PADDLE DRYER



Principle:

GEM Paddle Dryers are used for drying of wet cakes, pastes and thick slurries like sludge. The heating media like steam or hot oil flows through the hollow paddles as well as the jacket thus heating the paddles and the container walls. The wet material gets dried after coming in contact with the paddles and container walls. The design of the paddles is such that it is self-cleaning and does not allow the product to stick. The product moves from one end to the other end and during this travel the moisture is removed. Heating medium is usually steam or thermal fluid.

Construction:

Paddle Blades and Trough

Two hollow shafts with its special wedge shaped heating transferring blades are rotated to convey the wet product from the feed end to the discharge end. The paddles have high heat transferring efficiency and provide a self-cleaning function. The trough for these paddles are duly jacketed and heat is injected into the casing of the trough. The material for the Paddle Blades and the Trough can be Carbon Steel or the applicable grades of Stainless Steel as required.

Drive

The Paddle Blades are rotated with the help of a heavy duty gearbox and a suitable motor to ensure trouble free operation. The drive is of robust design, designed for high torque and low operating speed. Shafts, bearings and drive components are designed for long trouble free operations under adverse conditions.

Features of Paddle Dryer:

- a. Efficient drying of sludge and paste through direct contact.
- b. Capacities up to 5 tons per hour.
- c. Complete product discharge.
- d. Low running and maintenance cost
- e. Compact construction less floor area.
- f. Minimum exhaust air quantity no elaborate air cleaning equipment needed.
- g. Special paddle form ploughing and self-cleaning action.

1. Special Features:

Configuration Option	
Capacity	60 sq. ft. to 3000 sq. ft. Heat Transfer Area
Heating Medium	Steam or Thermal Fluid
Energy Source	Electric, Wood, Coil, LPG, LDO
Material options	MS, SS 304, SS 316
Power Supply	3 Phase, 50 Hz/60Hz , 415/380 Volt (as per area)

2. Applications:

- Waste sludge
- Wet cakes
- Wet powders
- Agro Waste
- Polypropylene Beads

- Municipal solid waste
- Pastes
- Crystalline Solids
- Magnesium Carbonate

GEMTECH PROJECTS LLP

10/C, MIDDLETON ROW, 3RD FLOOR, CALCUTTA-700071, INDIA PHONE: (91-33) 2217-7328 (4 LINES), Cell 91 98311 73874 E-MAIL: info@gemdryers.com / sg@gemforgings.com