Safety Data Sheet



SECTION 1: Product and company identification

Product name	: Total Kill
Use of the substance/mixture	: Herbicide
Product code	: 0316
Company	: Goldstar Products P.O. Box 291630 Davie, FL 33329 - USA T (800) 239-5699
Emergency number	: Chemtec: (800) 424-9300

SECTION 2: Hazards identification

2.1. Classification of the substance or mixture

Classification (GHS-US)

Carc. 1A H350 Full text of H-phrases: see section 16

GHS-US labeling Hazard pictograms (GHS-US) : GHS-05 : GHS-05 : GHS-05 : GHS-05 : Danger : Hazard statements (GHS-US) : Precautionary statements (GHS-US) : May cause cancer Precautionary statements (GHS-US) : Obtain special instructions before use Do not handle until all safety precautions have been read and understood Wear eye protection, protective clothing, protective gloves	ements	
Signal word (GHS-US) : Danger Hazard statements (GHS-US) : May cause cancer Precautionary statements (GHS-US) : Obtain special instructions before use Do not handle until all safety precautions have been read and understood	ng	
Hazard statements (GHS-US) : May cause cancer Precautionary statements (GHS-US) : Obtain special instructions before use Do not handle until all safety precautions have been read and understood		
Precautionary statements (GHS-US) : Obtain special instructions before use Do not handle until all safety precautions have been read and understood	HS-US) : Danger	
Do not handle until all safety precautions have been read and understood	ents (GHS-US) : May cause cancer	
If exposed or concerned: Get medical advice/attention Store locked up Dispose of contents/container to comply with local/regional/national/international regul	Do not handle until all safety preca Wear eye protection, protective clo If exposed or concerned: Get med Store locked up	autions have been read and understood othing, protective gloves lical advice/attention

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

Name	Product identifier	%	Classification (GHS-US)
bromacil	(CAS No) 314-40-9	1.0 - 5.0	Eye Irrit. 2A, H319
Crystalline Silica	(CAS No) 14808-60-7	0.05 - 5.0	Carc. 1A, H350
Distillates (petroleum), hydrotreated middle, Gasoil - unspecified, [A complex combination of hydrocarbons obtained by treating a petroleum fraction with hydrogen in the presence of a catalyst. It consists of hydrocarbons having carbon numbers predominantly in the range of C11 through C25 and boiling in the range of approximately 205 °C to 400 °C (401 °F to 752 °F).]	(CAS No) 64742-46-7	1.0 - 5.0	Asp. Tox. 1, H304

SECTION 4: First aid measures	
4.1. Description of first aid measures	
First-aid measures after inhalation	: Get medical advice/attention. Remove person to fresh air and keep comfortable for breathing.
First-aid measures after skin contact	: Wash with plenty of soap and water. Take off contaminated clothing and wash it before reuse.
First-aid measures after eye contact	: Direct contact with the eyes is likely irritating.
First-aid measures after ingestion	: Rinse mouth with water. Do NOT induce vomiting.



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4.2. Most important symptoms and	
Symptoms/injuries	: Not expected to present a significant hazard under anticipated conditions of normal use.
Symptoms/injuries after inhalation	: May cause respiratory irritation.
Symptoms/injuries after skin contact	: Slight irritation.
Symptoms/injuries after eye contact	: Direct contact with the eyes is likely irritating.
Symptoms/injuries after ingestion	: No data available.
4.3. Indication of any immediate me No additional information available	dical attention and special treatment needed
SECTION 5: Firefighting meas	ures
5.1. Extinguishing media	
Suitable extinguishing media	: Water spray. Carbon dioxide. Dry chemical powder.
5.2. Special hazards arising from the	e substance or mixture
Reactivity	 On burning: release of toxic and corrosive gases/vapours (nitrous vapours, sulphur oxides, carbon monoxide - carbon dioxide). If the product is involved in a fire, it can release toxic chlorine gases. Reacts violently with (strong) oxidizers.
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	e measures
	re 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.
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. Preve	ent entry to sewers and public waters.
6.3. Methods and material for conta	inment and cleaning up
For containment	: Collect spillage.
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 stor	rade
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, inc Technical measures	: Comply with applicable regulations.
Storage conditions	 Comply with applicable regulations. Keep container tightly closed. Keep only in the original container in a cool, well ventilated place away
Storage conditions	from: sparks, open flames, excessive heat.
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.

: Keep only in original container. meet the legal requirements. Special rules on packaging

SECTION 8: Exposure controls/personal protection

Version: 1.0

SECTION 9: Physical and chemical properti

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8.1. Control parameters

bromacil (314-40-9)		
ACGIH	ACGIH TWA (mg/m³)	10 mg/m³

8.2. Exposure controls

Personal protective equipment

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



SECTION 9: Physical and chemical	properties
9.1. Information on basic physical and che	emical properties
Physical state	: Solid
Appearance	: Grey granules.
Odor	: Mild odor
Odor threshold	: No data available
рН	: No data available
Melting point	: No data available
Freezing point	: No data available
Boiling point	: No data available
Flash point	: No data available
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
Solubility	: Soluble 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	: No data available
Viscosity, dynamic	: No data available

SECTION 10: Stability and reactivity

10.1. Reactivity

On burning: release of toxic and corrosive gases/vapours (nitrous vapours, sulphur oxides, carbon monoxide - carbon dioxide). If the product is involved in a fire, it can release toxic chlorine gases. Reacts violently with (strong) oxidizers.

10.2. Chemical stability

Combustible liquid. Stable under normal conditions. Risk of explosion if heated under confinement. Heating may cause a fire or explosion.

10.3. Possibility of hazardous reactions Refer to section 10.1 on Reactivity.

Refer to section 10.1 on Reactivity

10.4. Conditions to avoid

No additional information available

10.5. Incompatible materials Oxidizing agents.

10.6. Hazardous decomposition products

Thermal decomposition produces: CO, CO2, Oxides of nitrogen and other potentially toxic fumes.

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SECTION 11: Toxicological information

11.1. Information on toxicological effects



Acute toxicity	: Not classified
bromacil (314-40-9)	
LD50 oral rat	5200 mg/kg (Rat)
LD50 dermal rat	> 2500 mg/kg (Rat)
LD50 dermal rabbit	> 5000 mg/kg (Rabbit)
LC50 inhalation rat (mg/l)	> 4.8 mg/l/4h (Rat)
ATE CLP (oral)	5200.000 mg/kg body weight
Skin corrosion/irritation	: Not classified
Serious eye damage/irritation	: Not classified
Respiratory or skin sensitization	: Not classified
Germ cell mutagenicity	: Not classified
Carcinogenicity	: May cause cancer.
Crystalline Silica (14808-60-7)	
IARC group	1 - 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 Symptoms/injuries after inhalation Symptoms/injuries after skin contact Symptoms/injuries after eye contact	 Not classified May cause respiratory irritation. Slight irritation. Direct contact with the eyes is likely irritating.
Symptoms/injuries after ingestion	: No data available.

SECTION 12: Ecological information 12.1. Toxicity bromacil (314-40-9) LC50 fish 1 75 mg/l 48 h; Salmo gairdneri (Oncorhynchus mykiss) LC50 fish 2 71 mg/l (48 h; Leuciscus idus) Threshold limit other aquatic organisms 1 1 mg/l (Pimephales promelas; Chronic) 12.2. Persistence and degradability bromacil (314-40-9) Persistence and degradability Not readily biodegradable in water. Non degradable in the soil. Photodegradation in the air. 12.3. Bioaccumulative potential bromacil (314-40-9) BCF fish 1 2.8 - 26.5 (672 h; Leuciscus idus; Fresh weight) BCF fish 2 4.25 (388 h; Pimephales promelas; Fresh weight)

Log Pow	2.11
Bioaccumulative potential	Low potential for bioaccumulation (BCF < 500).

SECTION 13: Disposal considerations			
13.1. Waste treatment methods			
Waste disposal recommendations	: Dispose of contents/container to comply with local/regional/national regulations.		

SECTION 14: Transport information Department of Transportation (DOT)

In accordance with DOT:	Not regulated for transport
Additional information	
Other information	: No supplementary information available.

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ADR
No additional information available
Transport by sea
No additional information available
Air transport
No additional information available
SECTION 15: Regulatory information
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.

bromacil	CAS No 314-40-9	1.0 - 5.0
bromacil (314-40-9)		
Listed on SARA Section 313 (Specific toxic chemical lis	tings)	

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

This chemical is a pesticide product registered by the Environmental Protection Agency and is subject to certain labelling requirements under federal pesticide law. These requirements differ from the classification criteria and hazard information required for safety data sheets, and for workplace labels of non-pesticide chemicals. Following is the hazard information as required on the pesticide label:

CAUTION: Causes moderate eye irritation. Avoid contact with skin, eyes, or clothing. Avoid breathing of dust.

SECTION 16: Other information

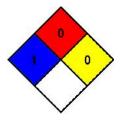
Training advice

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

Full text of H-phrases:

Asp. Tox. 1	Aspiration hazard Category 1
Carc. 1A	Carcinogenicity Category 1A
Eye Irrit. 2A	Serious eye damage/eye irritation Category 2A
H304	May be fatal if swallowed and enters airways
H319	Causes serious eye irritation
H350	May cause cancer

NFPA health hazard:1 - Exposure could cause irritation but only minor residual injury even if no treatment is given.NFPA fire hazard:0 - Materials that will not burn.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.