



Rhizosph'air is a patented system by the French company EcoBIRD that belongs to the type of treatment wetlands treating raw wastewater. The system is composed of two identical beds fed in alternation and consisting of layers of gravel with different granulometry in unsaturated and saturated conditions. In addition, this system incorporates forced bed aeration by means of a blower to improve treatment and prevent clogging. Aeration strategy with sequencing allows almost full carbon, solids and TKN removal and below 20 mg/L outlet concentration in TN.

KEY POINTS:

- Treatment of screened raw wastewater
- Nature Based Solution (NbS)
- Single step system
- Low energy consumption
- Small carbon footprint
- Low COD, TSS and nitrogen effluent
- Resilience to temperature variations, hydraulic and organic loads
- Cross over between extensive and intensive technologies
- Suitable for communities from 200 to 5000 PE

MAIN FEATURES

- ✓ Raw wastewater feeding
- ✓ Removal of TN<20 mg/l, COD<60 mg/l,
- ✓ Footprint <1 m²/PE
- ✓ Energy consumption ~0,2-0,3 kWh/m³
- ✓ Adaptation to load changes by means of O2 sensor and aeration control.
- ✓ Mechanical elements (blowers, automatic valves).
- ✓ Aeration network
- ✓ Integrated sludge management