



## **SEPTIC TANKS**

### **Round septic tanks**

**Standard version**

**ECO version**

### **Rectangular septic tanks**

**Standard version**

**ECO version**

### **Reinforced vertical septic tanks**

### **Reinforced horizontal septic tanks**

### **Grease traps for private use**



**According EN 12566-1**



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The published rates are exclusive of VAT, and ex works.



## WHY A SEPTIC TANK ?

Some municipalities demand the installation of a septic tank with new construction or a thorough reconstruction. Ask your municipal if this is the case.

But why is a septic tank important ? And how do you manage that ?

In many places there is sewage present or planned. In streets where sewage is installed, the residents are required to connect. The sewage run off their waste water to the nearest WWTP. That purifies the water and discharges it afterwards in a nearby watercourse.

Septic tanks let the solids in the wastewater to settle or dissolve. This prevents siltation in the sewers and limits the risks of water pollution and odour nuisance.

## ADVANTAGES:

Easy to install because of its light weight

Tanks are easy to clean because nothing sticks on PE. So entering the tank is not necessary.

Guaranteed watertight

Now possibility that roots grow through the tank.

The tank is corrosion resistant.

The standard septic tank of 5.000 liter is equipped with a lifting cord.

The reinforced horizontal septic tanks equipped with 2 lifting eyes.

Equipped with a plastic cover that must be replaced by a steel ore plastic cover that meets the legislation.

The reinforced vertical and horizontal septic tanks have a welded riser.

The reinforced horizontal septic tanks are the only ones with a CE label according to EN12566-1 on the market.

## CHARACTERISTICS

There are 2 types of septic tanks, i.e. the classic septic tank or fecal tank, the tank for all domestic wastewater and the septic tank with integrated filter.

- The classic fecal tank only receives wastewater from the toilet (the so-called black water).
- The tank for all domestic wastewater receives all wastewater from the house, i.e. the black (toilet) water as well as the grey water.
- The tank with integrated filter is in fact a tank for all domestic wastewater but it has an extra filter at the outlet to stop floating substances. It is mostly used in combination with a biological filter.

Quite often only a classic fecal tank (black water) is installed, although a tank for all domestic wastewater would certainly be preferred. The ideal type is the tank for all domestic wastewater. The wastewater received by this tank is much more homogeneous allowing the tank to function much better. In this case, the volume of the tank should be larger (see table below).

In the following table you will find tank capacity as well as the corresponding number of users for Flanders and the Walloon provinces.

BE CAREFUL: different capacity is required for Flanders and the Walloon Provinces. In Flanders you must allow for 300 litres per P.E. for a fecal tank and 600 litres per P.E. for a tank for all domestic wastewater and for a tank with integrated filter. For the Walloon provinces this is 300 litres per P.E. for a fecal tank up to 10 P.E., and from 10 I.E. 225 litres per P.E. For a tank for all domestic wastewater this would be 600 en 450 litres.

The volumes 2400, 3300 and 6000 litres carry the CE label under EN12566-1. Please note that according to this standard, the minimum volume of a septic tank is 2000 litres.

Volume	Flanders		Walloon Provinces	
	Fecal	All domestic wastewater	Fecal	All domestic wastewater
1.000 L	3	-	3	-
1.100 L	3	-	3	-
1.500 L	5	-	5	-
1.600 L	5	-	5	-
2.000 L	6	-	7	3
2.400 L CE	7	-	8	4
3.000 L	10	5	10	5
3.300 L CE	10	5	10	5
6.000 L CE	20	10	23	12

If there is no fixed number of permanent inhabitants (P.E.) please contact our technical service to calculate the correct number of P.E. This may be the case e.g. for schools, offices, hotels, campgrounds...

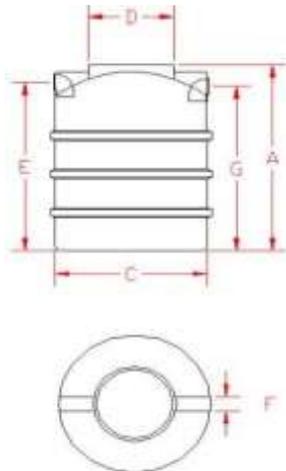
## HOW DOES A SEPTIC TANK WORK

A septic tank essentially **liquefies** the solids in sewage water. In this tank the solid biological wastes are either liquefied or converted into small particles. Some waste is dissolved into the liquid and the biological waste is consumed by **anaerobic bacteria** living in the tank. These anaerobic bacteria (living without oxygen) feed on the waste and convert it into gasses, small suspended solids and sludge. The gasses dissipate through the ventilation shafts. The remaining solid particles (sludge) sink to the bottom of the tank (that is why a septic tank has to be pumped out from time to time). The smaller suspended particles are washed out to the sewer or to the water treatment system. The lighter particles float to the surface and form a **"scum" layer**. This scum layer cuts off the underlying liquid from the air, so less smell is formed and the bacteria can do their job more effectively. A septic tank must be **large enough** to allow the raw sewage sufficient time to dissolve and be digested by the bacteria. This takes at least 5 days of retention time. A septic tank must be constructed with a baffle so the outflow begins well below the liquid surface. That way, if there is more inflow than normal, the incoming liquids cannot flow directly out of the tank without having allowed the bacteria to do their job. A similarly baffled inflow prevents the scum layer, that seals out the air, from being destroyed. To ensure effective performance, no rainwater should be allowed to enter the septic tank.

## Round septic tanks

Standard version and ECO version – 1.000, 1.500, 2.000, 3.000 and 5.000 liter.

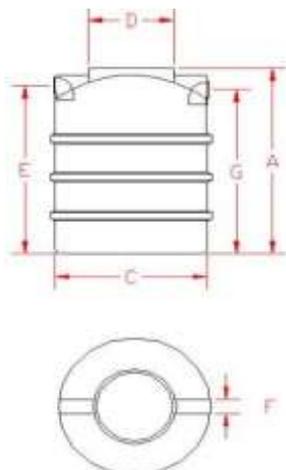
### SP1000



Installation in 15 cm consolidated sand	
Color	Black
Volume	1.000 liter
Length	1.015 mm
Width	1.015 mm
Height	1.260 mm
Height in	1.065 mm
Height out	1.085 mm
Diameter in/out	110 mm
Diameter manhole	500 mm
Weight	36 kg
Price – A01	

Dimensions are in mm and informative. Subject to alterations.

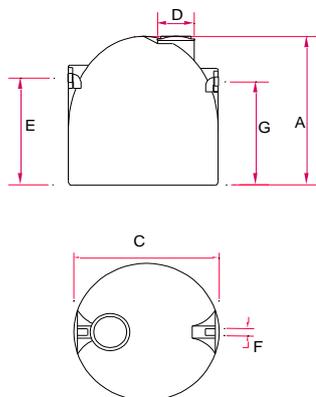
### SP1000 ECO



Installation in 30 cm consolidated sand	
Color	Green
Volume	1.000 liter
Length	1.015 mm
Width	1.015 mm
Height	1.260 mm
Height in	1.065 mm
Height out	1.085 mm
Diameter in/out	110 mm
Diameter manhole	500 mm
Weight	30 kg
Price – A01	

Dimensions are in mm and informative. Subject to alterations.

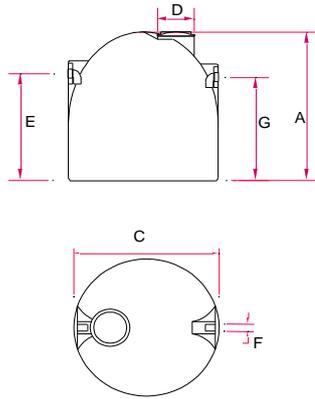
### SP1500



Installation in 15 cm consolidated sand	
Color	Black
Volume	1.500 liter
Length	1.260 mm
Width	1.260 mm
Height	1.570 mm
Height in	1.305 mm
Height out	1.265 mm
Diameter in/out	110 mm
Diameter manhole	500 mm
Weight	50 kg
Price – A01	

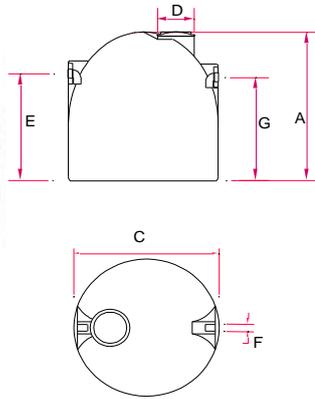
Dimensions are in mm and informative. Subject to alterations.

## SP1500 ECO



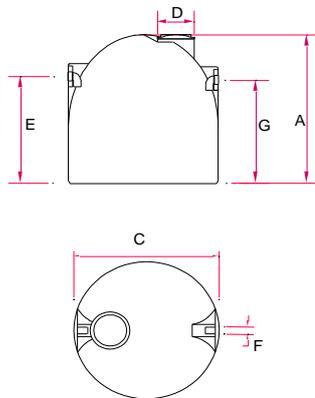
Installation in 30 cm consolidated sand	
Color	Green
Volume	1.500 liter
Length	1.260 mm
Width	1.260 mm
Height	1.570 mm
Height in	1.305 mm
Height out	1.265 mm
Diameter in/out	110 mm
Diameter manhole	500 mm
Weight	50 kg
Price – A01	
<small>Dimensions are in mm and informative. Subject to alterations.</small>	

## SP2000



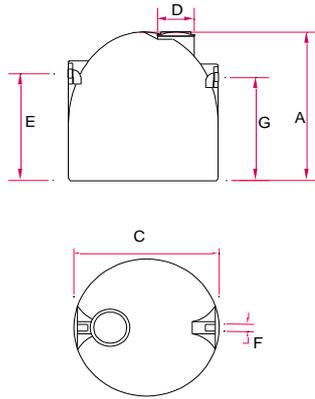
Installation in 15 cm consolidated sand	
Color	Black
Volume	2.000 liter
Length	1.700 mm
Width	1.700 mm
Height	1.510 mm
Height in	1.305 mm
Height out	1.225 mm
Diameter in/out	110 mm
Diameter manhole	500 mm
Weight	80 kg
Price – A01	
<small>Dimensions are in mm and informative. Subject to alterations.</small>	

## SP2000 ECO



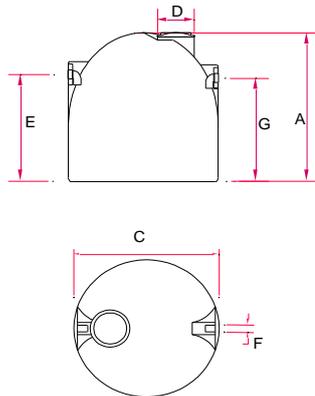
Installation in 30 cm consolidated sand	
Color	Green
Volume	2.000 liter
Length	1.700 mm
Width	1.700 mm
Height	1.510 mm
Height in	1.305 mm
Height out	1.225 mm
Diameter in/out	110 mm
Diameter manhole	500 mm (F)
Weight	65 kg
Price – A01	
<small>Dimensions are in mm and informative. Subject to alterations.</small>	

## SP3000



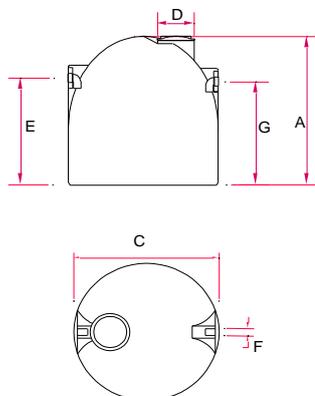
Installation in 15 cm consolidated sand	
Color	Black
Volume	3.000 liter
Length	1.700 mm
Width	1.700 mm
Height	1.940 mm
Height in	1.745 mm
Height out	1.645 mm
Diameter in/out	110 mm
Diameter manhole	500 mm
Weight	130 kg
Price – A01	
<small>Dimensions are in mm and informative. Subject to alterations.</small>	

## SP3000 ECO



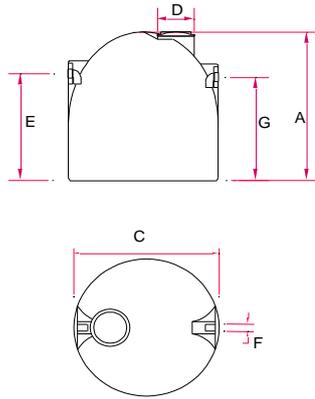
Installation in 30 cm consolidated sand	
Color	Green
Volume	3.000 liter
Length	1.700 mm
Width	1.700 mm
Height	1.940 mm
Height in	1.745 mm
Height out	1.645 mm
Diameter in/out	110 mm
Diameter manhole	500 mm
Weight	90 kg
Price – A01	
<small>Dimensions are in mm and informative. Subject to alterations.</small>	

## SP5000



Installation in 15 cm consolidated sand	
Color	Black
Volume	5.000 liter
Length	2.100 mm
Width	2.100 mm
Height	1.970 mm
Height in	1.562 mm
Height out	1.522 mm
Diameter in/out	125 mm
Diameter manhole	500 mm
Weight	200 kg
Price – A01	
<small>Dimensions are in mm and informative. Subject to alterations.</small>	

## SP5000 ECO



Installation in 30 cm consolidated sand	
Color	Green
Volume	5.000 liter
Length	2.100 mm
Width	2.100 mm
Height	1.970 mm
Height in	1.562 mm
Height out	1.522 mm
Diameter in/out	125 mm
Diameter manhole	500 mm
Weight	180 kg
Price – A01	
<small>Dimensions are in mm and informative. Subject to alterations.</small>	

## Options



Regelbaar verhoog: VHSP600/420

Color	Black
Height	420 mm
Diameter	570 mm
Weight	8 kg
Price - A05	
<small>Dimensions are in mm and informative. Subject to alterations.</small>	

## Replacement parts

Part	Price – A05
PE cover 500 mm	

## Rectangular septic tanks

Standard version and ECO version – 1.000, 1.500, 2.000 and 3.000 liter.

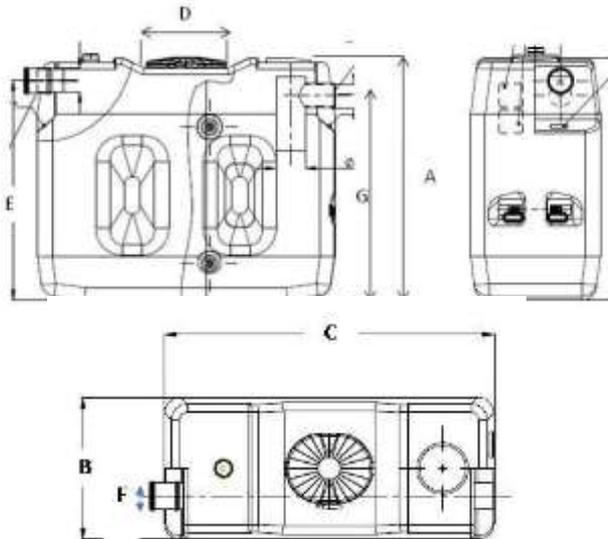
### SP1000 RH



Installation in 15 cm consolidated sand	
Color	Black
Volume	1.000 liter
Length	1.180 mm
Width	740 mm
Height	1.350 mm
Height in	1.230 mm
Height out	1.190 mm
Diameter in/out	110 mm
Diameter manhole	500 mm
Weight	55 kg
Price – A01	

Dimensions are in mm and informative. Subject to alterations.

### SP1000 RH ECO



Installation in 30 cm consolidated sand	
Color	Black
Volume	1.000 liter
Length	1.235 mm
Width	720 mm
Height	1.250 mm
Height in	1.150 mm
Height out	1.110 mm
Diameter in/out	110 mm
Diameter manhole	500 mm
Weight	56 kg
Price – A01	

Dimensions are in mm and informative. Subject to alterations.

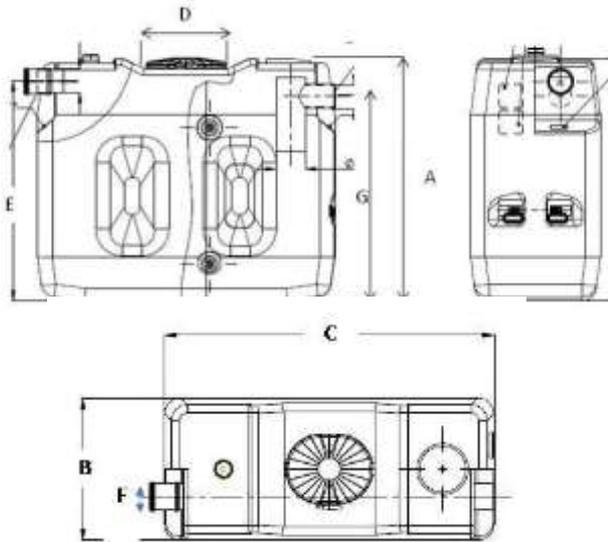
### SP1500 RH



Installation in 15 cm consolidated sand	
Color	Black
Volume	1.500 liter
Length	1.810 mm
Width	740 mm
Height	1.350 mm
Height in	1.230 mm
Height out	1.190 mm
Diameter in/out	110 mm
Diameter manhole	500 mm
Weight	100 kg
Price – A01	

Dimensions are in mm and informative. Subject to alterations.

## SP1500 RH ECO



Installation in 30 cm consolidated sand	
Color	Black
Volume	1.500 liter
Length	1.880 mm
Width	720 mm
Height	1.480 mm
Height in	1.320 mm
Height out	1.280 mm
Diameter in/out	110 mm
Diameter manhole	500 mm
Weight	75 kg
Price – A01	

Dimensions are in mm and informative. Subject to alterations.

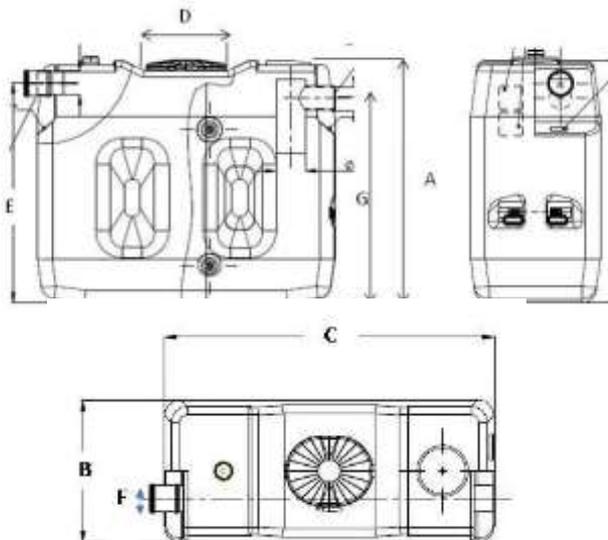
## SP2000 RH



Installation in 15 cm consolidated sand	
Color	Black
Volume	2.000 liter
Length	2.450 mm
Width	740 mm
Height	1.350 mm
Height in	1.230 mm
Height out	1.190 mm
Diameter in/out	110 mm
Diameter manhole	500 mm
Weight	120 kg
Price – A01	

Dimensions are in mm and informative. Subject to alterations.

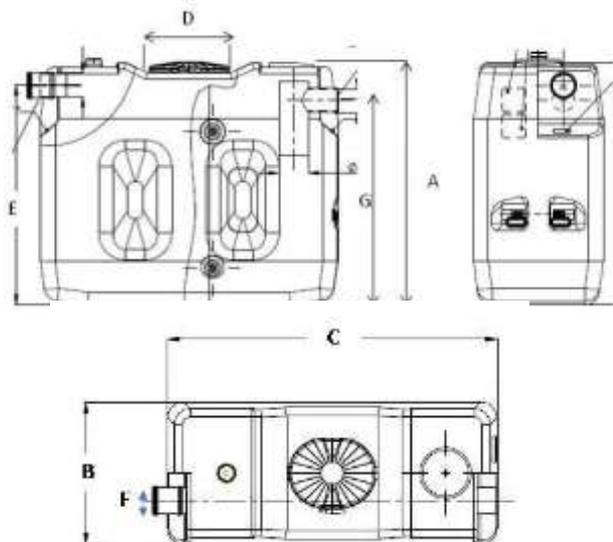
## SP2000 RH ECO



Installation in 30 cm consolidated sand	
Color	Black
Volume	2.000 liter
Length	2.020 mm
Width	880 mm
Height	1.650 mm
Height in	1.500 mm
Height out	1.450 mm
Diameter in/out	110 mm
Diameter manhole	500 mm
Weight	90 kg
Price – A01	

Dimensions are in mm and informative. Subject to alterations.

## SP3000 RH ECO



Installation in 30 cm consolidated sand	
Color	Black
Volume	3.000 liter
Length	2.630 mm
Width	880 mm
Height	1.700 mm
Height in	1.500 mm
Height out	1.450 mm
Diameter in/out	110 mm
Diameter manhole	500 mm
Weight	120 kg
Price – A01	
<small>Dimensions are in mm and informative. Subject to alterations.</small>	

## Options for standard models



Adjustable riser: VHSP500/600

Color	Black
Height	600 mm
Diameter	500 mm
Weight	7 kg
Price - A05	
<small>Dimensions are in mm and informative. Subject to alterations.</small>	

## Options for ECO models



Adjustable riser: VHECO

Color	Black
Height	600 mm
Diameter	600 mm
Weight	15 kg
Price - A05	
<small>Dimensions are in mm and informative. Subject to alterations.</small>	

Telescopic riser: VHRBECO

Color	Black
Height	600/950 mm
Diameter	600 mm
Weight	17 kg
Price - A05	
<small>Dimensions are in mm and informative. Subject to alterations.</small>	

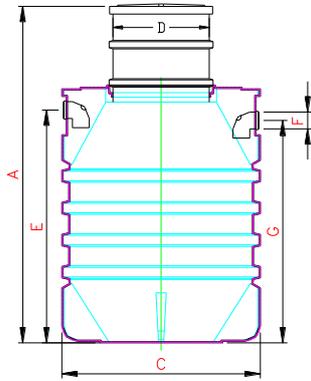
## Replacement parts

Part	Price – A05
PE cover 600 mm for the standard version	

## Reinforced vertical septic tanks

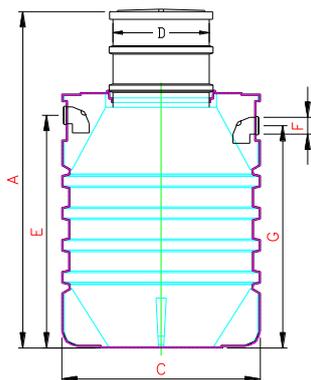
Reinforced version – 1.100 and 1.600 liter.

### SP1100



Installation in sand	
Color	Black
Volume	1.100 liter
Length	1.180 mm
Width	1.180 mm
Height	1.910 mm
Height in	1.250 mm
Height out	1.200 mm
Diameter in/out	110 mm
Diameter manhole	600 mm
Weight	70 kg
Price – A01	
<small>Dimensions are in mm and informative. Subject to alterations.</small>	

### SP1600

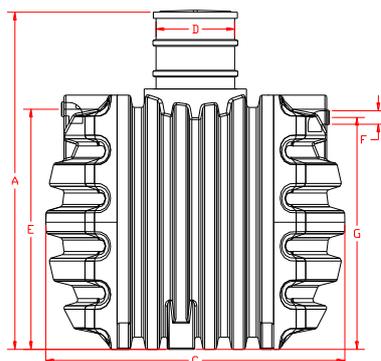


Installation in sand	
Color	Black
Volume	1.600 liter
Length	1.290 mm
Width	1.290 mm
Height	2.200 mm
Height in	1.500 mm
Height out	1.450 mm
Diameter in/out	110 mm
Diameter manhole	600 mm
Weight	80 kg
Price – A01	
<small>Dimensions are in mm and informative. Subject to alterations.</small>	

## Reinforced horizontal septic tanks

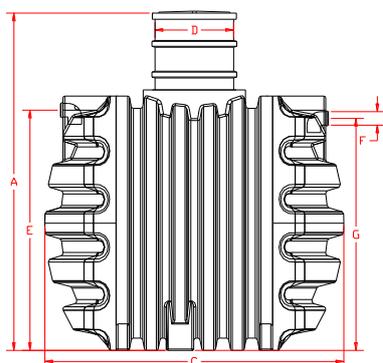
Reinforced version – 2.400, 3.300 and 6.000 liter.

### SP2400



Installation in sand	
Color	Black
Volume	2.400 liter
Length	2.350 mm
Width	1.350 mm
Height	1.900 mm
Height in	1.220 mm
Height out	1.180 mm
Diameter in/out	110 mm
Diameter manhole	600 mm
Weight	120 kg
Price – A01	
<small>Dimensions are in mm and informative. Subject to alterations.</small>	

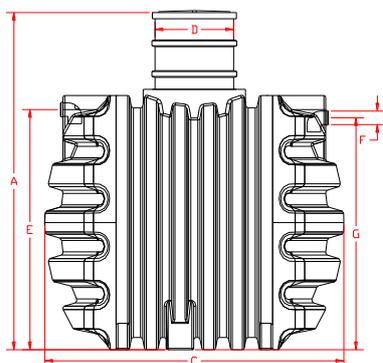
## SP3300



Installation in sand	
Color	Black
Volume	3.300 liter
Length	2.390 mm
Width	1.610 mm
Height	2.200 mm
Height in	1.450 mm
Height out	1.400 mm
Diameter in/out	110 mm
Diameter manhole	600 mm
Weight	190 kg
Price – A01	

Dimensions are in mm and informative. Subject to alterations.

## SP6000



Installation in sand	
Color	Black
Volume	6.000 liter
Length	2.400 mm
Width	2.070 mm
Height	2.500 mm
Height in	1.850 mm
Height out	1.800 mm
Diameter in/out	125 mm
Diameter manhole	600 mm
Weight	290 kg
Price – A01	

Dimensions are in mm and informative. Subject to alterations.

## Options



### Adjustable riser: VHSC600/1200

Color	Black
Height	1.200 mm
Diameter	600 mm
Weight	22 kg
Price - A05	

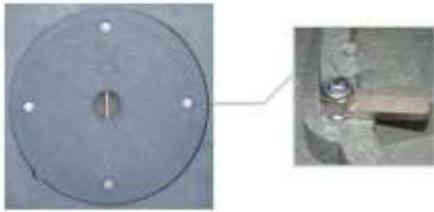
Dimensions are in mm and informative. Subject to alterations.

### Telescopic riser: VHRB600/120-480

Color	Black
Height	120-480 mm
Diameter	600 mm
Weight	5,5 kg
Price - A05	

Dimensions are in mm and informative. Subject to alterations.

**Plastic pedestrian cover Boralit: KDB A. Only for the reinforced tanks**



Color	Gray
Length	700 mm
Width	700 mm
Height	145 mm
Diameter opening	590 mm
Weight	20 kg
Price - A05	
<small>Dimensions are in mm and informative. Subject to alterations.</small>	

**Plastic watertight cover: B125 Hermelock. Only for the reinforced tanks**

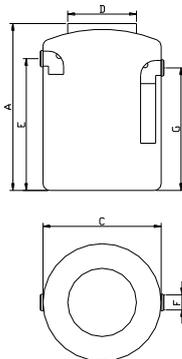


Color	Black
Length	714 mm
Width	714 mm
Height	257 mm
Diameter opening	625 mm
Weight	27,1 kg
Price – A05	
<small>Dimensions are in mm and informative. Subject to alterations.</small>	

**Grease traps for private use**

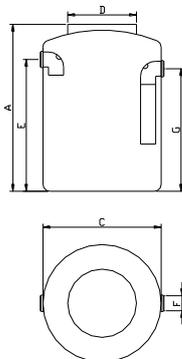
Standard version and ECO version – 300 and 500 liter.

**BAG300**



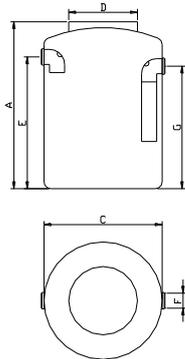
Installation in 15 cm consolidated sand	
Color	Black
Volume	300 liter
Length	900 mm
Width	900 mm
Height	930 mm
Height in	580 mm
Height out	550 mm
Diameter in/out	110 mm
Diameter manhole	500 mm
Weight	23 kg
Price – A01	
<small>Dimensions are in mm and informative. Subject to alterations.</small>	

**BAG300 ECO**



Installation in 30 cm consolidated sand	
Color	Green
Volume	300 liter
Length	900 mm
Width	900 mm
Height	930 mm
Height in	580 mm
Height out	550 mm
Diameter in/out	110 mm
Diameter manhole	500 mm
Weight	20 kg
Price – A01	
<small>Dimensions are in mm and informative. Subject to alterations.</small>	

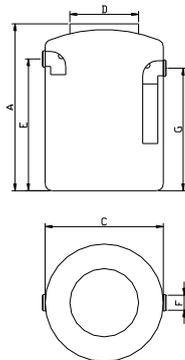
## BAG500



Installation in 15 cm consolidated sand	
Color	Black
Volume	500 liter
Length	900 mm
Width	900 mm
Height	1.260 mm
Height in	905 mm
Height out	875 mm
Diameter in/out	110 mm
Diameter manhole	500 mm
Weight	35 kg
Price – A01	

Dimensions are in mm and informative. Subject to alterations.

## BAG500 ECO



Installation in 30 cm consolidated sand	
Color	Green
Volume	500 liter
Length	900 mm
Width	900 mm
Height	1.260 mm
Height in	905 mm
Height out	875 mm
Diameter in/out	110 mm
Diameter manhole	500 mm
Weight	25 kg
Price – A01	

Dimensions are in mm and informative. Subject to alterations.

## Options



Adjustable riser: VHSP600/420

Color	Black
Height	420 mm
Diameter	570 mm
Weight	8 kg
Price - A05	

Dimensions are in mm and informative. Subject to alterations.

## Replacement parts

Part	Price – A05
PE cover 500 mm	

## INSTALLATION PROCEDURES, MAINTENANCE AND WARRANTY

The client acknowledges to have received a copy of this and agrees.  
The installation requirements should be read FIRST BEFORE placement.

In the event of loss by the customer of the installation requirements the customer must always ask for a new copy of the installation requirements at Boralit nv, or download them from the Boralit Web site.

## INSTALLATION PROCEDURES IN CONSOLIDATED SAND

They apply to the round, rectangular septic tanks and the grease traps.

Always install the facility as closely as possible to the contamination source to prevent the feeder pipe from clogging and causing blockages (excepted for rainwater tanks). Prepare a pit that is at least:

- 15 to 20 cm broader than the tank (for series ECO: 30 cm)
- 15 to 20 cm deeper than the distance between the height of the inlet and the bottom of the tank. (for series ECO: 30 cm)

See to it that all groundwater or rainwater that might be present in the pit is pumped out before pouring consolidated sand into the pit. The bottom of the pit must be covered by at least 15 cm of consolidated sand of 150 Kg/m<sup>3</sup> (for series ECO: 30 cm) (\*). Level (with a builder's level) the grease trap in the pit so the inlet is at the proper height to connect to the house drainpipe. Fill the grease trap with water and connect both the inlet and outlet. Provide with correct and sufficiently large ventilation according to the type of unit and always with a minimum of 50 mm. Backfill the pit round the unit with at least 15 cm of consolidated sand of 150 Kg/m<sup>3</sup> (\*). Always introduce small amounts of consolidated sand, slightly press the sand to prevent distortion of the unit. Put at least 10 cm of consolidated sand of 150 Kg/m<sup>3</sup>(for series ECO: 30 cm) (\*) on top of the grease trap. Install the PE-risers, which can be obtained from Boralit, on the unit until ground level is reached, and put the cover on (the grease traps must remain easily accessible for inspection and cleaning). In case vehicles might drive in the immediate surroundings of the installation, a sufficiently strong concrete slab must be installed. The concrete slab should not rest on the tank and should divert the pressure to the ground that has not been disturbed.

(\*) Please contact us in case of a temporary high groundwater level, and also if the tank becomes more deeply embedded in the ground than is permitted by the PE-riser.

## INSTALLATION PROCEDURES IN REGULAR SAND

They apply to the reinforced vertical and horizontal septic tanks.

Follow above instructions and If there is no groundwater, the consolidated sand can be replaced by regular sand. Please contact us if the tank becomes more deeply embedded in the ground than is permitted by the PE-riser.

The PE covers are only temporarily. They do not have a safety lock and can not stand the weight of persons or vehicles who might pass by. Make sure you get Boralit covers, to increase the security of persons or vehicles who cross the installation.





## MAINTENANCE

According to VLAREM II, article 4.2.7.3.1., point 1, page 73 individual preliminary treatment facilities must, in the case of a septic tank, be cleaned every year to ensure their good operation and to avoid public health hazards or endanger hygiene and safety. Never leave tank in ground empty; after it has been emptied, it must immediately be refilled with water.

## WARRANTY

We offer a 10-year warranty on all our tank products as far as evident manufacturing faults are concerned. Failure to comply with installation procedures and guidelines voids warranty. 2-year warranty on all parts.

The general sales and warranty conditions of Boralit count.

## OTHER DOCUMENTS

These documents are also available:

- Calculation of the number of persons (PE) for no private application.
- Range septic tanks.
- CE certificate for reinforced horizontal septic tanks.
- BENOR certificate for reinforced horizontal septic tanks.
- DOP's for reinforced horizontal septic tanks.