BioPlug®

What is the BioPlug?

BioPlug is a timed release microbial product designed to release bacteria into municipal settings to attack and digest FOG (fats, oils, and grease) and other organic matter. Bacteria infused into the system rapidly increase the bioremediation process, which converts the FOG to carbon dioxide and water. BioPlug is offered in two unique products: BioPlug L and BioPlug CS. Both require no maintenance other than replacing every 30 days.

BioPlugs contain no free enzymes, FOG emulsifiers, or caustic/corrosive chemicals. They are safe for sewer lines, lift stations, plumbing lines, septic systems, & municipal wastewater treatment systems.

Benefits of BioStim

Reduces or Eliminates:

- Corrosion
- **Foul Odors**
- Hydrogen sulfide
- **Excessive pumping**
- Blockage & backups
- Sanitary sewer overflows
- Maintenance hydro-jetting

BioStim Formulas

Bioremediation is the process of utilizing natural organisms, bacteria, to convert unwanted waste into harmless substances. Research has shown that some bacteria consume at a higher rate than others. BioStim has isolated these specific naturally occurring bacteria strains for use in the BioPlug. BioPlug's organic holding mediums maintain the bacteria in peak condition to immediately begin digesting waste upon application. Bacteria is released at a rate proportionate to water flow. The multi-strain formula ensures they maintain their effectiveness in a wide variety of waste environments. This consortium of bacteria digest FOG under both aerobic and anaerobic conditions and includes both Gram positive and Gram negative bacteria.



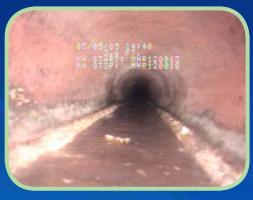
Field Test Results

BioPlug CS: Sewer Buildup Study

Note: both upstream (untreated) & downstream (treated) line sections were hydro-jetted prior to study commencement. Then, both lines were monitored for new buildup.

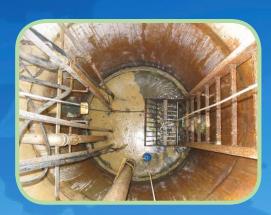


3.75 Months Untreated (Upstream)



3.75 Months Treated with BioPlug CS (Downstream)

BioPlug L: Lift Station Before & After Study



Before



60 Days After

Bacteria or Enzymes?

Many products on the market today boast similar control of FOG, though there are important scientific differences in their chemistry and mode of action. Most of these products contain high concentrations of enzymes and very little if any bacteria. Products containing enzymes liquefy grease and simply move the liquefied grease down the line to resolidify later. As the liquified grease moves down the line it dilutes the bacteria keeping it from doing its job. A 100% bacterial formula does a far more efficient job.