

S&N
AIROFLO



**The Source for Floating WWT Equipment
Brush Rotors - Mixers - Polishing RBCs**


CASE HISTORIES

AEROBIC DIGESTERS



ACTIVATED SLUDGE BASINS



 products have been utilized in all types of wastewater applications including Activated Sludge Basins, Oxidation Ditches, Aerobic Digesters, EQ Basins, as well as Lagoons.



OXIDATION DITCHES



COLD WEATHER APPLICATIONS

AEROBIC DIGESTERS



ACTIVATED SLUDGE BASINS



 products can be used in any aerated basin or lagoon that needs aeration, no matter the size or shape. These are not just *surface* units - Mixing Depth & Homogeneous Mixing are not issues.



OXIDATION DITCHES



COLD WEATHER APPLICATIONS

Case History of...

Franklin, NC



before




after

Power Savings!

Upgrade of 200 HP Orbal Oxidation System

Wayne Price, Plant Operator

- In early 2006, the city of Franklin purchased a single  2000 Series 15 HP Floating Brush Rotor with EZ Access platforms and Allen Bradley SMC Soft Starts.
- Over the next 18 months, the city purchased eight more units, for a total of 135 HP.
- In 2008, DO monitors were added to three of the units.
- According to **Wayne Price**, plant operator, it is fairly typical for the plant to leave one to three of the units un-operational because of the DO levels.
- **Wayne** also states that the plant is running better than ever, and he always seems to have plenty of DO.


Case History of...

Grenada, MS



Power \$avings!



- In 1992, the city of Grenada replaced a Trickleing Filter System with an Aerated Lagoon System using twelve  10 HP Floating Brush Rotors.
- Various upgrades have been made to the equipment on an “as needed” basis.
- Some of the original Wastewater Lubricated Bearings* are still in use.

* For more information on our Maintenance-Free Wastewater Lubricated Bearing Systems, please visit www.airoflo.com/images/bearing_system.jpeg


Case History of...

Fitzgerald, GA



Power \$avings!



- **Original system consisted of 50 HP Orbal system in a digester.**
- **This system was replaced with two  15 HP Floating Brush Rotors. (one unit in 2000, another unit in 2002)**
- **The results were *improved* Mixing and Oxygen Levels, with *less* Energy used.**


Case History of...

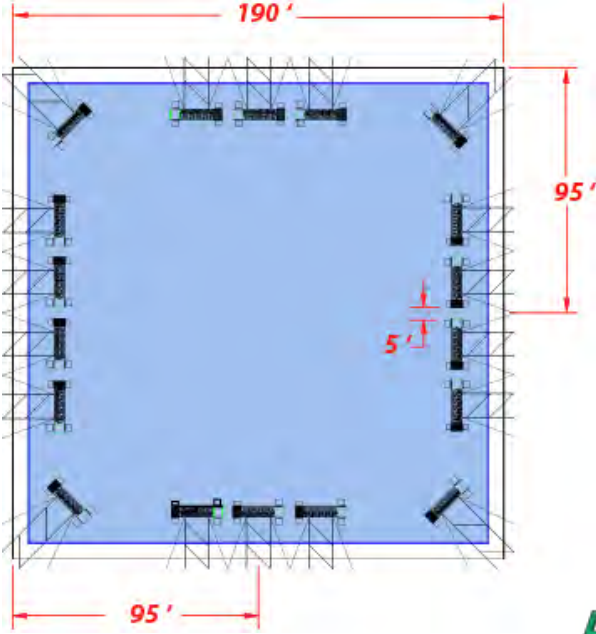
Aguascalientes, Mexico



Power \$avings!

Lynn Aiken, General Manager (ret.) INISA

- In 2004, INISA purchased eighteen  2000 Series 20 HP Floating Brush Rotors.
- Competition recommended 650 HP of vertical splashers
- Activated sludge application for the washing of blue jeans material
- DO was the determining parameter
- Lynn Aiken: *“the maintenance engineer tells me (the units) are in service and they are happy with the performance... You have a great product.”*
- Unique Situation: Existing basin, along with extremely high DO requirements dictated the very close placement of the 20HP units



Legend:  - 20 HP  Aerator (360 HP total)


Case History of...

Texas Department of Criminal Justice



Upgrade of Existing Oxidation Ditches

Howard Gray, Environmental Specialist IV, TDCJ

- Between 2004 and 2008, TDCJ has upgraded oxidation at five sites with  **Floating Brush Rotors, Bridges and EZ Access Systems**
- As of May, 2009, **Howard Gray, Environmental Specialist IV at TDCJ**, was in the process of purchasing 12 more units, with plans on “replacing all my fixed aerators within the next 5 to 7 years with S&N (products).”

Case History of...


White Oak, TX



Oxidation Ditch Upgrade – Eight 15 HP Units replacing Fixed Rotors

Power \$avings!

Tom Fulton, Water/Wastewater Manager

- Between October, 2005 and October, 2006, the City of White Oak spent approximately **\$30,000** in repairs to existing rotor equipment, and **\$40,000** in electrical costs.
- In March 2007, the City of White Oak purchased a eight  **2000 Series 15 HP Floating Brush Rotor with EZ Access platforms.**
- As a result, the electrical costs dropped to approximately **\$26,000** in 2008
- **Tom Fulton:** *“I truly believe the S&N Rotors have been the single best investment the City of White Oak has made since 2006. Our wastewater quality has never been better. We are now able to spend maintenance money on other equipment at the wastewater plant.”*

Case History of...
Eufaula, AL




before



after

Power Savings!

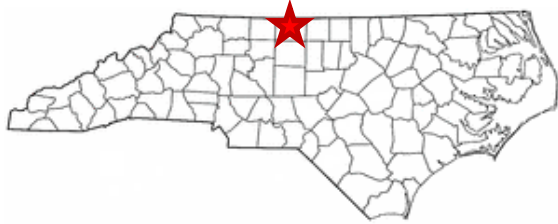
Activated Sludge Basin

- **March, 2005: Vertical Units in two Activated Sludge Basins replaced with  20 HP Floating Brush Rotors (NOTE: This basin is 12' deep)**
- **As a result, HP used was reduced from 330 to 240.**
- **Cycling units between October - April.**
- **Energy consumption reduced by 48%*.**

* For more energy saving information, click the "Save Energy" button on the home page of our website, www.airoflo.com.



Case History of...
Eden, NC




Power \$avings!

before


after

Aerobic Digester Upgrade

- **May, 2004: Vertical Splashers in Aerobic Digester replaced with four  20 HP Floating Brush Rotors (NOTE: This basin is 15' deep)**
- **The original design recommendation called for two more units. However, budget restraints held the purchase to only the four units, with a pledge to buy more. To date, there has not been a need for additional units.**

**OLD
UNITS**

**REPLACED
WITH**

Vertical Splashers	145 HP	D.O. 0.0 mg/l	1/3 Never Mixed	2 -3 Days Decant
 Rotors	80 HP	D.O. 1.0 mg/l	90 – 95% Mixed	20 -24 Hours Decant