



# SAFETY DATA SHEET

SECTION 1: IDENTIFICATION	
<b>PRODUCT NAME:</b>	<b>FEEDS</b>
<b>SDS NUMBER:</b>	FEED
<b>SYNONYMS/OTHER MEANS OF IDENTIFICATION:</b>	CORN, SOYBEANS, OATS OR OTHER GRAIN FEED
<b>INTENDED USE:</b>	ANIMAL FEED
<b>MANUFACTURER:</b>	VARIOUS
<b>EMERGENCY HEALTH AND SAFETY NUMBER:</b>	(616) 669-9596
<b>SDS INFORMATION:</b>	phone: (616) 669-9596 e-mail: info@fcelelevator.com url: <a href="http://www.fcelelevator.com">http://www.fcelelevator.com</a>

SECTION 2: HAZARD(S) IDENTIFICATION
<p><b>CLASSIFICATION:</b> COMBUSTIBLE DUST/RESPIRATORY HAZARD IF SMALL PARTICLES ARE GENERATED DURING FURTHER PROCESSING, HANDLING OR BY OTHER MEANS.</p> <p><b>LABEL ELEMENTS:</b> <b>SIGNAL WORD:</b> N/A DUE TO FDA LABELING EXEMPTION</p> <p><b>HAZARD STATEMENT(S):</b> CLASS 2B EYE IRRITANT. MAY CAUSE BREATHING DIFFICULTIES IF INHALED. MAY CREATE A FLASH FIRE OR EXPLOSION HAZARD IF DUST OF CERTAIN PARTICLE SIZE IS SUSPENDED IN AIR AT SUFFICIENT CONCENTRATION IN A CONFINED SPACE AND EXPOSED TO AN IGNITION SOURCE.</p> <p><b>PRECAUTIONARY STATEMENT(S):</b> MAY BE MECHANICAL EYE IRRITANT. RINSE EYES WITH WATER FOR SEVERAL MINUTES. AVOID BREATHING DUST. EXCESSIVE INHALATION MAY AFFECT NOSE THROAT, AND LUNGS. FEED DUST MAY BURN IF SUSPENDED IN AIR AND MAY CREATE A FLASH FIRE/ EXPLOSION HAZARD. AVOID IGNITION SOURCES.</p> <p><b>EMERGENCY OVERVIEW:</b> MAY BE MECHANICAL IRRITANT TO EYES. EXCESSIVE INHALATION OF FEED DUSTS MAY AFFECT NOSE THROAT, AND LUNGS. MAY FORM COMBUSTIBLE DUST CONCENTRATION IN AIR; SEE "EXPLOSION HAZARD" BELOW.</p> <p><b>EXPLOSION HAZARD:</b> FEED IS GENERALLY CONSIDERED NOT HAZARDOUS, BUT DUST GENERATED THROUGH DOWNSTREAM ACTIVITIES THAT MAY REDUCE ITS PARTICLE SIZE (E.G., SHIPPING, HANDLING, TRANSFER TO BINS, ETC.) MAY CREATE A HAZARDOUS CONDITION.</p> <p>IF EXPOSED TO AN IGNITION SOURCE, FEED DUST MAY BURN. AIRBORNE DUST IN SUFFICIENT CONCENTRATIONS WHEN EXPOSED TO AN IGNITION SOURCE MAY FLASH OR, IN A CONFINED SITUATION, MAY FUEL AN EXPLOSION.</p>

**SECTION 3: COMPOSITION/INFORMATION ON INGREDIENTS**

COMPONENT	CASRN	CONCENTRATION
DUST FROM PREPARED ANIMAL FEEDS (GRAINS, PLANT AND/OR ANIMAL PROTEINS, VITAMINS AND MINERALS)		100%

**SECTION 4: FIRST-AID MEASURES****INHALATION:**

REMOVE PERSON FROM EXPOSURE. SEEK MEDICAL ATTENTION FOR ANY BREATHING DIFFICULTY.

**INGESTION:**

IF SWALLOWED, GIVE SEVERAL GLASSES OF WATER TO DILUTE. NEVER GIVE ANYTHING BY MOUTH TO AN UNCONSCIOUS PERSON.

**SKIN CONTACT:**

WASH AFFECTED SKIN WITH SOAP AND WATER.

**EYE CONTACT:**

FLUSH EYES WITH WATER. SEEK MEDICAL ATTENTION AS NEEDED.

**SECTION 5: FIRE FIGHTING MEASURES**

**HAZARDOUS COMBUSTION PRODUCTS:** OXIDES OF CARBON

**SPECIAL FIRE FIGHTING PROCEDURES:** EXTINGUISH WITH WATER FOG, DRY CHEMICAL POWDERS OR FOAM. DO NOT USE STRONG STREAMS OF WATER OR DRY CHEMICAL IF DUST CAN BE DISPERSED INTO THE AIR. DUST PLACED IN SUSPENSION WITH AN IGNITION SOURCES PRESENT MAY FLASH OR EXPLODE.

**UNUSUAL FIRE AND EXPLOSION HAZARDS:** EXPLOSION HAZARD MAY EXIST FOR COMBUSTIBLE DUSTS OF CERTAIN PARTICLE SIZE AND MOISTURE CONTENT WHEN SUSPENDED IN AIR AT CERTAIN CONCENTRATIONS AND SUBJECTED TO AN IGNITION SOURCE.

**SECTION 6: ACCIDENTAL RELEASE MEASURES**

CLEAN UP WITH SOFT BRISTLE BROOM(S) OR A VACUUM APPROVED FOR A CLASS II HAZARDOUS LOCATION. DUST DEPOSITS SHOULD BE MAINTAINED TO A MINIMUM ON SURFACES, AS THESE COULD FORM AN EXPLOSIVE MIXTURE IF THEY ARE RELEASED INTO THE ATMOSPHERE IN SUFFICIENT CONCENTRATION. AVOID DISPERSAL OF DUST IN THE AIR (I.E., CLEANING DUST SURFACES WITH COMPRESSED AIR IN THE PRESENCE OF IGNITION SOURCE SHOULD NOT BE ALLOWED). NON-SPARKING TOOLS SHOULD BE USED.

**SECTION 7: HANDLING AND STORAGE**

AVOID DISPENSING DUST IN AIR AND EXPOSURE TO POTENTIAL IGNITION SOURCES. REMOVE FEED DUST FROM AREA/PROCESSING EQUIPMENT PRIOR TO USING ANY HEAT PRODUCING EQUIPMENT SUCH AS ARC WELDERS, CUTTING TORCHES AND SPARK/HEAT PRODUCING TOOLS SUCH AS PORTABLE SURFACE GRINDERS. ACCORDING TO 29 CFR 1910.272(F) A HOT WORK PERMIT IS REQUIRED.

**SECTION 8: EXPOSURE CONTROLS/PERSONAL PROTECTION**

**RESPIRATORY PROTECTION:** MAY CAUSE IRRITATION OF THE NASAL MEMBRANES OR THE UPPER RESPIRATORY TRACT. IF DUST EXCEEDS THE NUISANCE LEVEL. WEAR AN APPROVED NIOSH DUST RESPIRATOR WHENEVER DUST CONCENTRATIONS IN THE WORK AREA ARE ABOVE ACGIH TLV/OSHA PELS.

**GRAIN DUST (WHEAT, OAT AND BARLEY)**

OSHA PEL

ACGIH TLV

10 MG/M3

4MG/M3\*

**OTHER GRAINS**

OSHA PEL

ACGIH TLV

15 MG/M3 (TOTAL)

10 MG/M3\*

5 MG/M3 (RESPIRABLE)

**PARTICULATES NOT OTHERWISE REGULATED (PNOR) - INERT OR NUISANCE DUST**

TOTAL DUST 15 MG/M<sup>3</sup>

RESPIRABLE FRACTION 5 MG/M<sup>3</sup>

*\* THIS TLV APPLIES TO NUISANCE PARTICULATES.*

*THE GRAIN INDUSTRY BELIEVES THERE IS CURRENTLY INADEQUATE DATA TO SUPPORT THIS TLV.*

**VENTILATION: LOCAL EXHAUST:** IF NEEDED

**MECHANICAL (GENERAL):** IF NEEDED

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 AREAS. USE ONLY APPROPRIATELY CLASSIFIED ELECTRICAL EQUIPMENT AND POWERED INDUSTRIAL TRUCKS.

**PROTECTIVE GLOVES:** N/A

**EYE PROTECTION:** SAFETY GLASSES / GOGGLES SUGGESTED IN DUSTY CONDITIONS

**WORK/ HYGIENIC PRACTICES:** GOOD PERSONAL HYGIENE PRACTICES SHOULD BE FOLLOWED. WASH HANDS AND FACE BEFORE EATING, DRINKING, ETC.

AVOID DUST ACCUMULATION AND CONTROL IGNITION SOURCES. WHERE APPROPRIATE, EMPLOY GROUNDING, VENTING, AND EXPLOSION RELIEF PROVISIONS IN ACCORDANCE WITH ACCEPTED ENGINEERING PRACTICES IN PROCESSES CAPABLE OF GENERATING DUST AND/OR STATIC ELECTRICITY. AVOID ACCUMULATION OF DUST ON SURFACES TO PREVENT SECONDARY DUST EXPLOSIONS.

**SECTION 9: PHYSICAL AND CHEMICAL PROPERTIES**

**FLASH POINT ( METHOD):** N/A

**FLAMMABLE LIMITS:**

**LEL:** VARIABLE

**UEL:** UNKNOWN

**AUTOIGNITION TEMPERATURE:** UNKNOWN

**APPEARANCE:** TAN TO DARK BROWN IN APPEARANCE WITH PERHAPS A SWEET ODOR

**SOLID CONTENTS:** 100%

**SECTION 10: STABILITY AND REACTIVITY**

**STABILITY:**      **UNSTABLE:**      **CONDITION TO AVOID:** DISPERSING DUST IN AIR ABOVE MEC, AND EXPOSURE TO POTENTIAL IGNITION SOURCES  
**STABLE:** X

**INCOMPATIBILITY (MATERIALS TO AVOID):** NONE KNOWN

**HAZARDOUS DECOMPOSITION OR BYPRODUCTS:** CO2 H2S AND OXYGEN DEFICIENT ATMOSPHERE UNDER IMPROPER STORAGE CONDITIONS

**HAZARDOUS POLYMERIZATION: MAY OCCUR:**      **CONDITION TO AVOID:** N/A  
**WILL NOT OCCUR:** X

**SECTION 11: TOXICOLOGICAL INFORMATION**

**ROUTES OF ENTRY:**    **INHALATION:** X    **SKIN:** X    **EYES:** X    **INGESTION:** UNLIKELY  
**CARCINOGENICITY:**    **NTP:** NO      **ARC MONOGRAPHS:** NO    **OSHA REGULATED:** NO

**ACUTE:** MAY BE MECHANICAL IRRITANT TO SKIN AND EYES. EXCESSIVE INHALATION OF FEED DUSTS MAY AFFECT THE NOSE, THROAT, AND LUNGS.

**CHRONIC:** REPEATED AND PROLONGED INHALATION OF FEED DUSTS MAY AFFECT THE RESPIRATORY SYSTEM. SMOKERS HAVE AN INCREASED RISK OF RESPIRATORY EFFECTS.

**SIGNS AND SYMPTOMS OF EXPOSURE:** IRRITATION TO THE SKIN, EYES, NOSE OR THROAT MAY OCCUR. SOME PEOPLE MAY OCCASIONALLY EXPERIENCE COUGHING.

**MEDICAL CONDITIONS GENERALLY AGGRAVATED BY EXPOSURE:** ALLERGIES AND RESPIRATORY AILMENTS.

**SECTION 12: ECOLOGICAL INFORMATION: (NON-MANDATORY)**

**SECTION 13: DISPOSAL CONSIDERATIONS: (NON-MANDATORY)**

**SECTION 14: TRANSPORT INFORMATION: (NON-MANDATORY)**

**SECTION 15: REGULATORY INFORMATION: (NON-MANDATORY)**

ALL ELECTRICAL EQUIPMENT MUST BE SUITABLE FOR USE IN HAZARDOUS ATMOSPHERES INVOLVING COMBUSTIBLE DUST IN ACCORDANCE WITH 29 CFR 1910.307. THE NATIONAL ELECTRICAL CODE, NFPA 70, CONTAINS GUIDELINES FOR DETERMINING THE TYPE AND DESIGN OF EQUIPMENT AND INSTALLATION, WHICH WILL MEET THIS REQUIREMENT.

COMBUSTIBLE DUST IS A "HAZARD, OTHER THAN CHEMICAL" AS DEFINED BY THE OSHA HAZARD COMMUNICATION STANDARD, 29 CFR 1910.1200. SECTION (B)(5)(III) OF THE HCS (CFR 1910.1200) EXEMPTS FOOD, INCLUDING FEED AND THEREFORE ANY ASSOCIATED FEED DUST, FROM THE LABELING REQUIREMENTS OF THE HCS SINCE THE FOOD/FEED IS SUBJECT TO THE LABELING REQUIREMENTS OF THE FOOD & DRUG ADMINISTRATION.

**SECTION 16: OTHER INFORMATION**

*ANIMAL FEED IS COMPRISED OF WHOLE AND PROCESSED GRAINS AND MAY CONTAIN ADDED VITAMINS AND MINERALS. FEED COMPONENTS GENERALLY PRODUCE A LIMITED AMOUNT OF DUST IN MANUFACTURING AND HANDLING OF THE MATERIAL.*

**THIS SDS IS GENERIC AND MAY NOT APPLY TO ALL FEED FORMULATIONS.** FOR EXAMPLE, FEED WITH CERTAIN ADDED MEDICATIONS PREMIXES, VITAMIN AND MINERAL SUPPLEMENTS MAY CONTAIN INGREDIENTS THAT RESULT IN DIFFERENT OR ADDITIONAL HAZARDS, MAY REQUIRE ADDITIONAL ACCIDENTAL RELEASE MEASURES, MAY HAVE DIFFERING TOXICOLOGICAL EXPOSURES AND/OR MAY REQUIRE ADDITIONAL EXPOSURE CONTROLS AND PERSONAL PROTECTION. THE MANUFACTURER IS ENCOURAGED TO EVALUATE EACH FEED FORMULATION TO DETERMINE IF THIS GENERIC SDS IS APPROPRIATE.

THIS GENERIC SDS IS NOT INTENDED TO SUGGEST THAT A SDS IS REQUIRED FOR ALL FEED DUST IN ALL CIRCUMSTANCES. THE MANUFACTURER OR IMPORTER SHOULD MAKE ITS OWN INTERPRETATION OF OSHA'S HCS, INCLUDING THE EXEMPTIONS IN THE STANDARD, FOR ITS SPECIFIC PRODUCT. SOME MANUFACTURERS OR IMPORTERS MAY ALSO PRODUCE A SDS FOR FEED DUST EVEN IF SUCH A SDS IS NOT REQUIRED BY OSHA'S HCS. THIS GENERIC SDS MAY BE USEFUL FOR THOSE MANUFACTURERS OR IMPORTERS.

IN ACCORDANCE WITH OSHA'S HAZARD COMMUNICATION STANDARD (HCS) ALL MATERIALS: 1) WHICH CONSTITUTE 1 % OR MORE OF THIS PRODUCT AND MEET THE STANDARD'S DEFINITION OF HAZARDOUS MATERIALS, 2) THAT CONSTITUTE 0.1% OR MORE AND MEET THE STANDARD'S DEFINITION OF CARCINOGENS, AND OR 3) THAT COULD BE RELEASED FROM THE PRODUCT IN EXCESS OF ESTABLISHED LIMITS SHOULD BE LISTED AND MAY REQUIRE A SPECIFIC SDS.