## **cyclonaire**

# Cyclobin<sup>™</sup> Aerated Hopper

#### **Aerated Material Storage Vessel -**

The Cyclobin™ is a gravity-loaded storage vessel that utilizes the principals of materials fluidization to achieve high discharge rates from a horizontal configuration.

The Cyclobin has been sized specifically to be installed in a pit below a gravity hopper railcar, but it can be installed in a variety of applications where low-headroom storage of materials is required.

**Aeration Air Usage** - Typical consumption is approximately 450 SCFM compressed air at 5 to 15 psig.

#### **Standard Design**

200 ft³ capacity, carbon-steel construction with heavy duty water-tight coating, 12-ft center-to-center inlet distance, lifting lugs, center discharge, grooved-pipe supply-air and product discharge connections, inspection hatches, and a clean-out port.

#### **Standard Options**

- · Variety of available inlet assemblies
- · Custom sized outlets
- End discharge
- Custom capacities



### **Operation and Design Principle:**

Pressurized air supplied to the plenum below the permeable membrane fluidizes the bed of material supported on top of the membrane. The grid support structure for the membrane slopes at an optimum angle to a central discharge outlet to facilitate high rates of material discharge.

The pressurized air can be supplied by a dedicated blower, compressor, or via a diverted stream from the main conveying system blower.





