



*world water works*

PURIFYING OUR FUTURE

[www/RESOURCE DAF](http://www.RESOURCE DAF)



*world water works.com - Works For You...*

World Water Works total systems approach:

- Identifying design options to achieve customer's stated goals
- Developing a detailed engineering design with customer interaction
- Manufacturing with emphasis on durability and design optimization
- Supporting customer with efficient installation, startup, and training
- Providing a system with long-term reliability and consistent performance

Let us serve as an adjunct to your process engineering team...

World Water Works works for you!

*www/Resource DAF*



Dissolved Air Flotation (DAF) technology is the process where suspended solids, oils & greases, and other insoluble impurities are separated from water slurries by a process of dissolving air into water. Micro-bubbles interact with the particles to cause them to float to the surface of a vessel where they are skimmed and separated.

World Water Works has developed a remarkable DAF – the *www/RESOURCE DAF*. Distinct, proprietary and patent pending features explore new techniques to maximize Stoke's Law, Brownian Motion, and Coagulation Principals. The result is significant performance and cost advantages at flow ranges from 5-9000 gpm.



*World water works.com - Works For You...*

Our policy is to understand the water process in your facility, carefully define the problem, need or opportunity and then develop a complete and reliable solution, based on your requirements, industry standards, and our innovations.

All concepts are thoroughly investigated through bench testing and pilot treatability studies to guarantee results.

Creative finance packages are available to provide cost effective solutions with immediate paybacks at lower risks.

*World Water Works really works for you.*

*"World water works really has their act together - clear drawings and a specified timeline, met with no overruns. Two day startup - great!"*

*Engineering Consultant*

- Food Processors
- Beef Packaging Plants
- Dairy Manufacturing
- Food Packaging
- Poultry Plants
- Slaughterhouses
- Vegetable Processors
- Industrial Laundries
- CAFOs
- Textile Plants
- Aircraft Mftg. Facilities
- Ceiling Tile Plants
- Oil Refineries
- Potable Water Plants
- Potato Processors
- Municipal POTWs
- Cheese Manufacturing
- Chemical Proc. Plants
- Pulp & Paper Mills
- Beverage Manufacturing

POLYPROPYLENE SYSTEMS



- Lightweight
- Non-Corrosive
- Guaranteed LONG-LIFE
- Chemical Treatment Flexibility
- Wide pH range - 2-13 •High Temperature>180°F •No size limitations



Performance is in the Details...

- Plate Separators
- Progressive
- Water Extraction
- Cross Flow
- Dissolved Air

*www/Diversified Installations*



"This system has made the Mill money from day one." Plant Engineer



"...We run a 24 hour process, but we (maintenance staff) are only here one shift. The system runs itself through the night..."  
General Manager



"In a beef plant lot's of grease ends up in the sewers. WWW designed a treatment which lowers the pH to crack the oils. Operational costs are low, and the poly. system assures a long lasting piece of equipment!"

Engineer Consultant



- Intermediate separation surfaces reduce the particles' travel distance
- Maximizing liquid/solids separation efficiency



- Extended retention time
- Better effluent quality



- Lower velocity
- Better separation



- 20-30  $\mu$  microbubble
- Maximum separation efficiency
- Reduces chemical demand

Min. Chemicals + Low Utility = **Low Operational \$**

Max. TSS Removal + High Sludge Content = **Max. Performance**

Min. Space + Low Onsite Assembly = **Low Installation \$**



"...World Water Works really stands behind their equipment. We made a major process change just after startup. The system was designed with flexibility to handle it, save some minor modifications which WWW handled."

Process Engineer

## www/Results

"My dairy was facing huge surcharges, increasing every month. We installed the WWW DAF and witnessed dramatic reduction in sewer surcharges. The project paid for itself in less than a year." Dairy, Owner



"The state DEP was on our backs for discharging 500 gpm of high strength water. After installing WWW's equipment, we discharge less than 100 gpm. We are now up for an environmental award versus shutting down."

Brown Paper Mill, Executive Vice-President

