HYDRO-CHEK AIR DIFFUSER

The HYDRO-CHEK air diffuser is the result of an extensive research and development program. It combines simplicity of design and operation with quality construction to provide efficient, economical, and trouble-free aeration throughout new and existing waste treatment systems.

The Patented “down-flow” design puts air flow orifices in the diffuser body, not in the air check diaphragm. It also preserves the diaphragm’s structural integrity for significantly extended diaphragm life and eliminates the problems caused by sediment that could otherwise settle in diaphragm orifices. This down-flow design also maximizes the shearing of the air bubbles as they emerge from the orifices and turn upward around the perimeter of the diffuser.

The HYDRO-CHEK air diffuser uses the positive action of the flexible air check diaphragm to prevent backflow. The diaphragm distends during aeration to allow air through the diffuser body orifices. When the airflow is stopped, the diaphragm instantly contracts and is force seated against the diffuser body by the water pressure in the tank. In this closed position, liquid backflow is prevented from entering and clogging the diffuser or air manifold.

The diffuser body is molded of Celcon, a strong, hard, non-corroding plastic that resists fouling by algae or other foreign matter. The air check diaphragm is molded in EPDM-based rubber, a flexible, resilient compound that resists both fatigue and chemical attack. The retainer ring assembly is molded in polypropylene plastic. It clicks the diaphragm securely in place during operation and provides for quick “no tools” diaphragm replacement if necessary.

Note: The HYDRO-CHEK air diffuser as manufactured by Diffused Gas Technologies, Inc. was formally marketed by PCI and is presently being offered by Pollution Control Systems, Inc.

5827 Happy Hollow Rd., Suite 1-B
Milford, Ohio 45150
Tel: (513) 831-1165 Fax: (513) 965-4812
Polconsys@aol.com