23318 PAG Refrigeration Lubricant 46

Safety Data Sheet

according to the Hazardous Products Regulation (February 11, 2015)

Date of issue: 03/28/2018 Revision date: 03/28/2018 Supersedes: 07/27/2017 Version: 1.1

SECTION 1: Identification

1.1. Product identifier

Trade name : 23318 PAG Refrigeration Lubricant 46

Product code : 23318

1.2. Recommended use and restrictions on use

No additional information available

1.3. Supplier

Tire Seal, Inc.
3574 Corona Street
33461 Lake Worth, Florida - USA
T 561-582-2245 - F 561-582-1499
www.supercool.ac

1.4. Emergency telephone number

Emergency number : USA PHONE:1-800-373-7542, INT'L: 1-484-951-2432
DGA/AAG ENVIRONMENTAL CONTRACT: DGA4000-048

SECTION 2: Hazard identification

2.1. Classification of the substance or mixture

Classification (GHS-CA)

Acute toxicity (oral) Category 4 H302

Full text of H statements : see section 16

2.2. GHS Label elements, including precautionary statements

GHS-CA labeling

Hazard pictograms (GHS-CA) :

Signal word (GHS-CA) : Warning

Hazard statements (GHS-CA) : H302 - Harmful if swallowed

Precautionary statements (GHS-CA) : P264 - Wash hands, forearms and face thoroughly after handling.
P270 - Do not eat, drink or smoke when using this product.
P301+P312 - IF SWALLOWED: Call a POISON CENTER or doctor if you feel unwell.
P330 - Rinse mouth.
P501 - Dispose of contents/container to hazardous or special waste collection point, in accordance with local, regional, national and/or international regulation

2.3. Other hazards

No additional information available

2.4. Unknown acute toxicity (GHS-CA)

No data available

SECTION 3: Composition/Information on ingredients

3.1. Substances

Not applicable

3.2. Mixtures

Name	Chemical name / Synonyms	Product identifier	%	Classification (GHS-CA)
2,6-di-tert-butyl-p-cresol	1,3-di-tert-butyl-2-hydroxy-5-methylbenzene / 1,3-di-tertiary-butyl-2-hydroxy-5-methylbenzene / 2,6-bis(1,1-dimethylethyl)-4-methylphenol / 2,6-di-tert-butyl-1-hydroxy-4-methylbenzene / 2,6-di-tert-butyl-4-cresol / 2,6-di-tert-butyl-4-methylphenol / 2,6-di-tert-butyl-p-methylphenol / 2,6-di-tertiary-butyl-1-hydroxy-4-methylbenzene / 2,6-di-tertiary-butyl-4-cresol / 2,6-di-tertiary-butyl-4-methylphenol / 2,6-di-tertiary-butyl-para-cresol / 2,6-di-tertiary-butyl-para-methylphenol / 3,5-di-tert-butyl-4-hydroxytoluene / 3,5-di-tertiary-butyl-4-hydroxytoluene / 4-hydroxy-3,5-di-tert-butyltoluene / 4-hydroxy-3,5-di-tertiary-butyltoluene / 4-methyl-2,6-di-tert-butylphenol / 4-methyl-2,6-di-tertiary-butylphenol / 4-methyl-2,6-tert-butylphenol / 4-methyl-2,6-tertiary-butylphenol / advastab 401 / agidol / agidol 1 / alkofen BP / antioxidant 264 / antioxidant 29 / antioxidant 30 / antioxidant 4 / antioxidant 4K / antioxidant BHT / antioxidant DBPC / antioxidant KB / antrancine 8 / AO 29 / AO 4K / AO X4 / AO100GRA / BHT / BHT butylated hydroxytoluene / BHT, food grade / BUKS / butylated hydroxytoluene / butylhydroxytoluene / CAO 1 / CAO 3 / catalin CAO-1 DBPC / catalin CAO-3 / chemanox 11 / dalpac / DBMP / DBPC / DBPC, technical grade / deenax / dibunol / dibutylated hydroxytoluene / di-tertiary-butyl-para-cresol / ECA5703 / ECA6050 / ECA8165 / ECA8268 / Environmentally hazardous substance, solid, n.o.s. / EXA5453 / EXA703 / FEMA NO 2184 / formula nr 82300 / HK-1 / impruvol / ionol / ionol 1 / ionol BHT / ionol CP / ionol,antioxidant / ionole / kerabit / methyl di-tert-butylphenol / methyl di-tertiary-butylphenol / nocrac 200 / nonox TBC / NYRIM antioxidant / P 21 / parabar 441 / paranox 441 / phenol, 2,6-bis(1,1-dimethylethyl)-4-methyl- / stabilizer KB / stavox / sumilizer BHT / sustane (=2,6-di-tert-butyl-p-cresol) / sustane BHT / swanox BHT / tenamene 3 / tenox BHT / topanol / topanol BHT / topanol O / topanol OC / toxolan P / vanlube PC / vanlube PCX / vianol	(CAS-No.) 128-37-0	< 0.75	Acute Tox. 4 (Oral), H302

Full text of hazard classes and H-statements : see section 16

SECTION 4: First-aid measures

4.1. Description of first aid measures

First-aid measures after inhalation : Allow victim to breathe fresh air. Allow the victim to rest.

First-aid measures after skin contact : Remove affected clothing and wash all exposed skin area with mild soap and water, followed by warm water rinse.

First-aid measures after eye contact : Rinse immediately with plenty of water. Obtain medical attention if pain, blinking or redness persists.

First-aid measures after ingestion : Rinse mouth. Do NOT induce vomiting. Obtain emergency medical attention.

First-aid measures general : Never give anything by mouth to an unconscious person. If you feel unwell, seek medical advice (show the label where possible).

4.2. Most important symptoms and effects (acute and delayed)

Symptoms/effects : Not expected to present a significant hazard under anticipated conditions of normal use.

Potential Adverse human health effects and symptoms : Based on available data, the classification criteria are not met.

4.3. Immediate medical attention and special treatment, if necessary

No additional information available

SECTION 5: Fire-fighting measures

5.1. Suitable extinguishing media

Suitable extinguishing media : Foam. Dry powder. Carbon dioxide. Water spray. Sand.

5.2. Unsuitable extinguishing media

Unsuitable extinguishing media : Do not use a heavy water stream.

5.3. Specific hazards arising from the hazardous product

No additional information available

5.4. Special protective equipment and precautions for fire-fighters

Firefighting instructions : Use water spray or fog for cooling exposed containers. Exercise caution when fighting any chemical fire.

Protection during firefighting : Do not enter fire area without proper protective equipment, including respiratory protection.

SECTION 6: Accidental release measures

6.1. Personal precautions, protective equipment and emergency procedures

No additional information available

6.2. Methods and materials for containment and cleaning up

Methods for cleaning up : Soak up spills with inert solids, such as clay or diatomaceous earth as soon as possible. Collect spillage. Store away from other materials.

6.3. Reference to other sections

For further information refer to section 8: "Exposure controls/personal protection"

SECTION 7: Handling and storage

7.1. Precautions for safe handling

Precautions for safe handling : Wash hands and other exposed areas with mild soap and water before eating, drinking or smoking and when leaving work. Provide good ventilation in process area to prevent formation of vapor.

7.2. Conditions for safe storage, including any incompatibilities

Storage conditions : Keep container closed when not in use.

Incompatible products : Strong bases. Strong acids.

Incompatible materials : Sources of ignition. Direct sunlight.

SECTION 8: Exposure controls/personal protection

8.1. Control parameters

2,6-di-tert-butyl-p-cresol (128-37-0)		
USA - ACGIH	ACGIH TWA (mg/m³)	2 mg/m³ (Butylated hydroxytoluene (BHT); USA; Time-weighted average exposure limit 8 h; TLV - Adopted Value; Inhalable fraction and vapor)

8.2. Appropriate engineering controls

No additional information available

8.3. Individual protection measures/Personal protective equipment

Personal protective equipment:

Avoid all unnecessary exposure.

Hand protection:

The use of gloves impervious to the specific material handled is advised to prevent skin contact. Suggested protective material: Nitrile, 4.5 mil thickness, tested at 3.5 ml and above with no breakthrough time after 240 minutes.

Eye protection:

Chemical goggles or safety glasses

Respiratory protection:

Where there is potential for airborne exposure above the exposure limit an approved air purifying respirator equipped with Type P2 - Medium efficiency particle filters may be used.

Other information:

Do not eat, drink or smoke during use.

SECTION 9: Physical and chemical properties

9.1. Information on basic physical and chemical properties

Physical state	:	Liquid
Appearance	:	Clear.
Color	:	Colorless to slightly yellow.
Odor	:	Characteristic.
Odor threshold	:	No data available
pH	:	No data available
Relative evaporation rate (butyl acetate=1)	:	No data available
Relative evaporation rate (ether=1)	:	No data available
Melting point	:	No data available
Freezing point	:	No data available
Boiling point	:	> 200 °C (calculated value)
Flash point	:	174 °C (Closed cup)
Auto-ignition temperature	:	No data available
Decomposition temperature	:	No data available
Flammability (solid, gas)	:	Non flammable.
Vapor pressure	:	No data available
Vapor pressure at 50 °C	:	No data available
Relative density	:	No data available
Solubility	:	No data available
Log Pow	:	No data available
Viscosity, kinematic	:	41.4 - 50.6 cSt @40ºC
Explosion limits	:	No data available

9.2. Other information

No additional information available

SECTION 10: Stability and reactivity

10.1. Reactivity

Chemical stability	:	Not established.
Possibility of hazardous reactions	:	Not established.
Conditions to avoid	:	Direct sunlight. Extremely high or low temperatures.
Incompatible materials	:	Strong acids. Strong bases.
Hazardous decomposition products	:	Carbon monoxide. Carbon dioxide.

SECTION 11: Toxicological information

11.1. Information on toxicological effects

Acute toxicity (oral)	:	Oral: Harmful if swallowed.
Acute toxicity (dermal)	:	Not classified
Acute toxicity (inhalation)	:	Not classified

ATE CA (oral)	500 mg/kg body weight

2,6-di-tert-butyl-p-cresol (128-37-0)	
LD50 oral rat	890 mg/kg (Rat; OECD 401: Acute Oral Toxicity; Experimental value; >6000 mg/kg bodyweight; Rat)
LD50 dermal rat	> 2000 mg/kg (Rat; Literature study; OECD 402: Acute Dermal Toxicity; >2000 mg/kg bodyweight; Rat; Experimental value)

Skin corrosion/irritation	:	Not classified
Serious eye damage/irritation	:	Not classified
Respiratory or skin sensitization	:	Not classified
Germ cell mutagenicity	:	Not classified
Carcinogenicity	:	Not classified
Reproductive toxicity	:	Not classified
Specific target organ toxicity – single exposure	:	Not classified

Specific target organ toxicity – repeated exposure : Not classified

Aspiration hazard : Not classified

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Viscosity, kinematic (calculated value) (40 °C)	41.4 - 50.6 mm²/s @40ºC

Potential Adverse human health effects and symptoms : Based on available data, the classification criteria are not met.

Symptoms/effects : Not expected to present a significant hazard under anticipated conditions of normal use.

SECTION 12: Ecological information

12.1. Toxicity

Ecology - water : Toxic to aquatic life.

Aquatic acute : Not classified

Aquatic chronic : Not classified

2,6-di-tert-butyl-p-cresol (128-37-0)	
LC50 fish 1	>= 0.57 mg/l (LC0; EU Method C.1; 96 h; Brachydanio rerio; Semi-static system; Fresh water; Experimental value)
LC50 fish 2	0.199 mg/l (LC50; ECOSAR v1.00; 96 h; Pisces)
EC50 Daphnia 1	0.48 mg/l (EC50; OECD 202: Daphnia sp. Acute Immobilisation Test; 48 h; Daphnia magna; Static system; Fresh water; Experimental value)
EC50 Daphnia 2	0.15 mg/l (NOEC; OECD 202: Daphnia sp. Acute Immobilisation Test; 48 h; Daphnia magna; Static system; Fresh water; Experimental value)
BCF fish 1	230 - 2500 (BCF; OECD 305: Bioconcentration: Flow-Through Fish Test; 56 days; Cyprinus carpio; Flow-through system; Fresh water; Experimental value)
Log Pow	5.1 (Experimental value)
Log Koc	Koc,PCKOCWIN v1.66; 23030; Calculated value; log Koc; PCKOCWIN v1.66; 4.362; Calculated value

12.2. Persistence and degradability

23318 PAG Refrigeration Lubricant 46	
Persistence and degradability	Not established.

2,6-di-tert-butyl-p-cresol (128-37-0)	
Persistence and degradability	Not readily biodegradable in water. Biodegradable in the soil. Adsorbs into the soil. Low potential for mobility in soil. Photooxidation in the air.
Biochemical oxygen demand (BOD)	0.51 g O_2/g substance
Chemical oxygen demand (COD)	2.27 g O_2/g substance
ThOD	2.977 g O_2/g substance
BOD (% of ThOD)	0.17

12.3. Bioaccumulative potential

23318 PAG Refrigeration Lubricant 46	
Bioaccumulative potential	Not established.

2,6-di-tert-butyl-p-cresol (128-37-0)	
Bioaccumulative potential	Potential for bioaccumulation (500 ≤ BCF ≤ 5000).
BCF fish 1	230 - 2500 (BCF; OECD 305: Bioconcentration: Flow-Through Fish Test; 56 days; Cyprinus carpio; Flow-through system; Fresh water; Experimental value)
Log Pow	5.1 (Experimental value)
Log Koc	Koc,PCKOCWIN v1.66; 23030; Calculated value; log Koc; PCKOCWIN v1.66; 4.362; Calculated value

12.4. Mobility in soil

2,6-di-tert-butyl-p-cresol (128-37-0)	
Ecology - soil	May be harmful to plant growth, blooming and fruit formation.
Log Koc	Koc,PCKOCWIN v1.66; 23030; Calculated value; log Koc; PCKOCWIN v1.66; 4.362; Calculated value
Log Pow	5.1 (Experimental value)

12.5. Other adverse effects

Ozone : Not classified

Other information : Avoid release to the environment.

SECTION 13: Disposal considerations

13.1. Disposal methods

Product/Packaging disposal recommendations : Dispose in a safe manner in accordance with local/national regulations.

Ecology - waste materials : Avoid release to the environment.

SECTION 14: Transport information

14.1. Basic shipping description

In accordance with TDG

Transportation of Dangerous Goods

Not regulated for transport

14.2. Transport information/DOT

Department of Transport

Not regulated for transport

14.3. Air and sea transport

IMDG

Not regulated for transport

IATA

Not regulated for transport

SECTION 15: Regulatory information

15.1. National regulations

No additional information available

15.2. International regulations

No additional information available

SECTION 16: Other information

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Other information : None.

Full text of H-phrases:

H302	Harmful if swallowed

SDS Canada (GHS)