



ATTRITION SCRUBBERS

Eagle Iron Works' Attrition Scrubbers are designed for high-intensity grain on grain scrubbing. As a sand slurry enters the feed cell of the Attrition Scrubber, the turbine blade propellers force the material grains to constantly abrade each other while moving the material from cell to cell within the machine. Each rubber-lined shaft assembly consists of two turbine blade propellers set at opposite pitch as well as different degrees of pitch, which gives direction of movement to the feed material. A constant feed is necessary to the machine for most efficient attrition; the rate of discharge from the machine is directly dependent upon the feed to the machine.

For most efficient abrading action the feed slurry entering the machine should be maintained at 65 to 85% solids. A Fine Material Washer is recommended to follow the discharge of the Attrition Scrubber for de-sliming purposes.

The Eagle Attrition Scrubber is designed for a long service life and ease of maintenance. Parts that see the most wear and abrasion are made from the most wear resistant material available. Each fabricated steel tank is rubber lined. Clean out pipes are located on the bottom of the tank for easy discharge. Simplifying maintenance, the Eagle Iron Works Attrition Scrubbers entire drive assembly, cover, shaft and propellers may be removed from the tank as a single unit.

Available in the following models:

- 50-75 tph unit (expected residence time 5 min)
- 100-150 tph unit (expected residence time 5 min)

Note: units can process higher tonnages but the residence time would be reduced.

EIW can determine if an Attrition Scrubber will upgrade your minus 4 mesh or 5mm sands' soundness or benefit your material/minerals properties by running lab tests on representative samples. Testing may be subject to a charge.

DESIGN FEATURES

- Designed & built at Eagle Iron Works Facilities
- Heavy-duty design
- Five bladed propellers
- Direct drive reducer with oil bath lubrication
- All wear surfaces rubber lined
- Anti-friction roller bearings on speed reducer
- Replaceable wear parts available from the manufacturer

APPLICATIONS

- Removal of stains & coatings
- Upgrade sand equivalency & durability ratings
- Disintegration of lignite

Attrition Scrubbers							
Size	Propeller Diameter	Weight Empty	Weight Loaded	Propeller Shaft (RPM)	Horse Power	Capacity	Type Material
Standard (2 Cell)	36" (914 mm)	9,800 lbs (4445.2 kg)	36,500 lbs (16556.1 kg)	105	2 x 40 HP (60 kW)	50 to 75 STPH (45 to 67.5 MTPH)	Minus #4 Mesh Sand
High-Capacity (4 Cell)	36" (914 mm)	17,300 lbs (7847.1 kg)	66,900 lbs (30345.3 kg)	105	4 x 40 HP (119 kW)	100 to 150 STPH (90 to 135 MTPH)	

