

BIOPRESS DBP 205 Screw Extruder



Doppstadt

WE CARE

BIOPRESS DBP 205



Mobile Screw Extruder BIOPRESS DBP 205

FLEXIBLE APPLICATION

THE IDEAL SCREW EXTRUDER FOR ORGANIC WASTES

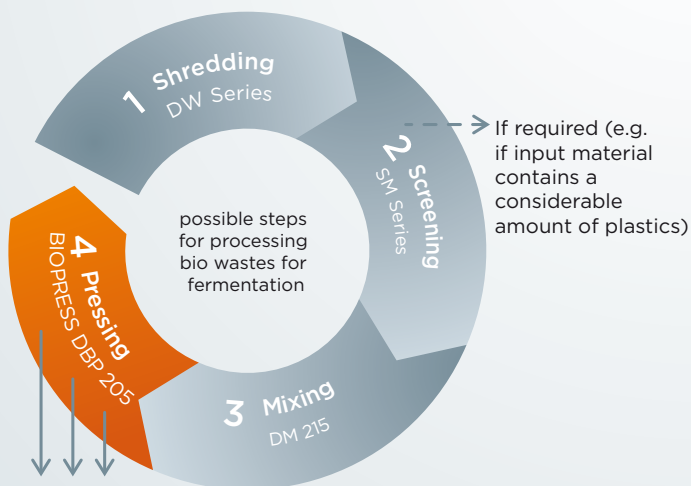
The BIOPRESS DBP 205 screw extruder separates the liquid and the solid fractions of bio-degradable wastes. The screw is driven by a hydromotor with planetary gear. The rotating cone presses the material with a pre-set pressure through the screening baskets, which are available with different mesh sizes.

The liquid fractions can be used for biogas produc-

tion and the solid fractions for thermal utilization or for composting. A 500 mm (1' 8") screw diameter and 17 - 26 rpm (adjustable) ensure a high throughput. Input materials, e.g. mixed biowaste can be pressed through the screening baskets with different mesh sizes and are then discharged.

Applications: food and supermarket wastes, biomass, rejects from the paper industry ...

COMPOSTING AND PROCESSING OF REFUSED DERIVED FUEL AND FERMENTATION



Final Product 1 (solid fraction): thermal utilization, composting
 Final Product 2 (fluid fraction): biogas

MAIN ADVANTAGES

- maximum throughput and optimal dehydration of the materials to be pressed thanks to variable mesh sizes of the screening tunnel
- easy to change screening baskets with different perforations to meet various demands
- easy to change wear elements on the extruder
- constant discharge of solid fraction thanks to peripheral pressing gap
- hydraulically adjustable cone with pressure-dependent control
- high wear resistance
- up to 70% dehydration for organic wastes
- driven by low-maintenance hydro-motor
- load-sensing speed control for hydraulic drive (optimal torque)

Organic wastes containing liquids

Solid fraction - e.g. for thermal utilization

Liquid fraction for fermentation





MIXING HOPPER

In the mixing hopper the material to be pressed is homogenized by two worm shafts running in the opposite direction.

SCREEN BASKET

The screen basket is available in different perforations. This guarantees optimal dehydration of various materials at maximum throughput.

PRESSING CONE / HYDRO MOTOR

The screw is driven by a hydromotor with planetary gear. Load-sensing speed control for hydraulic drive (optimal torque).



REAR CONVEYOR

The material is discharged by the foldable rear conveyor.



MATERIAL TRANSFER

Transfer from the mixing hopper to the pressing screw.

OUTLET for liquid phase

PRESSING SCREW

Running on anti-friction bearings the screw spiral presses the materials constantly through the screening mesh. This guarantees an optimal dehydration of the materials to be pressed.

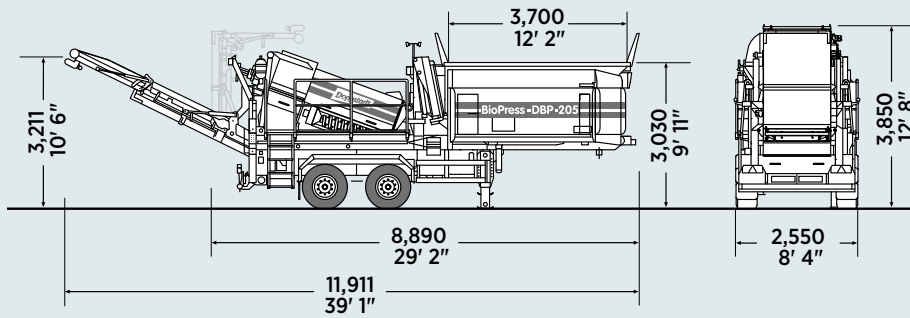
MATERIAL DISCHARGE

Discharge of the solid matters at the hydraulically controlled pressing cone. Low rate of failures than to the circumferential opening.



TECHNICAL DATA BIOPRESS DBP 205

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Transport dimensions L/W/H: 8,890 / 2,550 / 3,850 mm (29' 2" / 8' 4" / 12' 8")

Modell	BIOPRESS DBP 205
Permissible weight	24,000 kg (52,911 lb)
Chassis	2-axle semitrailer chassis for 80 km/h (50 mph)
Motor type	Mercedes-Benz OM904 LA
Power	90 kW (122 hp) an 1,600 rpm
Exhaust level	EUROMOT III A
Fuel tank	300 l (79 gal)
Measurements L/W/H	10,750 / 2,550 / 4,000 mm (39' 4" / 8' 4" / 13' 1")
Screw Extruder	
Motor type	hydromotor with planetary gear
Screw	mixing screw with replaceable wear segments
Screw diameter	500 mm (1' 8")
Press cone	hydraulically adjustable gap, pressure-dependent control
Screen basket	10 mm round holes
Measurements L/W/H	4,470 / 1,400 / 1,520 mm (14' 8" / 4' 7" / 5')
Rear conveyor L/W	4,200 / 1,200 mm (13' 9" / 3' 11")
Mixing hopper, Volume	5 m ³ (176.6 ft ³)
Mixing shafts	2 pcs., diameter: 480 mm (1' 7") for mixing and conveying

As of June 2012 - subject to technical alterations. The specifications are approximate. Illustrations and descriptions may include options that are not part of the standard equipment.

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