BUBBLEJET® Venturi waste water aerator

Custom made, high performance jet pump aerator solutions

The BUBBLEJET[®] aerator is a highly effective product for aerating waste water and sludges in effluent treatment plants, pulp and paper, food, pharmaceuticals, chemical industries and agriculture.

The venturi jet pump based design evacuates atmospheric air from above using an aspirator and introduces it as fine bubbles in the ejector. Efficient mass transfer ensures within the diffuser between the fine bubbles and waste water due to high shear forces in the jet pump ensuring high amounts of oxygen transfer.

BUBBLEJET[®] can be additionally used for effective introduction of pure oxygen, ozone or process chemicals into wastewater tanks when required.

Applications

- 1. Activated sludge treatment
- 2. Homogenization tanks
- 3. Nitrification/Denitrification
- 4. Slurry tanks
- 5. Retention basins
- 6. Oxidation ditch
- 7. Sequential batch reactor



"No water splashing, no manifold constructions and flexibility of positioning in the tanks. The BUBBLEJET[®] aerator is the perfect solution for your waste water aeration needs. "



PURE PERFORMANCE

- 1. Upto 30% energy savings compared to fine pore diffusers and traditional mechanical aerators.
- 2. BUBBLEJET[®] aerator's oxygen transfer rate is far superior to other aerators in the persence of surfactants in waste water. This makes it perfectly suited for waste water sources from pulp and paper mills, pharmaceuticals and breweries.
- 3. Prevents settling of suspended solids at the base.
- 4. Consistent, uniform mixing achieved through jet pump tank mixing technology.
- 5. Aeration occurs below the surface level, this prevents release of volatile organic compounds into the atmosphere.

SIMPLICITY

- 1. No installation costs or downtime. The BUBBLEJET[®] aerator is simply lifted into the tank. It is ready to start operation!
- 2. The BUBBLEJET[®] Aerator is an oxygen introduction device and a tank mixer in a single package.
- 3. No piping or structural supports required.
- 4. No special baffles, long shafts or submerged bearings required.
- 5. No moving parts requiring frequent maintenance.
- 6. Ideal for tanks with fluctuating water levels as the aerator is placed on the tank floor.

World class, made in India

Primetech brings with it 25 years of experience in water treatment and eductor design to the BUBBLEJET[®] technology.We are a high-tech company with a proud tradition of craftsmanship ,over 70% of our revenue arrives from exports.With Primetech expect nothing less than the very best.

BUBBLEJET® waste water aerator

Technical specifications

MODEL NUMBER SERIES	SUBMERGENCE DEPTH (m)	SOTR* (Kg O₂ /h)	RATED MOTOR POWER (KW)	PUMP FLOWRATE (m ³ /hour)
BUBBLEJET [®] 2K	1-4	1- 1.5	2.2	40
BUBBLEJET [®] 3K	1-7	2-3.2	3.7	65
BUBBLEJET [®] 5K	1-7	3.4-4.2	5.5	100
BUBBLEJET [®] 9P	1-7	6- 12	9.0	200
BUBBLEJET [®] 15P	1-7	9- 15	15.0	250
BUBBLEJET [®] 20P	1-7	11-22	22.0	380
BUBBLEJET [®] 40V	1-7	18-40	37.0	650
BUBBLEJET [®] 60V	1-7	30– 58	55.0	800

*-Standard oxygen transfer rate measured at 25 C in clean water conditions.

Note:

Number of Ejectors: 1-4

Maximum allowable particle size in wastewater: 50 mm

Materials of construction:

Ejector housing: Cast iron/SS 304 and Polypropylene (for small sizes)

Aspiration pipe: SS304/Polypropylene/galvanized steel

Nozzle:SS304

Diffuser:SS304/Cast iron/polypropylene

Submersible pump: Cast iron

