

OSHA Hazard Communication Standard 29 CFR 1900.1200
Prepared to GHS Rev. 4

**SAFETY
DATA SHEET**

SECTION 1- CHEMICAL PRODUCT AND COMPANY INFORMATION

Product Name: Brake Cleaner II
Product Use: Non Chlorinated Brake & Parts Cleaner
Use Restrictions: For Industrial and Professional Use Only
Supplier: Wesmar Products Inc.
10729 47th Ave. W. Mukilteo, WA 98275
Phone:(425) 405-1405

Transportation Emergency: Emergency Response- PERS Chemical (800) 728-2482

SECTION 2- HAZARDS IDENTIFICATION

1) GHS Classification of the substance or mixture:

Acute toxicity, Eye- Category 2A
Flammable Liquids- Category 2
Skin irritation – Category 2
Acute & Chronic Aquatic Toxicity – Category 1
Specific target organ toxicity- single exposure- Category 3 (Central Nervous System)

2) Label Elements:



Signal Word: Danger

Hazard Statements:

H225- Highly flammable liquid and vapor
H304- May be fatal if swallowed and enters airways
H315- Causes skin irritation
H336- May cause drowsiness or dizziness
H410- Toxic to aquatic life with long lasting effects

Precautionary Statements:

P102- Keep out of reach of children
P210- Keep away from heat/sparks/open flame
P233- Keep container tightly closed.

P241+P242+P243- Use explosion proof electrical/ventilating/lighting equipment. Use only non sparking tools. Take precautionary measures against static discharge.
 P261- Avoid breathing fume and vapours spray.
 P264- Wash skin thoroughly after handling.
 P271- Use only outdoors or in a well ventilated area.
 P273- Avoid release to environment
 P280- Wear solvent resistant protective gloves and splash proof eyewear

Response Statements:

P210- Keep away from heat, sparks, open flame, hot surfaces
 P240+P241- Ground/bond container and receiving equipment. Use explosion proof electrical/ventilating/lighting equipment
 P303+P353+P361- IF ON SKIN (or hair): Remove/take off immediately all contaminated clothing, rinse skin with water/shower
 P305+P351+P338- IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses if present, and easy to do so. Continue Rinsing.
 P304+P340+ IF INHALED: Remove person to fresh air and keep comfortable for breathing.
 P301+P310- IF SWALLOWED: Immediately call POISON CENTER or doctor/physician.
 P313+P332- Get medical attention if skin irritation occurs

Storage and Disposal Statements:

P233+P235+P403+P405- Keep container tightly closed, keep cool and store locked up in a well-ventilated place.
 P501- Dispose of contents/container in accordance with local/regional/national regulation.

Other Hazards:

OSHA HCS 2012- Under United States Regulations (29 CFR 1910.1200 - Hazard Communication Standard), this product is considered hazardous.

HMIS Classification:

Health Hazard- 2
 Chronic Health Hazard- 0
 Flammability- 3
 Physical Hazards- 0

NFPA Classification:

Health- 2
 Flammability- 3
 Physical Hazard- 0
 Instability- 0

SECTION 3- COMPOSITION/INFORMATION ON INGREDIENTS

<u>Chemical/Common Name</u>	<u>CAS #</u>	<u>PERCENTAGE</u>	<u>HAZARDOUS</u>
Methanol	67-56-1	10-15%	Yes
Isopropyl Alcohol	67-63-0	1-5%	Yes
Heptane	142-82-5	80-85%	Yes

SECTION 4- FIRST AID MEASURES

Inhalation: If affected, remove individual to fresh air. If breathing is difficult administer oxygen. If breathing has stopped, give artificial respiration. Keep person warm and quiet and obtain medical attention.
Skin: Immediately flush affected area with lots of water for at least 2 minutes. Remove contaminated clothing and wash before reuse.
Eyes: Flush immediately with large quantities of running water for at least 5 minutes. Obtain medical attention.
Ingestion: Immediately rinse mouth with a lot of water. Do NOT induce vomiting. Never give anything by mouth to an unconscious person. Obtain immediate medical attention.

SECTION 5-FIRE FIGHTING MEASURES

Flash Point: 25°F (T.C.C.)
Autoignition Temperature: 399°C
Lower Explosive Limit: 1.0% (V) **Upper Explosive Limit:** 7% (V)

General Hazards-

Fire: Product is flammable or combustible in presence of ignition source.

Suitable Extinguishing Media: Use water spray, alcohol resistant foam, dry chemical or carbon dioxide. Treat as class B (flammable liquid) fire.

Fire Fighting Procedures: Wear self contained breathing apparatus for fire fighting if necessary.

Hazardous Combustion Products: Normal thermal decomposition byproducts i.e. carbon oxides.

SECTION 6- ACCIDENTAL RELEASE MEASURES

Personal Precautions: Wear appropriate protective equipment including respiratory protection as conditions warrant. Do not touch or walk through spilled material. Do not touch damaged containers or spilled material unless wearing appropriate protective clothing. Avoid breathing vapors, mist or gas.

Emergency Procedures: As an immediate precautionary measure, isolate spill or leak area for at least 50 meters (150 feet) in all directions. Keep unauthorized personnel away. Stay upwind. Ventilate closed spaces before entering.

Environmental precautions: Avoid run off to waterways and sewers.

Methods and material for containment and cleaning up: Stop leak if you can do it without risk. Absorb or cover with dry earth, sand or other non-combustible material (i.e. sand, earth, vermiculite) and transfer to appropriate waste disposal container.

SECTION 7- HANDLING AND STORAGE

Precautions for safe handling:
Avoid formation of aerosol. Avoid contact with skin and eyes by wearing protective clothing and equipment. Avoid inhalation of vapour or mist. Use only with adequate ventilation. Take precautionary measures against static discharge.

Conditions for safe storage:
Keep container tightly closed in a dry and well-ventilated place. Store away from acids, acidic materials and oxidizers. Do not store near heat or open flame.

SECTION 8- EXPOSURE CONTROLS/PERSONAL PROTECTION

Control Parameters:

Component	CAS #	ACGIH Exposure Limits	OSHA Exposure Limits
Methanol	67-56-1	200 ppm (TWA)	200 ppm (TWA)
Isopropyl Alcohol	67-63-0	400 ppm (TWA)	200 ppm (TWA)
Heptane	142-82-5	400 ppm (TWA)	400 ppm (TWA)

Personal Protective Equipment-

Respiratory protection: In case of insufficient ventilation, wear suitable respiratory equipment. Follow the OSHA respirator regulations found in 29 CFR 1910.134. Use a NIOSH/MSHA approved respirator if exposure limits are exceeded or symptoms are experienced.

Hand protection: Wear protective gloves made from the following materials- nitrile rubber or polyethylene. Dispose of contaminated gloves after use in accordance with applicable laws and good laboratory practices. Wash and dry hands.

Eye Protection: Wear safety glasses with side shields.

Skin and Body Protection: Where extensive dermal exposure may be expected, either a chemical suit or chemical apron will be needed.

Hygienic Practices: Handle in accordance with good industrial hygiene and safety practice. Wash thoroughly with soap and water after handling and before eating, drinking, or using tobacco. Safety shower and eye wash should be available close to work areas.

SECTION 9- PHYSICAL AND CHEMICAL PROPERTIES

Products Description:	Clear colorless liquid with characteristic odor
Odor Threshold:	200 ppm
Solubility in Water:	Insoluble
Boiling Point:	208°F
Vapor Pressure (mmHg):	32 mmHg approx.. 1.60 PSI @ 38°C (100°F)
Vapor Density (AIR=1):	3.4 @ 20°C (68°F)
Evaporation Rate (BUTYL ACETATE=1):	3.45
Flash Point (T.C.C.):	25°F
pH (1% w/w in water):	N/A

SECTION 10- STABILITY AND REACTIVITY DATA

Stability: Stable under recommended storage conditions.

Material to Avoid: Avoid contact with acids and strong oxidizers such as ethylene oxide, chlorine, and peroxides.

Conditions to Avoid: Keep away from heat, sparks and open flame.

Hazardous Reactions: Vapors may form explosive mixture with air.

Hazardous Decomposition Products: May form carbon dioxide, carbon monoxide, etc.

SECTION 11- TOXICOLOGICAL INFORMATION

Isopropyl Alcohol CAS 67-63-0-

Acute oral toxicity- LD50 Oral: 5,500 mg/kg

Species: Rat

Symptoms: ataxia, vomiting, pain, hypothermia, coma, dizziness

Acute inhalation toxicity- LC50: >10000 ppm

Species: Male and Female Rat

Exposure Time: 6 hours

Test Atmosphere: vapour

Symptoms: central nervous system depression

Acute dermal toxicity- LD50: >12,800 mg/kg

Species: Rabbit

Exposure Time: 4 hours

Method: in vivo

Result: Not irritating to skin

Remarks: Not irritating to skin

GERM CELL MUTAGENICITY-

Assessment- Animal testing did not show any mutagenic effects.

REPRODUCTIVE TOXICITY-

Assessment- Animal testing did not show any effects on fertility. Did not show teratogenic effects in animal experiments.

Heptane CAS 142-82-5-

Acute oral toxicity- LD50 Oral: 5,000 mg/kg

Species: Rat

Method: OECD Test Guideline 401

Information given is based on data obtained from similar substances.

Acute inhalation toxicity- LC50: >29.29 mg/l

Exposure Time: 4 h

Species: rat (male and female)
Test Atmosphere: vapour
Method: OECD Test Guideline 403

Acute dermal toxicity- LD50: >2,800 mg/kg

Species: Rabbit (male and female)
Method: OECD Test Guideline 402

Result: Not irritating to skin
Remarks: Not irritating to skin

Information given is based on data obtained from similar substances.

Skin Irritation: Irritating to skin, may cause skin irritation in susceptible persons.

Eye Irritation: Vapors may cause irritation to the eyes, respiratory system, and the skin.

Sensitization: Did not cause sensitization on laboratory animals. Information given is based on data obtained from similar substances.

Repeated Dose Toxicity:

Species: rat (male)

Application Route: Inhalation

Dose: 12.47 mg/l

Exposure time: 16 wks

Number of Exposures: 12 h/d, 7 d/wk

NOEL: 12.47 mg/l

No adverse effect has been observed in chronic toxicity tests.

Reproductive Toxicity:

Species: rat

Application Route: Inhalation

Dose: 0, 900, 3000, 9000 ppm

Number of Exposures: 6 h/d, 5 d/wk

Test Period: 13 wk

Method: OECD Test Guideline 416

NOAEL: Parent: 9000 ppm

NOAEL: F1: 3000 ppm

NOAEL: F2: 3000 ppm

Developmental Toxicity:

Species: rat

Application Route: Inhalation

Dose: 0, 900, 3000, 9000 ppm

Exposure Time: GD6 - 15

Number of Exposures: 6 h/d

NOAEL: Teratogenicity: 9000 ppm

NOAEL: Maternal: 3000 ppm

Aspiration Toxicity;

May be fatal if swallowed and enters airways.

Substances known to cause human aspiration toxicity hazards or to be regarded as if they cause human aspiration toxicity hazard.

CMR Effects: **Carcinogenicity:** Not available

Mutagenicity: Tests on bacterial or mammalian cell cultures did not show mutagenic effects.

Teratogenicity: Animal testing did not show any effects on fetal development.

Reproductive Toxicity: No toxicity to reproduction.

Further Information: Concentrations substantially above the TLV value may cause narcotic effects. Symptoms of over exposure may be headache, dizziness, tiredness, nausea, and vomiting. Solvents may degrease the skin.

Methanol CAS 67-56-1-

Acute oral toxicity- LD50: 100 mg/kg

Species: Rat

Assessment: The component/mixture is toxic after single ingestion.

Acute inhalation toxicity- LC50: 5 mg/l

Species: rat

Assessment: The component/mixture is toxic after short term inhalation.

Acute dermal toxicity- LD50: 300 mg/kg

Species: Rabbit

Exposure time: 20 h

Method: In vivo

Result: Not irritating to skin

Remarks: Not irritating to skin

Serious eye damage/Eye Irritation:

Species: rabbit

Result: Not irritating to eyes

Method: In vivo

Respiratory or Skin Irritation:

Test Type: Maximization Test (GPMT)

Species: guinea pig

Method: OECD Test Guideline 406

Result: Does not cause skin sensitization.

Germ cell mutagenicity:

Genotoxicity in vitro:

Test Type: Ames test

Metabolic activation: with and without metabolic activation

Result: negative

Test Type: Chromosome aberration test in vitro

Test Species: Chinese hamster lung fibroblasts

Metabolic activation: without metabolic activation

Result: negative

Test Type: Mammalian cell gene mutation assay

Test Species: Chinese hamster lung fibroblasts

Metabolic activation: with and without metabolic activation

Result: negative

Test Type: DNA damage and/or repair

Metabolic activation: with and without metabolic activation

Result: ambiguous

Genotoxicity in vivo:

Test Type: In vivo micronucleus test

Test species: mouse

Cell type: Bone marrow

Application Route: Intraeritoneal

Exposure time: Single

Dose: 0, 1920, 3200, 4480 mg/kg
Result: negative

Test Type: DNA damage and/or repair
Test species: mouse (male)
Cell type: Bone marrow
Application Route: Intraperitoneal
Exposure time: 1 or 15 d
Dose: 0, 2000 mg/kg bw
Result: negative

Test Type: Chromosome aberration assay in vivo
Test species: mouse (male)
Cell type: Lung cells
Application Route: inhalation (vapour)
Exposure time: 5 d, 6 h/d
Dose: 0, 800, 4,000 ppm
Result: negative

Germ cell mutagenicity Assessment: In vivo tests did not show mutagenic effects.

Carcinogenicity:

Species: mouse (male and female)
Application Route: inhalation (vapour)
Exposure time: 18 mths
Dose: 0, 0.013, 0.13, 1.3 mg/l
Frequency of treatment: 19 h/d, 7 d/wk
NOAEL: \geq 1.3 mg/l
Result: did not display carcinogenic properties.
Carcinogenicity Assessment: Suspected human carcinogens

Reproductive Toxicity:

Effects on fertility:
Test Type: Fertility
Species: monkey (male)
Application Route: Inhalation
Dose: 0, 3027, 0.8, 2.39 mg/l
Duration of Single Treatment: 3 h
Frequency of Treatment: 7 d/wk
General Toxicity: Parent: NOAEC: 2.39 mg/l
General Toxicity F1: NOAEC: 2.39 mg/l
Fertility: NOAEC: 2.39 mg/l
Result: No reproductive effects.

Test Type: Two Generation study
Species: rat (male and female)
Application Route: Inhalation
Dose: 0, 0.013, 3.13, 1.3 mg/l
Duration of Single Treatment: 20 h
Frequency of Treatment: 7 d/wk
General Toxicity: Parent: NOAEC: 1.3 mg/l
General Toxicity F1: NOAEC: 0.13 mg/l
Fertility: NOAEC: 1.3 mg/l
Symptoms: Effect on postnatal development.
Result: Animal testing did not show any effects on fertility.

Effects on fetal development:

Species: rat
Application Route: Inhalation
Dose: 0, 6.65, 13.3, 26.6 mg/l

Duration of Single Treatment: 20 d
Frequency of Treatment: 7 h/day
General Toxicity Maternal: NOAEC: 13.3 mg/l
Teratogenicity: NOAEC: 6.65 mg/l
Symptoms: Maternal Toxicity, skeletal and visceral variations.

Reproductive toxicity Assessment

Some evidence of adverse effects on sexual function and fertility, based on animal experiments.

STOT – single exposure

Target Organs: Eyes, Central Nervous System

Assessment: The substance or mixture is classified as specific target organ toxicant, single exposure, category 1.

STOT – repeated exposure

No data available

Repeated dose Toxicity:

Species: mouse (male and female)

NOAEL: 1.3 mg/l

Application Route: Inhalation

Exposure time: 12 mths

Number of exposures: Continuous

Dose: 0, 0.013, 0.13, 1.3 mg/l

Assessment: Toxic if swallowed, in contact with skin or if inhaled.

Aspiration Toxicity:

No aspiration toxicity classification.

Further Information: Remarks: Solvents may degrease the skin.

SECTION 12- ECOLOGICAL INFORMATION

Isopropyl Alcohol CAS 67-63-0-

ECOTOXICITY:

Toxicity to fish: LC50 (Fathead Minnow): 9,640 mg/l

Exposure Time: 96 Hours

Test Type: Flow-through test

Toxicity to daphnia and other aquatic invertebrates: EC50 (Water flea): >10,000 mg/l

Exposure Time: 24 Hours

Test Type: Static test

Toxicity to algae: No data available

Toxicity to bacteria: 1,050 mg/l

Exposure Time: 16 hours

PERSISTENCE AND DEGRADABILITY-

Result: readily biodegradable

Biodegradation: 95%

Method: OECD test guideline 301E

Chemical Oxygen Demand (COD): 0.00209 mg/g

Theoretical Oxygen Demand (ThOD): 0.00240 mg/g

BIOACCUMULATIVE POTENTIAL-

Bioconcentration factor (BCF): 3.16

Partition coefficient: log Pow- -0.24

MOBILITY IN SOIL-

Remarks: absorbs on soil

REGULATION/REMARKS-

Regulation: 40 CFR Protection of Environment; Part 82 Protection of Stratospheric Ozone, CAA Section 602 Class I Substances.

Remarks: This product neither contains, nor was manufactured with a Class I or Class II ODS as defined by the U.S. Clean Air Act Section 602 (40 CFR 82, Subpt. A, App.A+B).

Methanol CAS 67-56-1-

ECOTOXICITY:

Toxicity to fish: LC50 (Iepomis macrochirus (bluegill sunfish)): 15,400 mg/l

Exposure Time: 96 Hours

Test Type: Flow-through test

Toxicity to daphnia and other aquatic invertebrates: EC50 (Daphnia Magna (Water flea)): 10,000 mg/l.

Exposure Time: 48 Hours

Test Type: Static test

Toxicity to algae: EC50 (Scenedesmus capricornutum (fresh water algae)): 22,000 mg/l

End Point: Growth rate

Exposure time: 96 h

Test Type: static test

Method: OECD Test Guideline 201

Toxicity to bacteria: IC50 (activated sludge): >1,000 mg/l

End point: Growth rate

Exposure Time: 3 h

Test Type: Static test

Method: OECD Test Guideline 209

PERSISTENCE AND DEGRADABILITY

Biogradability: aerobic

Result: readily biodegradable

Biodegradation: 72%

Biochemical Oxygen Demand (BOD): 600-1,120 mg/g

Chemical Oxygen Demand (COD): 1,420 mg/g

BOD/COD: BOD: 600-1120; **COD:** 1420

Stability in water: Hydrolysis: 91% at 19° C (72 h)

Remarks: Hydrolysis on contact with water.

Hydrolysis readily

BIOACCUMULATIVE POTENTIAL

Partition coefficient: log Pow- -0.77 (octanol/water)

Mobility in Soil: No data available

Other adverse effects: No data available

REGULATION/REMARKS:

Regulation: 40 CFR Protection of Environment; Part 82 Protection of Stratospheric Ozone, CAA Section 602, Class I Substances.

Remarks: This product neither contains, nor was manufactured with a Class I or Class II ODS as defined by the U.S. Clean Air Act Section 602 (40 CFR 82, Subpt. A, App. A+ B)

Heptane CAS 142-82-5-

ECOTOXICITY:

Toxicity to fish: LL50 (oncorhynchus mykiss (rainbow trout)): 1,284 mg/l

Exposure Time: 96 Hours

Method: QSAR

Toxicity to fish: LC50 (Tilapia mosambica(fish)): 375 mg/l

Exposure Time: 96 Hours

Toxicity to daphnia and other aquatic invertebrates:

EC50: (Daphnia Magna (Water flea)): 1.5 mg/l

Exposure Time: 48 Hours

Test Type: Static test

Remarks: Toxic to aquatic organisms.

LC50: (Mysidopsis Bahia (mysid shrimp)): 0.1 mg/l

Exposure Time: 96 Hours

Test Type: Semi Static test

Remarks: Very toxic to aquatic organisms.

Toxicity to algae: EL50 (Pseudokirchneriella subcapitata): 4.338 mg/l

Exposure time: 72 h

Method: QSAR

Biogradability: Result: readily biodegradable

Biodegradation: 70%

Testing period: 10 days

Results of PBT assessment: Non-classified PBT substance, non-classified vPvB substance

Additional Ecological information: An environmental hazard cannot be excluded in the event of unprofessional handling or disposal. Very toxic to aquatic life with long lasting effects.

SECTION 13- DISPOSAL CONSIDERATIONS

Further information: Do not dispose of waste into sewer. Do not contaminate ponds, waterways or ditches with chemical or used container. Dispose of as hazardous waste in compliance with local and national regulations.

SECTION 14- TRANSPORT INFORMATION

Transport in accordance with all federal, state and local regulations.

DOT-

UN Number: UN 1993

UN proper shipping name: Flammable Liquids, n.os. (Heptane, Isopropanol, Methanol)

Hazard class: 3

Packing group: II

SECTION 15- REGULATORY INFORMATION

OSHA Hazards: Flammable liquid, mild eye irritant, acute health hazard.

CERCLA Reportable Quantity- This product does not contain any components with a CERCLA reportable quantity.

SARA 302 Components: No chemicals in this material are subject to the reporting requirements of SARA Title III, Section 302.

SARA 313 Components: This material does not contain any chemical components with known CAS numbers that exceed the threshold reporting levels established by SARA Title III, Section 313.

SARA 311/312 Hazards: Fire hazard, acute health hazard

Clean Air Act: This product does not contain any chemicals listed under the U.S. Clean Air Act Section 112(r) for Accidental Release Prevention (40 CFR 68.130, Subpart F). The following chemical(s) are listed under the U.S. Clean Air Act Section 111 SOCM Intermediate or Final VOC's (40 CFR 60.489):
67-63-0 Isopropyl Alcohol 100%

Massachusetts Right to Know Components:

Product	CAS No.	Percentage
Isopropyl Alcohol	67-63-0	1-5%
Methanol	67-56-1	10-15%

Pennsylvania Right to Know Components:

Product	CAS No.	Percentage
Isopropyl Alcohol	67-63-0	1-5%
N-Heptane	142-82-5	10-15%
Methanol	67-56-1	1-5%

New Jersey Right to Know Components

Product	CAS No.	Percentage
N-Heptane	142-82-5	80-85%
Methanol	67-56-1	10-15%

California Prop. 65 Components: This product contains a chemical known to the State of California to cause birth defects, or any other reproductive harm.

Product	CAS No.	Percentage
Methanol	67-56-1	10-15%

SECTION 16- OTHER INFORMATION

References: Not available

Other Special Considerations: Not available

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Last Updated: 08/15/15

DISCLAIMER:

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