



O&M - BioAer[®] Aeration Floor System

The BioAer[®] Aeration Floor system is a passive component of a biofilter. There are no moving parts. Once installed, it remains covered by the biofilter media except for periodic replacement every several years. Consequently, operation and maintenance requirements are minimal after initial installation.

Storage: The BioAer[®] components are made of polyethylene and polypropylene materials along with UV inhibitors. As such the product may be exposed to sunlight for several weeks without loss of color or other physical degradation. The product is routinely shipped palletized and wrapped in a UV resistant plastic wrap. If the product remains exposed to sunlight after initial placement as the biofilter floor for more than six weeks, the floor may be protected with a UV barrier (i.e. tarp or plastic) to prevent deterioration and weather checking.

Handling: The BioAer[®] components are delivered to the jobsite on pallets. If stored outdoors, the pallets should be placed with six inches to one foot of free space on all sides of a pallet to allow air movement between the pallets. While very durable, the baseplates and trench covers should not be dropped in a free-fall to prevent incidental breakage of structural members. Operation of forklifts and other material handling equipment must be conducted with care as to not penetrate a pallet of baseplates or trench covers at any point other than the normal lifting locations. Breakage due to forklift damage is entirely the responsibility of the unloading/handling company.

Operating Temperatures: The BioAer[®] components are designed for utilization at temperatures within the range of -20F to 120F at loads in excess of wheel loads common for the range of front end loaders. Exposure to live loads at temperatures in excess of 120F should be verified with BacTee Systems. The load ratings (available at www.bactee.com) apply to the use of wheel loader operation on the floor using reasonable care in the operation of the equipment. Excessive 'torquing' of the floor by rapid stop/start or 'spinning' action should be avoided.

Maintenance: The BioAer[®] components are designed to minimize plugging of the surface perforations. When used as an aeration floor in a compost or biofilter installation, the static pressure head within the floor plenum will rise over time due to the degradation and consolidation of the bulk media on the floor. This is normal. During replacement of the bulk material, the floor should be inspected to determine if excessive plugging of the floor perforations is noted (i.e. over 50% open space plugged). If this is the case, the floor may be cleaned with a high-pressure washer. If excessive residual material remains in the plenum space of the floor after washing (determined by removing one or more baseplates), the entire floor can be removed to sweep or flush the residual material and subsequently replaced.