1 Identification

Safety Data Sheet



Flavors & Specialty Products for the Feed Industry

II Identification			
Product Code:	7500	Formula ID:	7500
Product Name:	BIO-IMPACT GARLIC 12X		
Recommended Use:	Flavoring component for further proce	ssing	
Supplied by:	FMF Specialty Agri Products 8805 Tamiami Trail N. Ste 230 Naples, FL 34108		
24 Hour Emergency Contact:	Infotrac US / Canada: 1-800-535-5053		
Safety Data Sheet Coordinator:	JohnD@fmfagri.com		

2. Hazards Identification

GHS Classification

No GHS Classifications were found

Symbol(s) of Product

No GHS Symbols Exist

Signal Word

No Signal Word has been assigned

3. Composition/Information on Ingredients

Chemical Name	CAS-No.	GHS Statements
Natural Garlic	539-86-6	No Information
Allyl Disulfide	2179-57-9	No Information
Diallyl Trisulfide	2050-87-5	No Information

The text for GHS Hazard Statements shown above (if any) is given in the "Other information" Section.

4. First-aid Measures



FIRST AID - INHALATION: Give oxygen or artificial respiration if needed. Remove person to fresh air. If signs/symptoms continue, get medical attention.

FIRST AID - SKIN CONTACT: In case of contact, immediately flush skin with plenty of water while removing contaminated clothing and shoes. If rash or irritation develops, consult a physician.

FIRST AID - EYE CONTACT: If material gets into eyes, flush with water immediately for 15 minutes. Consult a physician.

FIRST AID - INGESTION: If ingested, consult a physician.

5. Fire-fighting Measures

UNUSUAL FIRE AND EXPLOSION HAZARDS: Risks of ignition followed by flame propagation or secondary explosions shall be prevented by avoiding accumulation of dust, e.g. on floors and ledges.

SPECIAL FIREFIGHTING PROCEDURES: Use a self-contained breathing apparatus with full facepiece operated in pressure demand or other positive pressure mode.

Extinguishing Media: Carbon Dioxide, Dry Chemical, Water Fog

6. Accidental Release Measures

ENVIRONMENTAL PRECAUTIONS: Contain any spills immediately and dike area to prevent spreading. Package material and dispose of as hazardous waste.

STEPS TO BE TAKEN IN CASE MATERIAL IS RELEASED OR SPILLED: Vacuum or sweep up material and place in a disposal container. Take care to prevent airborne dust and scattering. Only trained personnel wearing protective equipment should handle spill cleanup. Avoid personal contact.

7. Handling and Storage



HANDLING: Avoid breathing dust. To reduce potential for static discharge, bond and ground containers when transferring material. Practice good caution and personal cleanliness to avoid skin and eye contact. Do not eat, drink, or smoke while handling this product. Wash hands after handling and before eating.

STORAGE: Keep container tightly closed when not in use.

8. Exposure Controls/Personal Protection				
Ingredients with Occupational Exposure Limits				
Chemical Name	ACGIH TLV-TWA	ACGIH-TLV STEL	OSHA PEL-TWA	OSHA PEL-CEILING
ALL IN THE PLAN				

No hazardous items exist

Further Advice: MEL = Maximum Exposure Limit OES = Occupational Exposure Standard SUP = Supplier's Recommendation Sk = Skin Sensitizer N.E. = Not Established

Personal Protection



RESPIRATORY PROTECTION: Atmospheric levels should be maintained below exposure limits using ventilation. Use NIOSH approved respirator where ventilation is insufficient.



SKIN PROTECTION: Chemical-resistant gloves and safety glasses and synthetic apron or coveralls should be used to prevent contact with eyes, skin or clothing.



EYE PROTECTION: Use goggles or safety glasses.



OTHER PROTECTIVE EQUIPMENT: Use good hygeine practices. Wash face and hands before eating, drinking, and smoking. Eye wash and safety showers should be readily available.



HYGIENIC PRACTICES: Contaminated clothing should be changed and washed before reuse. Eating, drinking and smoking in immediate work area should be prohibited. Wash hands and face before breaks and immediately after handling the product.

9. Physical and Chemical Properties

Appearance: Odor: Density, g/cm3: Freeze Point, °C: Soluble in Water: Decomposition temperature, °C	Tan, Granular Characteristic Not Measured Not Measured Not Measured Not Measured	Physical State: Odor Threshold: pH: Viscosity: Partition Coefficient, n-octanol/ water:	Granular, Powder Not Measured Not Measured Not Applicable Not Applicable
Boiling Range, °C: Combustibility:	Not Applicable Supports Combustion	Explosive Limits, %: Flash Point, °C:	Not Measured
Evaporation Rate: Vapor Density:	Not Applicable Not Measured	Auto-Ignition Temperature, °C Vapor Pressure, mmHg:	Not Measured Not Measured Not Applicable

(See "Other information" Section for abbreviation legend)

10. Stability and Reactivity

STABILITY: Stable under normal conditions.

CONDITIONS TO AVOID: Moisture, exposure to light and air.

INCOMPATIBILITY: None known

HAZARDOUS DECOMPOSITION PRODUCTS: Thermal decomposition may release CO & CO2.

11. Toxicological Information



Practical Experiences

EFFECT OF OVEREXPOSURE - INHALATION: Inhalation may cause irritation to the respiratory tract (nose, mouth, mucous membranes).

EFFECT OF OVEREXPOSURE - SKIN CONTACT: Direct skin contact may cause irritation.

EFFECT OF OVEREXPOSURE - EYE CONTACT: Mist and vapors may cause eye irritation. Direct eye contact may cause irritation.

EFFECT OF OVEREXPOSURE - INGESTION: May be harmful if swallowed. May cause nausea, vomiting, and diarrhea.

CARCINOGENICITY: No Information

PRIMARY ROUTE(S) OF ENTRY: Eye Contact, Ingestion, Inhalation, Skin Absorption, Skin Contact

Acute Toxicity Values

The acute effects of this product have not been tested. Data on individual components are tabulated below

CAS-No.	Chemical Name
2179-57-9	Allyl Disulfide
2050-87-5	Diallyl Trisulfide

Oral LD50 260 mg/kg 500 mg/kg Dermal LD50 3600 mg/kg Vapor LC50

N.I. = No Information

12. Ecological Information

ECOLOGICAL INFORMATION: This product has no known eco-toxicological effects.

13. Disposal Information



Product

DISPOSAL METHOD: Dispose of material in accordance with applicable federal, state and local regulations.

STEPS TO BE TAKEN IN CASE MATERIAL IS RELEASED OR SPILLED: Vacuum or sweep up material and place in a disposal container. Take care to prevent airborne dust and scattering. Only trained personnel wearing protective equipment should handle spill cleanup. Avoid personal contact.

14. Transport Information

SPECIAL TRANSPORT PRECAUTIONS: No Information

DOT Proper Shipping Name:NDOT Technical Name:NDOT Hazard Class:NDOT UN/NA Number:N

No Information No Information No Information No Information Packing Group: Hazard SubClass: Resp. Guide Page: No Information No Information No Information

15. Regulatory Information

U.S. Federal Regulations:

CERCLA - SARA Hazard Category

This product has been reviewed according to the EPA 'Hazard Categories' promulgated under Sections 311 and 312 of the Superfund Amendment and Reauthorization Act of 1986 (SARA Title III) and is considered, under applicable definitions, to meet the following categories:

None Known

SARA SECTION 313:

This product contains the following substances subject to the reporting requirements of Section 313 of Title III of the Superfund Amendment and Reauthorization Act of 1986 and 40 CFR part 372:

No Sara 313 components exist in this product.

TOXIC SUBSTANCES CONTROL ACT:

This product contains the following chemical substances subject to the reporting requirements of TSCA 12(B) if exported from the United States:

No TSCA components exist in this product.

U.S. State Regulations:

NEW JERSEY RIGHT-TO-KNOW:

The following hazardous materials are among the components in this product.

No NJ Right-To-Know components exist in this product.

PENNSYLVANIA RIGHT-TO-KNOW

The following hazardous ingredients are present in the product at greater than 3%.

No PA Right-To-Know components exist in this product.

CALIFORNIA PROPOSITION 65 CARCINOGENS

Warning: The following ingredients present in the product are known to the state of California to cause Cancer:

No Proposition 65 Carcinogens exist in this product.

CALIFORNIA PROPOSITION 65 REPRODUCTIVE TOXINS

Warning: The following ingredients present in the product are known to the state of California to cause birth defects, or other reproductive hazards.

No Proposition 65 Reproductive Toxins exist in this product.

International Regulations: As follows - CANADIAN WHMIS:

This MSDS has been prepared in compliance with Controlled Product Regulations except for the use of the 16 headings.

WHMIS Class No Information

16. Other Information				
Revision Date:	5/30/2019	Supersedes Date:	1/07/2019	
Datasheet produced by:	Regulatory Department			
NFPA Ratings:	Non-Flammable			

Icons for GHS Pictograms shown in Section 3 describing each ingredient:

No GHS Pictograms exist for Section 3

Legend: N.A. - Not Applicable, N.E. - Not Established, N.D. - Not Determined

The information on this sheet corresponds to our present knowledge. It is not a specification and it does not guarantee specific properties. The information is intended to provide general guidance as to health and safety based upon our knowledge of the handling, storage, and use of the product. It is not applicable to unusual or non-standard uses of the product where instructions and recommendations are not followed.