Waste Water Treatment
Bulk Biomass Conveying Systems TCB

The TCB Bulk Biomass Conveying System is a complete and versatile screw conveyor system which extracts the bulk fraction of the biomass from the mixer/hopper, lifting and charging it into the anaerobic digester of the biogas production plant.

The system consists of:
- BFS Horizontal Screw Feeder
- BVS Vertical Screw Conveyor
- BIS Injector Screw

Description

Function

The BFS Screw Feeder receives the material from the mixer/hopper and transfers it to the BVS Vertical Screw Conveyor. The BFS Screw Feeder is a discharging equipment provided with optional inlet spouts which are pre-engineered to suit the most commonly used mixers on the market. The BVS Vertical Screw Conveyor receives the material from the BFS Screw Feeder through a tangential or frontal discharge port. The BVS Vertical Screw Conveyor lifts the biomass to an appropriate height where it feeds it into the BIS Injector Screw. The BIS Injector Screw collects the bulk material from the BVS Vertical Screw Conveyor and injects it into the digester below the liquid level.

Application

The TCB Bulk Biomass Conveying System is a complete and versatile screw conveyor system which extracts the bulk fraction of the biomass from the mixer/hopper, lifting and charging it into the anaerobic digester of the biogas production plant.

Benefits

- Clean and silent;
- Versatile and suitable for conveying various organic materials;
- Sturdy fabrication and mechanical components;
- Small footprint;
- Standard industrial product.
Technical Features / Performance

- Modular and versatile
- Facilitates inspection
- Vertical Screw Conveyor with load-bearing structure
- Extra-thick heavy-duty helicoid flighting manufactured from highly resistant steel
- Standard connection for mixers/hoppers
- Highly efficient conveying

<table>
<thead>
<tr>
<th>BFS</th>
<th>A min</th>
<th>A max</th>
<th>B min</th>
<th>B max</th>
<th>C tangential</th>
<th>C frontal</th>
<th>F min</th>
<th>F max</th>
<th>L min</th>
<th>L max</th>
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D = 800 (standard feet)
L = flange-to-flange length of the BFS (use the order code)

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<th>BVS</th>
<th>Hs min</th>
<th>Hs max</th>
<th>M min</th>
<th>M max</th>
<th>N min</th>
<th>N max</th>
<th>F min</th>
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H = flange-to-flange height of the BVS (use the order code)

<table>
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<tr>
<th>BS</th>
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<th>S min</th>
<th>S max</th>
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S = BIS length (use the order code)

BFS flange-to-flange length calculation
L = B + C with tangential feed connection (standard)
L = B + P with feed connection (optional)

BVS flange-to-flange height calculation
H = Hs - D + F + N with Hs = G + R + M

This datasheet does not show the complete range but only the models most suitable for the application.