# COMBUSTIBLE DUST

**Does your company or firm process any of these products or materials in powdered form? If your company or firm processes any of the products or materials listed below, there is potential for a "Combustible Dust" explosion.**

**AGRICULTURAL PRODUCTS**
Egg white
Milk, powdered
Milk, nonfat, dry
Soy flour
Starch, corn
Starch, rice
Starch, wheat
Sugar
Sugar, milk
Sugar, beet
Tapioca
Whey
Wood flour

**AGRICULTURAL DUSTS**
Alfalfa
Apple
Beet root
Carrageen
Carrot
Cocoa bean dust
Cocoa powder
Coconut shell dust
Coffee dust
Corn meal
Cornstarch
Cotton
Cottonseed
Garlic powder
Gluten
Grass dust
Green coffee
Hops (malted)
Lemon peel dust
Lemon pulp
Linseed
Locust bean gum
Malt
Oat flour
Oat grain dust
Olive pellets
Onion powder
Parsley (dehydrated)
Peach
Peanut meal and skins
Peat
Potato
Potato flour
Potato starch
Raw yucca seed dust
Rice dust
Rice flour
Rice starch
Rye flour
Semolina
Soybean dust
Spice dust
Spice powder
Sugar (10x)
Sunflower
Sunflower seed dust
Tea
Tobacco blend
Tomato
Walnut dust
Wheat flour
Wheat grain dust
Wheat starch
Xanthangum

**CARBONACEOUS DUSTS**
Charcoal, activated
Charcoal, wood
Coal,bituminous
Coke, petroleum
Lampblack
Lignite
Peat, 22%H20
Soot, pine
Cellulose
Cellulose pulp
Cork
Corn

**Chemical Dusts**
Adipic acid
Anthraquinone
Ascorbic acid
Calcium acetate
Calcium stearate
Carboxy-methylcellulose
Dextrin
Lactose
Lead stearate
Methyl-cellulose
Paraformaldehyde
Sodium ascorbate
Sodium stearate
Sulfur

**METAL DUSTS**
Aluminum
Bronze
Iron carbonyl
Magnesium
Zinc

**PLASTIC DUSTS**
(poly) Acrylamide
(poly) Acrylonitrile
(poly) Ethylene (low-pressure process)
Epoxy resin
Melamine resin
Melamine, molded (phenol-cellulose)
Melamine, molded (wood flour and mineral filled phenol-formaldehyde)
(poly) Methylacrylate
(poly) Methylacrylate, emulsion polymer
Phenolic resin
(poly) Propylene Terpene-phenol resin
Urea-formaldehyde/ cellulose, molded
(poly) Vinyl acetate/ethylene copolymer
(poly) Vinyl alcohol
(poly) Vinyl butyral
(poly) Vinyl chloride/ ethylene/vinyl acetylene suspension copolymer
(poly) Vinyl chloride/vinyl

## SAFETY GUIDELINES

### DUST CONTROL MEASURES

The dust-containing systems (ducts and dust collectors) are designed in a manner (i.e., no leaking) that fugitive dusts are not allowed to accumulate in the work area.

The facility has a house keeping program with regular cleaning frequencies established for floors and horizontal surfaces, such as ducts, pipes, hoods, ledges, and beams, to minimize dust accumulations within operating areas of the facility. The working surfaces are designed in a manner to minimize dust accumulation and facilitate cleaning.

### IGNITION CONTROL MEASURES

Electrically-powered cleaning devices such as vacuum cleaners, and electrical equipment are approved for the hazard classification for Class II locations.

The facility has an ignition control program, such as grounding and bonding and other methods, for dissipating any electrostatic charge that could be generated while transporting the dust through the duct work.

The facility has a Hot Work permit program.

Areas where smoking is prohibited are posted with "No Smoking" signs.

Duct systems, dust collectors, and dust-producing machinery are bonded and grounded to minimize accumulation of static electrical charge. The facility selects and uses industrial trucks that are approved for the combustible dust locations.

### PREVENTION MEASURES

The facility has separator devices to remove foreign materials capable of igniting combustible dusts. MSDSs for the chemicals which could become combustible dust under normal operations are available to employees. Employees are trained on the explosion hazards of combustible dusts.

### PROTECTION MEASURES

The facility has an emergency action plan. Dust collectors are not located inside of buildings. (Some exceptions) Rooms, buildings, or other enclosures (dust collectors) have explosion relief venting distributed over the exterior wall of buildings and enclosures. Explosion venting is directed to a safe location away from employees. The facility has isolation devices to prevent deflagration propagation between pieces of equipment connected by duct work. The dust collector systems have spark detection and explosion/ deflagration suppression systems. Emergency exit routes are maintained properly.