



Safety Data Sheet

Section 1: Identification

Product identifier

Product Name • **Zoecon Granular IGR Cattle Supplement**

Synonyms • EPA Reg. No.: 2724-372

Product Description • Granular solid.

Relevant identified uses of the substance or mixture and uses advised against

Recommended use • Insect growth regulator

Restrictions on use • KEEP OUT OF THE REACH OF CHILDREN. Avoid contact with eyes, skin and clothing. Do not use or store near heat or open flame. Avoid breathing dust.

Details of the supplier of the safety data sheet

Manufacturer • Wellmark International
1501 E. Woodfield Road 200W
Schaumburg, IL 60173
United States

www.zoecon.com

Emergency telephone number

Manufacturer • 1-800-248-7763

Manufacturer (Transportation) • 1-800-424-9300 - CHEMTREC

Manufacturer (Transportation) • 1-703-527-3887 - CHEMTREC Outside US Collect Calls accepted

Section 2: Hazard Identification

United States (US)

According to: OSHA 29 CFR 1910.1200 HCS

Classification of the substance or mixture

OSHA HCS 2012 • Combustible Dust
Specific Target Organ Toxicity Single Exposure 3: Respiratory Tract Irritation
Eye Mild Irritation 2B

Label elements

OSHA HCS 2012

WARNING



- Hazard statements** • May form combustible dust concentrations in air.
Causes eye irritation
May cause respiratory irritation

Precautionary statements

- Prevention** • Wash thoroughly after handling.
Use only outdoors or in a well-ventilated area.
Avoid breathing vapors, dust, mist or spray.
- Response** • IF IN EYES: 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.
IF INHALED: Remove person to fresh air and keep comfortable for breathing. Call a poison control center or doctor if you feel unwell.

- Storage/Disposal** • Dispose of content and/or container in accordance with local, regional, national, and/or international regulations.
Store in a well-ventilated place. Keep container tightly closed.
Store locked up.

Other hazards

OSHA HCS 2012

- Under United States Regulations (29 CFR 1910.1200 - Hazard Communication Standard), this product is considered hazardous. This pesticide is toxic to aquatic invertebrates.

Section 3 - Composition/Information on Ingredients

Substances

- Material does not meet the criteria of a substance.

Mixtures

Composition		
Chemical Name	Identifiers	%
(s)-Methoprene	CAS:65733-16-6	0.02%
Corn cob fractions	NDA	92.37%
Other ingredients	NDA	7.61%

Section 4: First-Aid Measures

Description of first aid measures

Inhalation

- IF INHALED: If breathing is difficult, remove person to fresh air and keep at rest in a position comfortable for breathing. Call a POISON CENTER or doctor/physician if you feel unwell.

Skin

- IF ON SKIN: Wash with plenty of soap and water. If skin irritation occurs: Get medical advice/attention.

Eye

- IF IN EYES: 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.

Ingestion

- First aid is not expected to be necessary if material is used under ordinary conditions and as recommended. IF SWALLOWED: Call a POISON CONTROL center or doctor if you feel unwell. Rinse mouth. Do NOT induce vomiting.

Most important symptoms and effects, both acute and delayed

- Causes eye irritation, may cause respiratory irritation. Refer to Section 11 - Toxicological Information.

Indication of any immediate medical attention and special treatment needed**Notes to Physician**

- Treat symptomatically and supportively.

Section 5: Fire-Fighting Measures**Extinguishing media**

Suitable Extinguishing Media • Use water, foam, carbon dioxide, or dry chemical.

Unsuitable Extinguishing Media • Avoid heavy hose streams.

Firefighting Procedures • As an immediate precautionary measure, isolate spill or leak area for at least 50 meters (150 feet) in all directions.
LARGE FIRES: Dike fire control water for later disposal; do not scatter the material. Move containers from fire area if you can do it without risk.
 Stay upwind.
 Combustible dust - use low-pressure medium fog streams to avoid dust clouds.
 Eliminate ignition sources.
 Do not breathe gas/fumes/vapour/spray.
 Do not walk through spilled material.

Special hazards arising from the substance or mixture

Unusual Fire and Explosion Hazards • Avoid generating dust; fine dust dispersed in air in sufficient concentrations, and in the presence of an ignition source is a potential dust explosion hazard.

Hazardous Combustion Products • Irritating or toxic substances may be emitted upon burning, combustion or decomposition.

Advice for firefighters

- Wear positive pressure self-contained breathing apparatus (SCBA). Structural firefighters' protective clothing will only provide limited protection. Runoff from fire control may cause pollution.
 Do not allow run-off to enter waterways.

Section 6 - Accidental Release Measures**Personal precautions, protective equipment and emergency procedures**

Personal Precautions • Do not touch damaged containers or spilled material unless wearing appropriate protective clothing. Do not walk through spilled material. Keep all sources of ignition away and avoid creating dusty conditions. Use appropriate Personal Protective Equipment (PPE) Ventilate enclosed areas.

Emergency Procedures • ELIMINATE all ignition sources (no smoking, flares, sparks or flames in immediate area). Contain spill and monitor for excessive dust accumulation. Keep unauthorized personnel away. Ventilate closed spaces before entering.

Environmental precautions

- Prevent spreading of vapors through sewers, ventilation systems and confined areas. Runoff from fire control or dilution water may cause pollution.

Methods and material for containment and cleaning up

Containment/Clean-up Measures • Carefully shovel or sweep up spilled material and place in suitable container. Avoid generating dust.
 Use clean nonsparking tools to collect material.
 Dust Deposits should not be allowed to accumulate on surfaces, as these may form an explosive mixture if they are released into the atmosphere in sufficient concentration.
 Wear appropriate personal protective equipment, avoid direct contact.

Section 7 - Handling and Storage

Precautions for safe handling

Handling

- Wear appropriate personal protective equipment, avoid direct contact. Avoid breathing dust. Avoid contact with skin, eyes, and clothing. Do not use in areas without adequate ventilation. Take precautionary measures against static charges. Wash thoroughly with soap and water after handling and before eating, drinking, or using tobacco. Wear appropriate personal protective equipment including long-sleeved shirt, long pants, chemical resistant gloves, shoes and socks. Avoid direct contact.

Conditions for safe storage, including any incompatibilities

Storage

- Store in cool, dry, secure place. Keep container tightly closed. Keep away from sources of ignition – No Smoking. Store locked up. Ventilate enclosed areas. Avoid extreme temperatures.

Incompatible Materials or Ignition Sources

- Heat, sparks, open flame. Strong acids, strong bases, and oxidizing agents.

Section 8 - Exposure Controls/Personal Protection

Control parameters

Exposure Limits/Guidelines

- It is recommended that dust control equipment such as local exhaust ventilation and material transport systems involved in handling of this product contain explosion relief vents or an explosion suppression system or an oxygen-deficient environment.

Exposure Limits/Guidelines			
	Result	ACGIH	OSHA
Zoecon Granular IGR Cattle Supplement	TWAs	10 mg/m ³ TWA (inhalable particles, recommended); 3 mg/m ³ TWA (respirable particles, recommended) <i>as Particulates not otherwise classified (PNOC)</i>	15 mg/m ³ TWA (total dust); 5 mg/m ³ TWA (respirable fraction) <i>as Particulates not otherwise classified (PNOC)</i>

Exposure controls

Engineering Measures/Controls

- Local exhaust ventilation. Ensure that dust handling systems (such as exhaust ducts, dust collectors, vessels and processing equipment) are designed in a manner to prevent the escape of dust into the work area (i.e., there is not leakage from the equipment). Use only appropriately classified electrical equipment.

Personal Protective Equipment

Pictograms



Respiratory

- Follow the OSHA respirator regulations found in 29 CFR 1910.134. Use a NIOSH/MSHA approved respirator if nuisance dust exposure limits are exceeded or symptoms are experienced.

Eye/Face

- Wear safety goggles.

Hands

- Wear appropriate gloves.

Skin/Body

- Wear long sleeves and/or protective coveralls.

General Industrial Hygiene Considerations

- Avoid generating dust; fine dust dispersed in air in sufficient concentrations, and in the presence of an ignition source is a potential dust explosion hazard.

Environmental Exposure Controls

- Controls should be engineered to prevent release to the environment, including procedures to prevent spills, atmospheric release and release to waterways. Follow best practice for site management and disposal of waste.

Section 9 - Physical and Chemical Properties

Information on Physical and Chemical Properties

Material Description			
Physical Form	Solid	Appearance/Description	Granular solid.
Color	Varies	Odor	Varies
Odor Threshold	No data available		
General Properties			
Boiling Point	No data available	Melting Point/Freezing Point	No data available
Decomposition Temperature	No data available	pH	Not relevant
Specific Gravity/Relative Density	Varies - depends on animal feed ingredients	Bulk Density	Varies - depends on animal feed ingredients
Water Solubility	No data available	Viscosity	Not relevant
Volatility			
Vapor Pressure	No data available	Vapor Density	No data available
Evaporation Rate	No data available		
Flammability			
Flash Point	Not relevant	UEL	No data available
LEL	No data available	Autoignition	Data lacking
Flammability (solid, gas)	Data lacking		
Environmental			
Octanol/Water Partition coefficient	No data available		

Section 10: Stability and Reactivity

Reactivity

- This material is friable and can create small dust particles during any handling, processing, and transfer operations. This material can form explosive dust/air suspensions that are ignitable under some conditions.

Chemical stability

- Stable under normal temperatures and pressures.

Possibility of hazardous reactions

- Hazardous polymerization not indicated. May form combustible dust concentrations in the air.

Conditions to avoid

- Heat, sparks, open flame, other ignition sources, and oxidizing conditions.

Incompatible materials

- Strong acids, strong bases and oxidizing agents.

Hazardous decomposition products

- Carbon monoxide and carbon dioxide.

Section 11 - Toxicological Information

Information on toxicological effects

Components		
(s)-Methoprene (0.02%)	65733-16-6	Acute Toxicity: Ingestion/Oral-Rat LD50 • >34000 mg/kg • Comments: Based on (S)-Methoprene; Inhalation-Rat LC50 • >5.19 mg/L • Comments: Based on (S)-Methoprene; Skin-Rabbit LD50 • >5000 mg/kg; Irritation: Eye-Rabbit • Essentially non-irritating; Skin-Rabbit • Essentially non-irritating

GHS Properties	Classification
Respiratory sensitization	OSHA HCS 2012 • Classification criteria not met
Serious eye damage/Irritation	OSHA HCS 2012 • Eye Mild Irritation 2B
Acute toxicity	OSHA HCS 2012 • Acute Toxicity - Dermal - Classification criteria not met; Acute Toxicity - Inhalation - Classification criteria not met; Acute Toxicity - Oral - Classification criteria not met
Aspiration Hazard	OSHA HCS 2012 • Classification criteria not met
Carcinogenicity	OSHA HCS 2012 • Classification criteria not met
Skin corrosion/Irritation	OSHA HCS 2012 • Classification criteria not met
Skin sensitization	OSHA HCS 2012 • Classification criteria not met
STOT-RE	OSHA HCS 2012 • Classification criteria not met
STOT-SE	OSHA HCS 2012 • Specific Target Organ Toxicity Single Exposure 3: Respiratory Tract Irritation
Toxicity for Reproduction	OSHA HCS 2012 • Classification criteria not met
Germ Cell Mutagenicity	OSHA HCS 2012 • Classification criteria not met

Route(s) of entry/exposure • Inhalation, Skin, Eye, Ingestion

Potential Health Effects

Inhalation

- Acute (Immediate)** • May cause respiratory irritation.
- Chronic (Delayed)** • No data available

Skin

- Acute (Immediate)** • May cause mild irritation.
- Chronic (Delayed)** • No data available

Eye

- Acute (Immediate)** • Causes eye irritation.
- Chronic (Delayed)** • No data available.

Ingestion

- Acute (Immediate)** • Under normal conditions of use, no health effects are expected.
- Chronic (Delayed)** • No data available

Mutagenic Effects

- Methoprene has been tested and found negative for mutagenicity potential.

Carcinogenic Effects

- Methoprene is not classified as carcinogen by NTP, IARC and OSHA.

Reproductive Effects

- Methoprene is not a teratogenic compound. The NOEL for maternal and embryotoxicity in rabbits was 200 mg/kg/day. The NOEL for reproductive effects in rats was 500 ppm.

Section 12 - Ecological Information

Toxicity

Components		
(s)-Methoprene (0.02%)	65733-16-6	Aquatic Toxicity-Fish: 96 Hour(s) LC50 <i>Rainbow Trout</i> 0.76 mg/L [Acute] 96 Hour(s) LC50 <i>Bluegill</i> >0.37 mg/L [Acute] NOEC <i>Fathead Minnow</i> 0.048 mg/L [Chronic]

Aquatic Toxicity-Crustacea: NOEC *Mysid Shrimp* 0.014 mg/L [Chronic]
48 Hour(s) LC50 *Daphnia* 0.36 mg/L [Acute]

Persistence and degradability

- Methoprene degrades rapidly in sunlight, both in water and on inert surfaces. The pesticide also is metabolized rapidly in soil and does not leach. Thus, it should not persist in soil or contaminate ground water.

Bioaccumulative potential

- No data available.

Mobility in Soil

- (s)-Methoprene: 10-14 days, rapidly hydrolyzed in soil.

Other adverse effects

Potential Environmental Effects

- This pesticide is toxic to aquatic invertebrates.

Section 13 - Disposal Considerations

Waste treatment methods

Product waste

- Dispose of content and/or container in accordance with local, regional, national, and/or international regulations. Do not empty into drains.

Packaging waste

- Nonrefillable container. Do not reuse or refill this container. Dispose of content and/or container in accordance with local, regional, national, and/or international regulations. See product label for disposal instructions.

Section 14 - Transport Information

	UN number	UN proper shipping name	Transport hazard class (es)	Packing group	Environmental hazards
DOT	Not Applicable	Not Regulated	Not Applicable	Not Applicable	Not Applicable
IMO/IMDG	Not Applicable	Not Regulated	Not Applicable	Not Applicable	Not Applicable
IATA/ICAO	Not Applicable	Not Regulated	Not Applicable	Not Applicable	Not Applicable

Special precautions for user • None specified.

Transport in bulk according to Annex II of MARPOL 73/78 and the IBC Code • No Data Available.

Other information

IMO/IMDG • No data available

IATA/ICAO • No data available

Section 15 - Regulatory Information

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

SARA Hazard Classifications • Acute

FIFRA – Pesticide Labeling

This material is a pesticide product registered by the United States Environmental Protection Agency and is subject to certain labeling requirements under federal pesticide law. These requirements differ from the classification criteria and hazard information required for safety data sheets (SDS), and for workplace labels of non-

pesticide chemicals. The hazard information required on the pesticide label is reproduced below. The pesticide label also includes other important information, including directions for use.

CAUTION

Precautionary Statements • KEEP OUT OF THE REACH OF CHILDREN.

Hazards to Humans and Domestic Animals • This product contains high levels of copper. Consumption of this product by sheep or goats could result in copper toxicity.

Environmental Hazards • This product is toxic to aquatic invertebrates. Using it in a manner other than that described by the label could result in harm to aquatic invertebrates. Do not contaminate water when disposing of rinsate or equipment washwaters.

Inventory		
Component	CAS	TSCA
(s)-Methoprene	65733-16-6	No

Section 16 - Other Information

Revision Date • 28/October/2015

Last Revision Date • 28/October/2015

Preparation Date • 28/October/2015

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