Parameters of WWTPs BC 4 - 30

BC BioCleaner	No. of connected persons (PE)	Amount of WW (m³/day)	BOD₅ load (g/day)	Diameter (mm)	Height (mm)	Weight (kg)
BC 4	4	0.60	240	1 400	2 050	155
BC 6	6	0.90	360	1 600	2 050	170
BC 10	10	1.50	600	1 700	2 350	180
BC 12	12	1.80	720	1 900	2 500	200
BC 16	16	2.40	960	2 100	2 500	310
BC 20	20	3.00	1 200	2 400	2 500	370
BC 25	25	3.75	1 500	2 400	3 000	470
BC 30	30	4.50	1 800	2 600	3 200	540

Accessories

Accessories can be ordered in addition to the treatment plants as an option from our dealers.



Extensions for the Treatment Plants

Extension for the plant must be ordered additionally if the plant height needs to be adapted for its optimum location by the outlet pipe depth (sewage from the house).

The extension can be used in all of the ENVI-PUR WWTP



The wooden technical house contains all the basic as well as optional WWTP equipment.



Excessive phosphorus that is non-degradable biologically any longer is precipitated chemically by dosing the aluminum or iron salts in a form of commercially available solutions.

Phosphorus precipitation is convenient for all ENVI-PUR WWTP models



An oximeter is used to control the blower operation by the actual demand of oxygen in the nitrification zone that enables further reduction in the blower operation costs against control by time intervals.

It can be used for the BC COMFORT, EXCLUSIVE and EXCLUSIVE UV model.



UV Disinfection

The lamp providing disinfection of the treated waste water in terms of microbiology can be supplied to WWTP.

UV lamp kills bacteria and viruses in water by UV radiation. It is activated together with the plant and it is convenient for the BC EXCLUSIVE model.



WWTPs can be delivered complete with the tread-on and locking laminated cover in several versions. Bearing load capacity of the ceiling is 250 kg/m2.



Waste Water Treatment Plants

DOMESTIC WASTE WATER TREATMENT PLANTS

BC biocleaner biological WWTPs are designed to treat waste waters from the smallest individual sources of contamination – family houses, huts and cottages, smaller-sized guest houses and facilities. They fully replace the plastic and concrete traps or septic tanks.

The BC biocleaner domestic WWTPs are certified and they meet all of the requirements for modern living. They are intended to treat the waste water from bathrooms, welfare facilities, kitchens, automatic laundry machines and dishwashers. The treated water meets the specified limits for the contents of nitrogen, phosphorus and undissolved substances, and the water can be drained into the underground and surface waters.

You will definitely choose such an optimum treatment plant from our portfolio which meets your requirements.

Advantages of ENVI-PUR WWTPs

- Long service life.
- High treatment efficiency.
- Simple and low-cost operation.
- Customer support and service in your country.
- (A) Technical house
- (B) BC biocleaner treatment plant
- (C) WWTP extension

















EFFICIENCY









Why is ENVI-PUR BC biocleaner the right choice

- Treatment plants are made of high quality plastics with extra long service life.

- Treatment plants operate independently and reliably and their operation is very simple.

 Owing to the smart technology you can be in control of everything through a remote administration.

- Rapid return on the initial investment.

- It gives clean water back to the nature.



- One box concept
 "Plug & Play" system
 available for all models
- Usage adaptability
 Possibility to adjust mode for using households for a whole year, seasons or weekends to reduce operational costs even more
- GSM alarm
- Time proven quality
 More than 25,000 units sold
- All models are upgradeable with a tertiary filter, UV lamp and oxygen probe



Waste water flows by gravity into the denitrification zone through the basket for coarse impurities separation. This basket works as a trap, for example, for wet wipes, sanitary products, and other impurities which do not belong to WWTP. The basket must be checked and, if full, it must be emptied into the prepared plastic vessel to be disposed of to the municipal waste. Basket aeration results in decomposition of the biodegradable substances.

Denitrification is the inflow part of WWTP where nitrogen and organic contamination are removed biologically – by microorganisms of activated sludge – without the presence of oxygen.

(2) Nitrification zone

Waste water flows off through a hole in the partition wall from the denitrification zone into the nitrification zone where high oxygen concentration is maintained by the air supplied through the fine-bubble aerators. Organic contamination is removed biologically and the ammonia nitrogen is oxidized by the activated sludge here.

3 Secondary settling zone

The mixture of treated water and activated sludge flows off from the nitrification zone to the secondary settling tank where sludge sedimentation and treated water separation take place. Sludge is drained by the air lift pump back to the denitrification zone.

Waste Water

Treatment Plants

4) Outlet trough

The treated water flows into the outlet trough. The WWTP drain can be equipped with an extra mechanical filter and UV lamp. Ultraviolet radiation will ensure sanitization of the treated water.



Cost effective solution:

- Model with an analogue clock.

WWTP version variants:

- Plastic for 4 to 6 persons (self-supporting/non-self-supporting).
- Concrete for 4 to 6 persons.



Comfort solution:

- COMFORT PLUS control unit.
- Advanced control with a remote administration option.
- Automatic skimming of the floating impurities.

WWTP version variants:

- Plastic for 4 to 30 persons (self-supporting).
- Concrete for 4 to 20 persons.



Optimum solution:

- Model with the OPTIMA control unit.

WWTP version variants:

- Plastic for 4 to 25 persons (self-supporting).
- Concrete for 4 to 20 persons.



Exclusive solution:

- COMFORT PLUS control unit.
- Tertiary filter and optional internal UV disinfection.
- Phosphorus precipitation equipment.
- Advanced control with a remote administration option.

WWTP version variants:

- Plastic for 4 to 30 persons (self-supporting).
- Concrete for 4 to 20 persons.





















