11)
LC50	>100 mg/L (fish) (96 h)

Persistence and degradability No further relevant information available.

Other information: The product is easily biodegradable.

Behavior in environmental systems:

Bioaccumulative potential No further relevant information available.

Mobility in soil No further relevant information available.

Additional ecological information:

General notes:

Water hazard class 1 (Self-assessment): slightly hazardous for water

Do not allow undiluted product or large quantities of it to reach ground water, water course or sewage system.

Results of PBT and vPvB assessment Not applicable.

PBT: Not applicable.

vPvB: Not applicable.

Other adverse effects No further relevant information available.

13 Disposal considerations

Waste treatment methods

Disposal should be based on the relevant state and local laws and regulations, the disposal process should avoid pollution of the environment.

Recommendation:

After prior treatment product has to be disposed of in an incinerator for hazardous waste adhering to the regulations pertaining to the disposal of particularly hazardous waste.

Uncleaned packagings:

Recommendation:

Packagings that cannot be cleansed are to be disposed of in the same manner as the product.

US

(Contd. on page 7)



Safety Data Sheet

acc. to OSHA HCS

Printing date 06/21/2023

Version 7

Reviewed on 05/01/2023

Trade name: Original ATE Brake Fluid TYP 200 (DOT 4)

(Contd. of page 6)

14 Transport information

UN-Number DOT, ADR, ADN, IMDG, IATA	Void
UN proper shipping name DOT, ADR, ADN, IMDG, IATA	Void
Transport hazard class(es) DOT, ADR, ADN, IMDG, IATA Class	Void
Packing group DOT, ADR, IMDG, IATA	Void
Environmental hazards: Marine pollutant:	No
Special precautions for user	Not applicable.
Transport in bulk according to Annex II of MARPOL73/78 and the IBC Code	Not applicable.
UN "Model Regulation":	Void

15 Regulatory information

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

Section 355 (extremely hazardous substances):

None of the ingredients are listed.

TSCA (Toxic Substances Control Act): All ingredients comply with TSCA requirements.

Hazardous Air Pollutants

None of the ingredients are listed.

California Proposition 65

Chemicals known to cause cancer:

None of the ingredients are listed.

Chemicals known to cause reproductive toxicity for females:

None of the ingredients are listed.

Chemicals known to cause reproductive toxicity for males:

None of the ingredients are listed.

Chemicals known to cause developmental toxicity:

None of the ingredients are listed.

New Jersey Right-to-Know List:

None of the ingredients are listed.

Pennsylvania Right-to-Know List:

111-46-6 | 2,2'-oxybisethanol

Carcinogenicity categories

EPA (Environmental Protection Agency)

None of the ingredients are listed.

TLV (Threshold Limit Value)

None of the ingredients are listed.

(Contd. on page 8)



Safety Data Sheet

acc. to OSHA HCS

Printing date 06/21/2023

Version 7

Reviewed on 05/01/2023

Trade name: Original ATE Brake Fluid TYP 200 (DOT 4)

(Contd. of page 7)

NIOSH-Ca (National Institute for Occupational Safety and Health)

None of the ingredients are listed.

National regulations:
Information about limitation of use:

Employment restrictions concerning pregnant and lactating women must be observed.

Chemical safety assessment: A Chemical Safety Assessment has not been carried out.

16 Other information

This information is based on our present knowledge. However, this shall not constitute a guarantee for any specific product features and shall not establish a legally valid contractual relationship.

Recommended restriction of use For industrial or professional purposes only.

Department issuing SDS:

 Gefahrstoffmanagement Konzern
 ate.sicherheit@contiautomotive.com

Date of preparation / last revision 05/01/2023

Abbreviations and acronyms:

ADR: Accord relatif au transport international des marchandises dangereuses par route (European Agreement Concerning the International Carriage of Dangerous Goods by Road)

IMDG: International Maritime Code for Dangerous Goods

DOT: US Department of Transportation

IATA: International Air Transport Association

EINECS: European Inventory of Existing Commercial Chemical Substances

ELINCS: European List of Notified Chemical Substances

CAS: Chemical Abstracts Service (division of the American Chemical Society)

VOC: Volatile Organic Compounds (USA, EU)

LC50: Lethal concentration, 50 percent

LD50: Lethal dose, 50 percent

PBT: Persistent, Bioaccumulative and Toxic

vPvB: very Persistent and very Bioaccumulative

NIOSH: National Institute for Occupational Safety

OSHA: Occupational Safety & Health

TLV: Threshold Limit Value

PEL: Permissible Exposure Limit

REL: Recommended Exposure Limit

Acute Toxicity - Oral 4: Acute toxicity – Category 4

Skin Irritation 2: Skin corrosion/irritation – Category 2

Eye Damage 1: Serious eye damage/eye irritation – Category 1

Toxic to Reproduction 2: Reproductive toxicity – Category 2

Sources
<http://echa.europa.eu/information-on-chemicals/cl-inventory>
<http://echa.europa.eu/web/guest/information-on-chemicals/registered-substances>
http://www.reach-clp-biozid-helpdesk.de/de/Downloads/CLP-VO/CLP_VO_Anhang_VI_Tabelle_3_2.pdf
<https://www.epa.gov/tsca-inventory>
<https://www.cdc.gov/niosh/index.htm>
<https://www.osha.gov/>
<http://www.iarc.fr/>

* Data compared to the previous version altered.