

OLC 12x40

Coconut Granular Activated Carbon

Applications



OLC 12x40 coconut activated carbon can be used in a variety of water, wastewater and process liquid applications for the removal of dissolved organic compounds. OLC 12x40 has been used in applications such as process water purification, wastewater treatment and industrial chemical purification.

Description

OLC 12x40 is a coconut activated carbon for the removal of dissolved organic contaminants from water, wastewater and process liquids. These contaminants include taste and odor compounds, organic color, total organic carbon (TOC) and industrial chemicals such as chlorinated solvents (TCE, PCE). The pore structure enables it to be used for adsorption of both high and low molecule weight impurities from waters and liquids. The carbon is especially effective for adsorbing trace organic compounds such as vinyl chloride, methylene chloride, MTBE and THM's/disinfection by-products. OLC 12 x 40 is certified to NSF/ANSI 61 standard and complies with the requirements for activated carbon as defined by the Food Chemicals Codex (FCC) (8th Edition) published by the U.S. Pharmacopeia.

Features / Benefits

- Coconut carbon
- Low ash
- A strongly adsorbing pore structure optimal for the treatment of chlorine and other organics
- High hardness relative to other raw materials
- Hardness and abrasion resistance required for thermal reactivation and minimizing generation of fines in operations requiring backwashing
- Pore structure provides a wide range of contaminant removal capabilities

Specifications	OLC 12x40
lodine Number, mg/g	1050 min
Ash, wt%	4.0 max
Moisture (As packaged), wt%	5 max
Density (Apparent), g/cc	0.48 min
Hardness Number	95 min
12 US Mesh [1.70 mm], wt%	5 max
< 40 US Mesh [0.425 mm] (PAN), wt%	4 max

Safety Message

Wet activated carbon can deplete oxygen from air in enclosed spaces. If use in an enclosed space is required, procedures for work in an oxygen deficient environment should be followed.

Typical Pressure Drop (OLC 12x40)

Based on a backwashed and segregated bed



Typical Bed Expansion During Backwash



Design Considerations

OLC 12x40 coconut activated carbon is typically applied in down-flow packed-bed operations using both pressure and gravity systems. Design considerations for a carbon system is based on the user's operating conditions, the treatment objectives desired, and chemical nature of the compounds being adsorbed. In general, downflow superficial velocity can be from 1 gpm/ft² to 10 gpm/ft², depending on the application and contact times can vary from 7.5 minutes to hours. Design may vary based on the type of liquid, contaminants to remove, and desired treatment objectives.

Safety Message