

### SECTION 1: Product and company identification

Product name : Graphite Lubricant  
Use of the substance/mixture : Dry lubricant  
Product code : 0336  
Company : Total Solutions  
P.O. Box 240014  
Milwaukee, WI 53224 - USA  
T (414) 354-6417  
Emergency number : Chemtec: (800) 424-9300

### SECTION 2: Hazards identification

#### 2.1. Classification of the substance or mixture

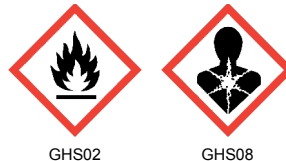
##### Classification (GHS-US)

Flam. Liq. 3 H226  
Carc. 1B H350  
Asp. Tox. 1 H304  
Full text of H-phrases: see section 16

#### 2.2. Label elements

##### GHS-US labeling

Hazard pictograms (GHS-US) :



Signal word (GHS-US) : Danger

Hazard statements (GHS-US) : Flammable liquid and vapor  
May be fatal if swallowed and enters airways  
May cause cancer

Precautionary statements (GHS-US) : Obtain special instructions before use  
Do not handle until all safety precautions have been read and understood  
Keep away from heat, open flames, sparks. - No smoking  
Keep container tightly closed  
Ground/bond container and receiving equipment  
Use explosion-proof lighting, electrical equipment  
Use only non-sparking tools  
Take precautionary measures against static discharge  
Wear eye protection, protective clothing, protective gloves  
If swallowed: Immediately call a doctor, a POISON CENTER  
If on skin (or hair): Take off immediately all contaminated clothing. Rinse skin with water/shower  
If exposed or concerned: Get medical advice/attention  
Do NOT induce vomiting  
In case of fire: Use carbon dioxide (CO<sub>2</sub>), dry extinguishing powder, foam to extinguish  
Store in a well-ventilated place. Keep cool  
Store locked up  
Dispose of contents/container to comply with local/regional/national/international regulations.

#### 2.3. Other hazards

No additional information available

#### 2.4. Unknown acute toxicity (GHS US)

Not applicable

### SECTION 3: Composition/information on ingredients

#### 3.1. Substance

Not applicable  
Full text of H-phrases: see section 16

#### 3.2. Mixture

Name	Product identifier	%	Classification (GHS-US)
hydrocarbons, C11-C14, n-alkanes, isoalkanes, cyclics, < 2% aromatics	(CAS No) 64742-47-8	15-40	Flam. Liq. 4, H227 Asp. Tox. 1, H304
Alkanes, C14-16	(CAS No) 90622-46-1	7-13	Asp. Tox. 1, H304
Heavy hydrotreated naphthenic distillates	(CAS No) 64742-52-5	5-10	Carc. 1B, H350
xylene	(CAS No) 1330-20-7	1-5	Flam. Liq. 3, H226 Acute Tox. 4 (Dermal), H312 Acute Tox. 4 (Inhalation), H332 Skin Irrit. 2, H315
cumene	(CAS No) 98-82-8	0.1-1	Flam. Liq. 3, H226 Carc. 2, H351 STOT SE 3, H335 Asp. Tox. 1, H304

### SECTION 4: First aid measures

#### 4.1. Description of first aid measures

- First-aid measures general : If you feel unwell, seek medical advice (show the label where possible). IF exposed or concerned: Get medical advice/attention.
- First-aid measures after inhalation : If breathing is difficult, remove victim to fresh air and keep at rest in a position comfortable for breathing. Call a POISON CENTER or doctor/physician if you feel unwell.
- First-aid measures after skin contact : Take off immediately all contaminated clothing and wash it before reuse. Rinse skin with water/shower. If skin irritation or rash occurs: Get medical advice/attention.
- First-aid measures after eye contact : Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing. If eye irritation persists: Get medical advice/attention.
- First-aid measures after ingestion : Rinse mouth with water. Do NOT induce vomiting. Immediately call a poison center or doctor/physician.

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

- Symptoms/injuries : If you feel unwell, seek medical advice. May cause cancer. May be fatal if swallowed and enters airways.
- Symptoms/injuries after inhalation : May cause respiratory irritation. Dizziness. Nausea. Feeling of weakness. Headache. Unconsciousness.
- Symptoms/injuries after skin contact : Contact during a long period may cause light irritation. Repeated exposure may cause skin dryness or cracking.
- Symptoms/injuries after eye contact : Direct contact with the eyes is likely irritating.
- Symptoms/injuries after ingestion : May be fatal if swallowed and enters airways. Risk of aspiration pneumonia. Gastrointestinal complaints. Nausea. Cramps. Vomiting.

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

Treat symptomatically.

### SECTION 5: Firefighting measures

#### 5.1. Extinguishing media

- Suitable extinguishing media : Dry chemical powder. Carbon dioxide. Alcohol-resistant foam.

#### 5.2. Special hazards arising from the substance or mixture

- Explosion hazard : Vapors may travel long distances along ground before igniting/flashing back to vapor source.
- Reactivity : Thermal decomposition may produce oxides of carbon and sulfur. Toxic fumes may be released.

#### 5.3. Advice for firefighters

- Firefighting instructions : Exercise caution when fighting any chemical fire. In case of fire: Evacuate area. Fight fire remotely due to the risk of explosion. Use water spray or fog for cooling exposed containers. Take account of environmentally hazardous firefighting water.
- 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

- General measures : Remove ignition sources. Use special care to avoid static electric charges.

##### 6.1.1. For non-emergency personnel

- Protective equipment : Protective goggles. Gloves. Protective clothing.
- Emergency procedures : Evacuate unnecessary personnel. No naked flames or sparks.

##### 6.1.2. For emergency responders

- Protective equipment : Equip cleanup crew with proper protection.
- Emergency procedures : Stop leak if safe to do so. Stop release. Ventilate area.

### 6.2. Environmental precautions

Avoid release to the environment. Prevent entry to sewers and public waters.

### 6.3. Methods and material for containment and cleaning up

For containment : Contain released substance, pump into suitable containers.  
 Methods for cleaning up : This material and its container must be disposed of in a safe way, and as per local legislation. Take up liquid spill into inert absorbent material, e.g.: sand/earth. Clean contaminated surfaces with a soap solution.

### 6.4. Reference to other sections

No additional information available

## SECTION 7: Handling and storage

### 7.1. Precautions for safe handling

Precautions for safe handling : Comply with the legal requirements. Do not handle until all safety precautions have been read and understood. Do not breathe vapors. Use personal protective equipment as required. Do not eat, drink or smoke when using this product. Do not get in eyes, on skin, or on clothing. Handle and open the container with care. Keep away from sources of ignition - No smoking. Take precautions against electrostatic charges. Obtain special instructions before use. Remove contaminated clothing immediately.  
 Hygiene measures : Wash thoroughly after handling. Wash contaminated clothing before reuse.

### 7.2. Conditions for safe storage, including any incompatibilities

Technical measures : Comply with applicable regulations. Proper grounding procedures to avoid static electricity should be followed.  
 Storage conditions : Keep container tightly closed. Keep only in the original container in a cool, well ventilated place away from: sparks, open flames, excessive heat.  
 Incompatible products : Oxidizing agent.  
 Incompatible materials : Sources of ignition.  
 Storage area : Store away from heat. Store in a cool area. Store in a dry area. Store in a well-ventilated place. Keep locked up.  
 Special rules on packaging : Keep only in original container. meet the legal requirements.

## SECTION 8: Exposure controls/personal protection

### 8.1. Control parameters

xylene (1330-20-7)		
ACGIH	ACGIH TWA (ppm)	100 ppm
ACGIH	ACGIH STEL (ppm)	150 ppm
ACGIH	Remark (ACGIH)	URT & eye irr; CNS impair
cumene (98-82-8)		
ACGIH	ACGIH TWA (ppm)	50 ppm
ACGIH	Remark (ACGIH)	Eye, skin, & URT irr; CNS impair

### 8.2. Exposure controls

Personal protective equipment : Use appropriate personal protective equipment when risk assessment indicates this is necessary. Gloves. Protective clothing. Protective goggles. Safety glasses.



## SECTION 9: Physical and chemical properties

### 9.1. Information on basic physical and chemical properties

Physical state : Liquid  
 Appearance : Black. Liquid.  
 Odor : solvent odor  
 Odor threshold : No data available  
 pH : No data available  
 Melting point : No data available  
 Freezing point : No data available

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Boiling point	: No data available
Flash point	: 130 °F Closed Cup
Relative evaporation rate (butyl acetate=1)	: No data available
Flammability (solid, gas)	: No data available
Explosion limits	: No data available
Explosive properties	: No data available
Oxidizing properties	: No data available
Vapor pressure	: No data available
Relative density	: No data available
Relative vapor density at 20 °C	: No data available
Specific gravity / density	: 0.85 g/ml
Solubility	: Insoluble in water.
Log Pow	: No data available
Log Kow	: No data available
Auto-ignition temperature	: No data available
Decomposition temperature	: No data available
Viscosity	: No data available
Viscosity, kinematic	: < 20 cSt
Viscosity, dynamic	: No data available
VOC content	: 40 %

### SECTION 10: Stability and reactivity

#### 10.1. Reactivity

Thermal decomposition may produce oxides of carbon and sulfur. Toxic fumes may be released.

#### 10.2. Chemical stability

Flammable liquid and vapor. Heating may cause a fire or explosion.

#### 10.3. Possibility of hazardous reactions

Refer to section 10.1 on Reactivity.

#### 10.4. Conditions to avoid

Heat. No flames, No sparks. Eliminate all sources of ignition.

#### 10.5. Incompatible materials

Oxidizing agents.

#### 10.6. Hazardous decomposition products

Under normal conditions of storage and use, hazardous decomposition products should not be produced.

### SECTION 11: Toxicological information

#### 11.1. Information on toxicological effects

Acute toxicity : Not classified

<b>xylene (1330-20-7)</b>	
LC50 inhalation rat (ppm)	4550 ppmV/4h
ATE CLP (dermal)	1100.000 mg/kg body weight
ATE CLP (gases)	4550.000 ppmV/4h
ATE CLP (dust, mist)	1.500 mg/l/4h

<b>hydrocarbons, C11-C14, n-alkanes, isoalkanes, cyclics, &lt; 2% aromatics (64742-47-8)</b>	
LD50 dermal rabbit	> 5000 mg/kg body weight (Rabbit; Literature)

<b>Alkanes, C14-16 (90622-46-1)</b>	
LD50 oral rat	> 2000 mg/kg
LD50 dermal rabbit	> 2000 mg/kg
LC50 inhalation rat (mg/l)	> 5.8 mg/l/4h

Skin corrosion/irritation	: Not classified
Serious eye damage/irritation	: Not classified
Respiratory or skin sensitization	: Not classified
Germ cell mutagenicity	: Not classified

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Carcinogenicity : May cause cancer.

<b>xylene (1330-20-7)</b>	
IARC group	3 - Not Classifiable
<b>cumene (98-82-8)</b>	
IARC group	2B - Possibly Carcinogenic to Humans

Reproductive toxicity : Not classified

Specific target organ toxicity (single exposure) : Not classified

Specific target organ toxicity (repeated exposure) : Not classified

Aspiration hazard : May be fatal if swallowed and enters airways.

Symptoms/injuries after inhalation : May cause respiratory irritation. Dizziness. Nausea. Feeling of weakness. Headache. Unconsciousness.

Symptoms/injuries after skin contact : Contact during a long period may cause light irritation. Repeated exposure may cause skin dryness or cracking.

Symptoms/injuries after eye contact : Direct contact with the eyes is likely irritating.

Symptoms/injuries after ingestion : May be fatal if swallowed and enters airways. Risk of aspiration pneumonia. Gastrointestinal complaints. Nausea. Cramps. Vomiting.

## SECTION 12: Ecological information

### 12.1. Toxicity

hydrocarbons, C11-C14, n-alkanes, isoalkanes, cyclics, < 2% aromatics (64742-47-8)	
LC50 fish 1	> 100 mg/l (Pisces)
EC50 Daphnia 1	> 100 mg/l (Invertebrata)
Threshold limit algae 1	> 100 mg/l (Algae)

### 12.2. Persistence and degradability

hydrocarbons, C11-C14, n-alkanes, isoalkanes, cyclics, < 2% aromatics (64742-47-8)	
Persistence and degradability	Readily biodegradable in water. Adsorbs into the soil.

### 12.3. Bioaccumulative potential

hydrocarbons, C11-C14, n-alkanes, isoalkanes, cyclics, < 2% aromatics (64742-47-8)	
Log Pow	6 - 8.2
Bioaccumulative potential	High potential for bioaccumulation (Log Kow > 5).

## SECTION 13: Disposal considerations

### 13.1. Waste treatment methods

Waste disposal recommendations : Dispose of contents/container to comply with local/regional/national regulations.

Additional information : Handle empty containers with care because residual vapors are flammable.

## SECTION 14: Transport information

### Department of Transportation (DOT)

Transport document description : UN1993 Flammable liquids, n.o.s., (Aliphatic Hydrocarbons) 3, III

UN-No.(DOT) : UN1993

Proper Shipping Name (DOT) : Flammable liquids, n.o.s.

Transport hazard class(es) (DOT) : 3 - Class 3 - Flammable and combustible liquid 49 CFR 173.120

Hazard labels (DOT) : 3 - Flammable liquid



Packing group (DOT) : III - Minor Danger

DOT Packaging Non Bulk (49 CFR 173.xxx) : 203

DOT Packaging Bulk (49 CFR 173.xxx) : 242

DOT Symbols : G - Identifies PSN requiring a technical name

DOT Special Provisions (49 CFR 172.102) : B1,B52,IB3,T4,TP1,TP29

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DOT Packaging Exceptions (49 CFR 173.xxx) : 150  
 DOT Quantity Limitations Passenger aircraft/rail (49 CFR 173.27) : 60 L  
 DOT Quantity Limitations Cargo aircraft only (49 CFR 175.75) : 220 L  
 DOT Vessel Stowage Location : A

### Additional information

Other information : When transported by ground in non-bulk containers, this product utilizes the exception found under 49 CFR 173.150.

### ADR

No additional information available

### Transport by sea

No additional information available

### Air transport

No additional information available

## SECTION 15: Regulatory information

All components of this product are listed, or excluded from listing, on the United States Environmental Protection Agency Toxic Substances Control Act (TSCA) inventory.

Chemical(s) subject to the reporting requirements of Section 313 or Title III of the Superfund Amendments and Reauthorization Act (SARA) of 1986 and 40 CFR Part 372.

xylene	CAS No 1330-20-7	1-5
cumene	CAS No 98-82-8	0.1-1

xylene (1330-20-7)	
Listed on SARA Section 313 (Specific toxic chemical listings)	
RQ (Reportable quantity, section 304 of EPA's List of Lists)	100 lb
cumene (98-82-8)	
Listed on SARA Section 313 (Specific toxic chemical listings)	
RQ (Reportable quantity, section 304 of EPA's List of Lists)	5000 lb

California Proposition 65 - This product contains, or may contain, trace quantities of a substance(s) known to the state of California to cause cancer and/or reproductive toxicity.

## SECTION 16: Other information

Training advice : Normal use of this product shall imply use in accordance with the instructions on the packaging.

Full text of H-phrases:

Acute Tox. 4 (Dermal)	Acute toxicity (dermal) Category 4
Acute Tox. 4 (Inhalation)	Acute toxicity (inhalation) Category 4
Asp. Tox. 1	Aspiration hazard Category 1
Carc. 1B	Carcinogenicity Category 1B
Carc. 2	Carcinogenicity Category 2
Flam. Liq. 3	Flammable liquids Category 3
Flam. Liq. 4	Flammable liquids Category 4
Skin Irrit. 2	Skin corrosion/irritation Category 2
STOT SE 3	Specific target organ toxicity (single exposure) Category 3
H226	Flammable liquid and vapor
H227	Combustible liquid
H304	May be fatal if swallowed and enters airways
H312	Harmful in contact with skin
H315	Causes skin irritation
H332	Harmful if inhaled

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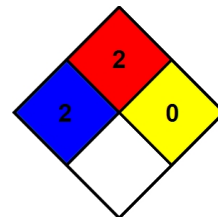
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H335	May cause respiratory irritation
H350	May cause cancer
H351	Suspected of causing cancer

NFPA health hazard : 2 - Intense or continued exposure could cause temporary incapacitation or possible residual injury unless prompt medical attention is given.

NFPA fire hazard : 2 - Must be moderately heated or exposed to relatively high temperature before ignition can occur.

NFPA reactivity : 0 - Normally stable, even under fire exposure conditions, and are not reactive with water.



Prepared by: Technical Department

*This information is based on our current knowledge and is intended to describe the product for the purposes of health, safety and environmental requirements only. It should not therefore be construed as guaranteeing any specific property of the product. No warranty is expressed or implied regarding the accuracy of this data or the results obtained from the use thereof. Our company assumes no responsibility for personal injury or property damage to the vendee, users or third parties caused by the material. Such vendees or users assume all risks associated with the use of this material.*