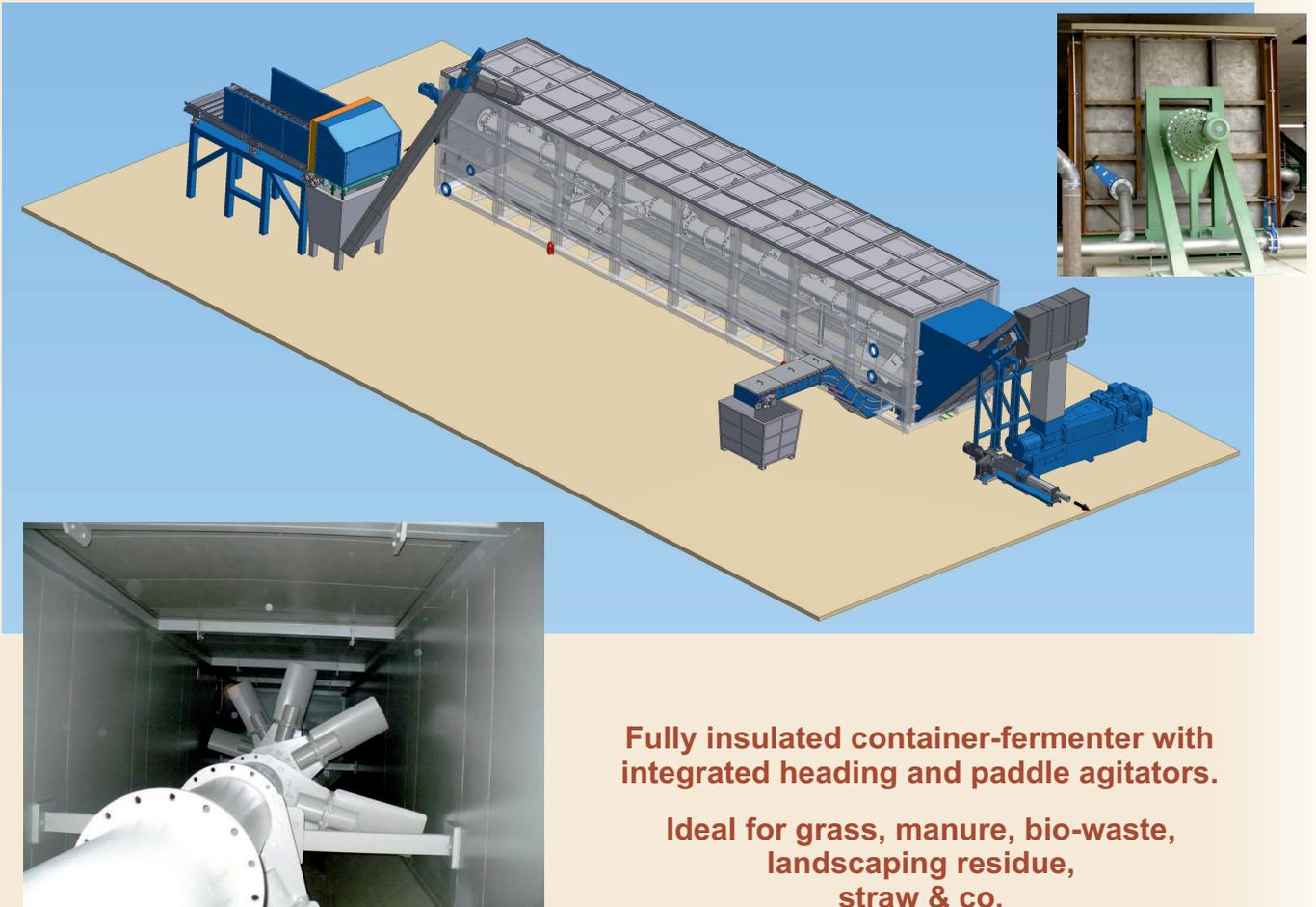


Plug Flow as
- fermenter - hydrolysis container - storage tank



Fully insulated container-fermenter with integrated heating and paddle agitators.

Ideal for grass, manure, bio-waste, landscaping residue, straw & co.

The standardized plug flow is available in following sizes 100 m³, 160 m³ and 200 m³ and can be used as:

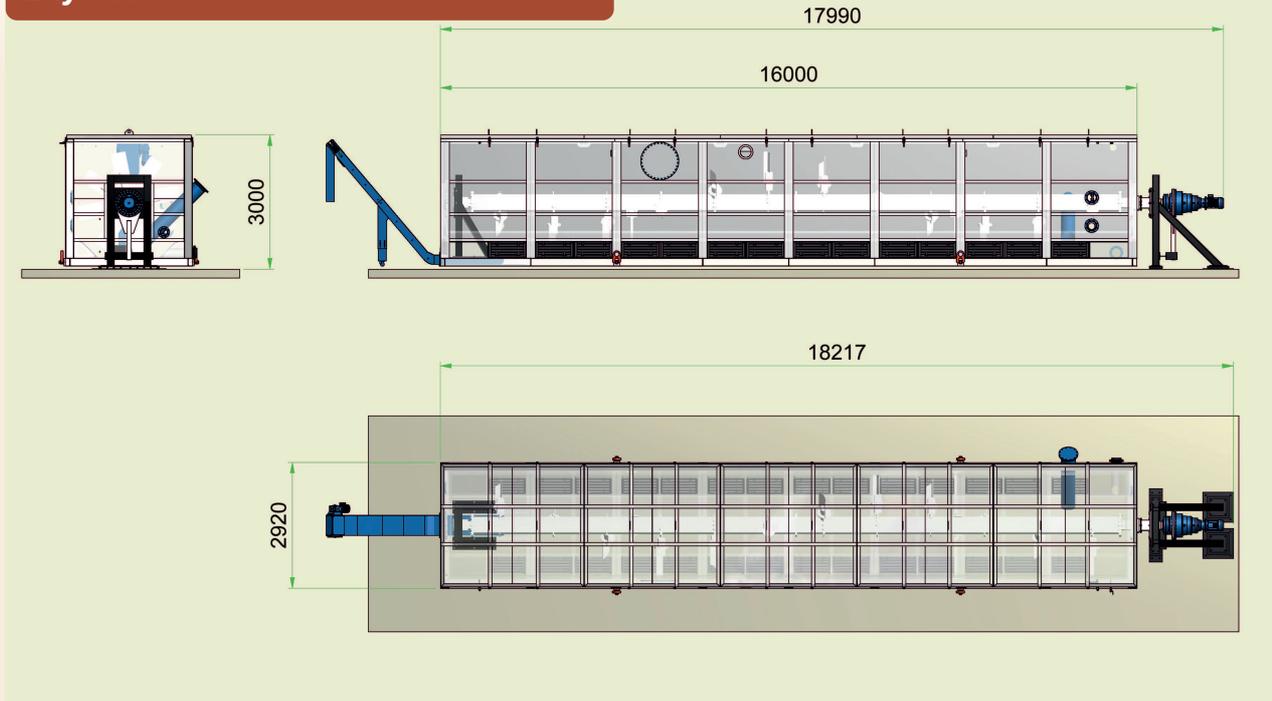
Storage tank for biogas plants 150-750 kW_{electr.} :
- for substrate mixing
- gas density closed-construction (no odor emissions)
- separation and discharge of extraneous material

Hydrolysis for biogas plants 150 kW_{electr.} -1,0 MW_{electr.} :
- adjustable temperatures from 25° to 70°C
- accumulation and incorporation of water
- dissolution of surface area
- impurity separation

Pre-fermenter for biogas plants 20-120 kW_{electr.} :
-with downstream agitator vessel / circular tank

Main-fermenter for small biogas plants 20-120 kW_{electr.} :
-large gas outlet area
-ideal, slow mixing
-in series, parallel or individual applicable

Layout:



Description:

Efficient plug flow without short-circuiting.

The metal tank system (optionally made of concrete) is good isolated, suitable for temperatures of 25° - 80°C and requires a short setting-up time due to precast elements.

The substrate heating is achieved either with a pipe-in-pipe heat exchange or internal with an integrated heat exchange system on the lower bottom of the container.

The substrate is pre-shredded or disintegrated with a Bioextruder and then feed by an adjusted conveyor system like pump, screw or belt.

Depending on the case of operation, the material is discharged with different dry matter content (fluid, pasty or solid).

Located inside the container is a self-floating, conveying and mixing long-shaft mixer. The mixer is driven by a low-speed motor (low energy demand and low wearing).

The plug-flow system can be set-up outside or inside of a building.

Technical Data: 100 m³ plug-flow

Container:

- gas tight removable cover
- length/width/height: 16.0x2.9x3.0 m
- gross volume: 236 m³
- net volume: 100 m³

Agitator:

- horizontal agitator shaft
- agitator drive: 7.5 kW

Sediment discharge:

- chain conveyor

Make use of our 5 year experience. Visit our demonstration/pilot biogas plant!

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