

Floodable sewage disposal unit with plastic- or steel tank.

Sanimaster PE, VA

Application

HOMA Sanimaster compact sewage disposal units are suitable for pumping sewage and waste water from areas below the sewer level according to DIN EN 12056. Due to the large tank volume and the powerful pump type, the PE and VA series are particularly intended for the disposal of large private, commercial or public buildings such as residential complexes, office buildings, department stores, hospitals, authorities, schools, etc. The compact design allows a packed installation with minimum space requirement. The horizontal installation of the pumps ensures a deflection-free passage of the conveyed material without unnecessary pipe bends. With flanged gate valves fitted between the tank and the pumps, the twin pump unit operates even with one pump disassembled for maintenance or repair. The tanks are available in different materials with volumes from 180 up to 1000 liters.

DIN EN 12050-1: Design tested and monitored.

Pumped medium: Clean water and waste water with solid and fibrous content and feces.

Max. temperature of pumped medium: 35° C, for brief periods up to 60° C.

Operating mode: Intermittent operation.

Design

Flood protected single or twin pump lifting station consisting of:

Collection tank: Odour and gas-tight tank made of various materials.

Plastic tank:

Total volume 400 l, tandem installation with two tanks up to 800 l. Inlets: DN 150 horizontal (3x), DN 100 vertical. Air vent DN 70.

Connection for diaphragm pump DN 50. Cleaning cover with screw cap. Connections for pneumatic level control and float switch.



Stainless steel tank: Total volume 180 l up to 1000 l (larger volumes on request). Inlet: DN 150 horizontal. Air vent DN 70. Connection for diaphragm pump BSP 1 1/2" F. Cleaning cover with screw cap. Connections for pneumatic level control and float switch.

Pumps: Single stage sewage pumps. Horizontal installation, discharge vertical.

Impellers: Enclosed single-vane impeller (M) or vortex impeller (V).

Motors: Fully submersible, pressure tight electric motors 400-415V/3Ph, Thermal sensor for temperature monitoring in the winding. Insulation class H, Protection rating IP 68.

Strongly dimensioned chrome steel shaft, lifetime-lubricated roller bearings.

Seal: Combination of two mechanical seals (silicon-carbide) in a separate oil chamber. Oil control possible from the outside. On request available with electronic seal monitoring to control the oil barrier chamber.

Materials

Collection tank	see tank types
Motor housing, pump housing, impeller	Cast iron EN-GJL-250
Motor shaft, screws	Stainless steel
Elastomers	NBR

Scope of supply

Tank with 1 pump or 2 pumps. Elastic hose connections with bands for tank inlet, connection tank-pump, air vent and diaphragm pump. 1 Elastic union piece DN 100 per pump for discharge connection (with flange DN 80 or DN 100 depending on the pump type). Pneumatic level control. Electronic control panel.

Pump types - Technical data

Curve No.	Pump type	Motor input P ₂ (kW)	Rotational speed (Rpm)	Nominal current (A)	Weight (kg)
Discharge DN 80 / Free passage 70 mm					
②	TP 70 M 16/4 D	1,3	1450	3,4	40
③	TP 70 M 26/4 D	1,9	1450	5,5	66
④	TP 70 M 31/4 D	2,6	1450	6,0	66
⑤	TP 70 V 36/2 D	2,9	2900	6,3	56
Discharge DN 100 / Free passage 80 mm					
⑥	MXS 2336-D44	2,6	1450	6,2	82
⑦	MXS 2338-D44	2,6	1450	6,2	82
⑧	MXS 2340-T44	3,7	1450	8,1	122
⑨	MXS 2342-T44	3,7	1450	8,1	122
⑩	MXS 2344-T54	5,0	1450	9,9	132
⑪	MXS 2346-T64	6,5	1450	13,1	135
⑫	MXS 2328-T72	9,5	2900	18,8	120
⑬	MXS 2330-T82	11,5	2900	22,2	123
⑭	MXS 2332-P92	14,4	2900	27,0	178
⑮	MXS 2334-P102	19,6	2900	36,9	178

Voltage 400V/3Ph 50Hz

Direct start up to 4 kW, above 4 kW star-delta

Tank types

Type	Material	Total volume ¹⁾	Operating volume ¹⁾
PE 40	Polyethylen	400 l	220 l
PE 80	Polyethylen	800 l ²⁾	440 l
VA 18	Stainless steel 1.4301 ³⁾	180 l	80 l
VA 30	Stainless steel 1.4301 ³⁾	300 l	135 l
VA 50	Stainless steel 1.4301 ³⁾	500 l	225 l
VA 100	Stainless steel 1.4301 ³⁾	1000 l	600 l

1) Special design with larger total volume on request.

2) Two tanks in tandem installation

3) Standard version, tanks in stainless steel 1.4571 on request

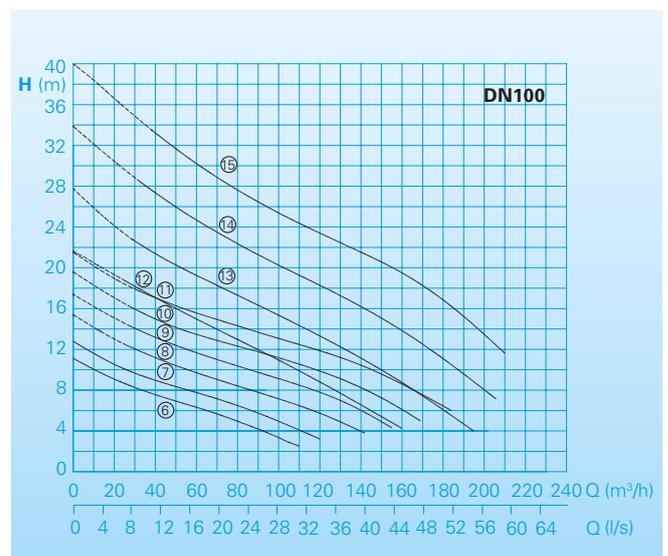
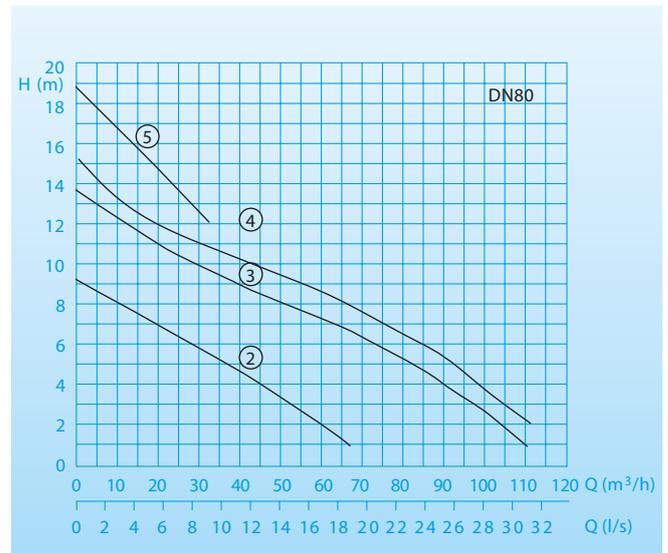
Combinations of tanks and pumps

Pump type	available in combination with tank types:					
	PE 40	PE 80	VA 18	VA 30	VA 50	VA 100
TP 70 M 16/4 D	S+T	-	S+T	S+T	S+T	-
TP 70 M 26/4 D	S+T	-	S+T	S+T	S+T	-
TP 70 M 31/4 D	S+T	-	S+T	S+T	S+T	-
TP 70 V 36/2 D	S+T	-	S+T	S+T	S+T	-
MXS 2336-D44	S+T	T	-	S+T	S+T	T
MXS 2338-D44	S+T	T	-	S+T	S+T	T
MXS 2340-T44	S+T	T	-	S+T	S+T	T
MXS 2342-T44	S+T	T	-	S+T	S+T	T
MXS 2344-T54	S+T	T	-	S+T	S+T	T
MXS 2346-T64	S+T	T	-	S+T	S+T	T
MXS 2328-T72	S+T	T	-	-	S+T	T
MXS 2330-T82	S+T	T	-	-	S+T	T
MXS 2332-P92	S+T	T	-	-	S+T	T
MXS 2334-P102	S+T	T	-	-	S+T	T

S+T: Available as single pump station (S) with 1 pump or as twin pump station (T) with 2 pumps

T: Available only as twin pump station (T) with two pumps

Conveying capacities



Type identification chart

Series **Sanimaster** **PE 40 T** **TP70M26/4D** **Ex**

Tank material

PE = Polyethylene
VA = Stainless steel

Tank volume (liter/10)

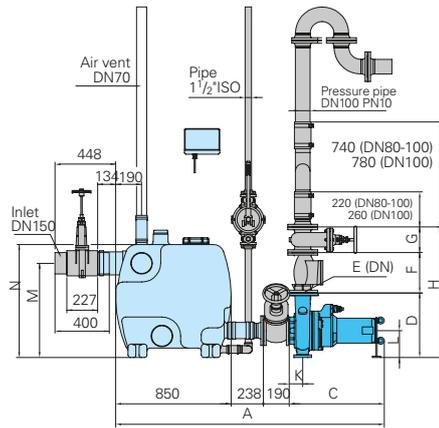
No. of pumps

S = 1 Pump (Single pump station)
T = 2 Pumps (Twin pump station)

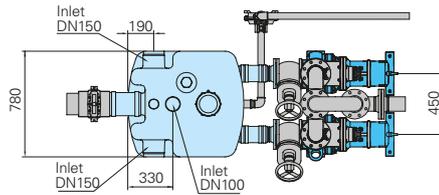
Type designation of sewage pump

With explosion proof motors (on request)

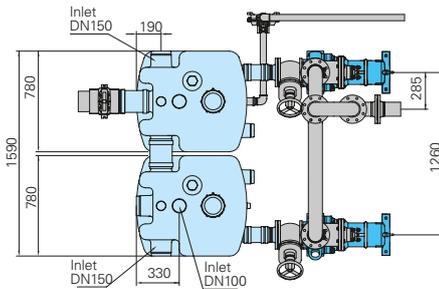
Tank types PE 40 / PE 80



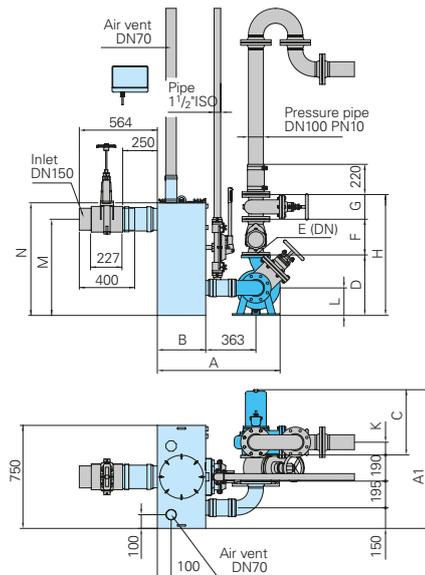
PE 40 S/T



PE 80 T



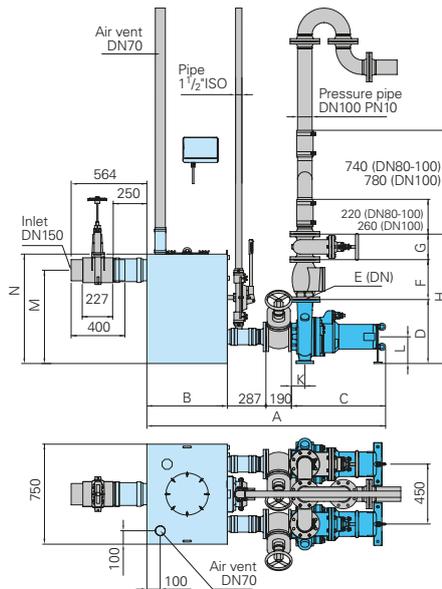
Tank type VA 18 S



Dimensions (all dimensions in mm)

Tank type	with pump type	A	A1	B	C	D	E	F	G	H	K	L	M	N	
PE 40 S-	TP 70M16/4D	1717	-	-	435	369	80	260	180	813	90	200	700	840	
PE 40 T-	TP 70M26 up to 31/4D	1758	-	-	476	440	80	260	180	884	93	200	700	840	
	TP 70V 36/2D	1754	-	-	472	369	80	260	180	813	90	200	700	840	
	MXS2336 up to 38/D44	1776	-	-	494	400	100	300	190	894	93	200	700	840	
	MXS2340 up to 42/T(3)44	1911	-	-	629	480	100	300	190	974	100	200	700	840	
	MXS2444 up to 46/T(5)64	1984	-	-	702	480	100	300	190	974	100	200	700	840	
	MXS2328 up to 30/T(7)82	1977	-	-	695	400	100	300	190	894	93	200	700	840	
PE 80 T-	MXS2332 up to 34/P(7)82	2122	-	-	840	400	100	300	190	894	93	200	700	840	
	MXS2336 up to 38/D44	1776	-	-	494	400	100	300	190	894	93	200	700	840	
	MXS2340 up to 42/T(3)44	1911	-	-	629	480	100	300	190	974	100	200	700	840	
	MXS2444 up to 46/T(5)64	1984	-	-	702	480	100	300	190	974	100	200	700	840	
	MXS2328 up to 30/T(7)82	1977	-	-	695	400	100	300	190	894	93	200	700	840	
	MXS2332 up to 34/P(7)82	2122	-	-	840	400	100	300	190	894	93	200	700	840	
VA 18 S-	TP 70M16/4D	846	974	350	435	369	80	260	180	813	90	200	700	820	
	TP 70M26 up to 31/4D	888	1015	350	476	440	80	260	180	884	93	200	700	820	
	TP 70V 36/2D	846	1011	350	472	369	80	260	180	813	90	200	700	820	
VA 18 T-	TP 70M13 up to 16/4D	1266	-	350	435	369	80	260	180	813	90	200	700	820	
	TP 70M26 up to 31/4D	1307	-	350	476	440	80	260	180	884	93	200	700	820	
	TP 70V 36/2D	1303	-	350	472	369	80	260	180	813	90	200	700	820	
VA 30 S-	TP 70M16/4D	1516	-	600	435	369	80	260	180	813	90	200	700	820	
VA 30 T-	TP 70M26 up to 31/4D	1557	-	600	476	440	80	260	180	884	93	200	700	820	
	TP 70V 36/2D	1553	-	600	472	369	80	260	180	813	90	200	700	820	
	MXS 2336 up to 38/D44	1575	-	600	494	400	100	300	190	894	93	200	700	820	
	MXS 2340 up to 42/T(3)44	1710	-	600	629	480	100	300	190	974	100	200	700	820	
	MXS 2444 up to 46/T(5)64	1783	-	600	702	480	100	300	190	974	100	200	700	820	
	MXS 2328 up to 30/T(7)82	1776	-	600	695	400	100	300	190	894	93	200	700	840	
VA 50 S-	MXS 2332 up to 34/P(7)82	1921	-	600	840	400	100	300	190	894	93	200	700	840	
	TP 70M16/4D	1916	-	1000	435	369	80	260	180	813	90	200	700	820	
	VA 50 T-	TP 70M26 up to 31/4D	1957	-	1000	476	440	80	260	180	884	93	200	700	820
		TP 70V 36/2D	1953	-	1000	472	369	80	260	180	813	90	200	700	820
		MXS 2336 up to 38/D44	1975	-	1000	494	400	100	300	190	894	93	200	700	820
		MXS 2340 up to 42/T(3)44	2110	-	1000	629	480	100	300	190	974	100	200	700	820
MXS 2444 up to 46/T(5)64		2183	-	1000	702	480	100	300	190	974	100	200	700	820	
MXS 2328 up to 30/T(7)82		2176	-	1000	695	400	100	300	190	894	93	200	700	840	
VA 100 T-	MXS 2332 up to 34/P(7)82	2321	-	1000	840	400	100	300	190	894	93	200	700	840	
	MXS 2336 up to 38/D44	2223	-	1250	494	400	100	300	190	894	93	200	1000	1200	
	MXS 2340 up to 42/T(3)44	2358	-	1250	629	480	100	300	190	974	100	200	1000	1200	
	MXS 2444 up to 46/T(5)64	2431	-	1250	702	480	100	300	190	974	100	200	1000	1200	
	MXS 2328 up to 30/T(7)82	2424	-	1250	695	400	100	300	190	894	93	200	700	840	
	MXS 2332 up to 34/T(7)82	2569	-	1250	840	400	100	300	190	894	93	200	700	840	

Tank types VA 18 T, VA 30-50 S+T, VA 100 T

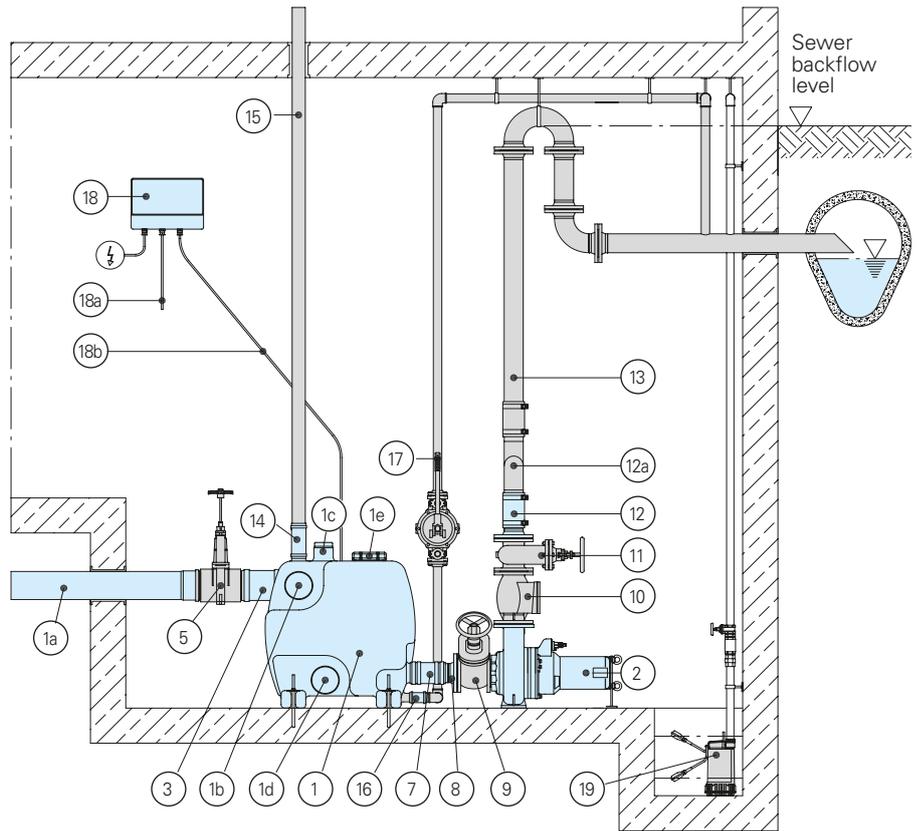


Control panel

Pneumatic level control series PS with pressure operation. Available with float switch control on request. Electronic control box for control and monitoring of all main functions.

- Plastic housing IP 54 (DOL start) IP65(star-delta-start)
 - Motor protection
 - Motor contactor resp. star-delta-combination
 - Motor fuses (only star-delta-star)
 - Manual-0-automatic switch
 - Pilot lights for operation, direction of rotation, alarm and faults
 - Volt free contact for remote signal
 - Mains-operated alarm with buzzer
 - Mains-independent alarm with battery charger for storage battery 9V
 - Temperature control of the pump-motors
 - Power voltage 400-415 V / 3Ph
 - Control voltage 230-240 V / 1Ph
 - Twin pump station control panel additionally with auto-change over after each pump cycle, operation of second pump at high flow, automatic change to stand by pump in case of pump failure.
- On request available with HCON-Control Panel (see accessories).

Installation example



Accessories

Description	Size	Part no.	Description	Size	Part no.	Description	Size	Part no.	
① Collection tank		*	⑩ Non-return valve GG, with cleaning cover, and aeration fixture, 2 flanges PN 10	DN 80 DN 100	2212807 2212809	⑭ Elastic union pipe for air vent	DN 70	*	
①a Horizontal inlet	DN 150		⑪ Flanged gate valve GG, discharge pipe, with 2 flanges PN 10	DN 80 DN 100	2216080 2216100	⑮ Air vent pipe	DN 70	on req.	
①b Alternative horizontal inlet / upper tankconnection	DN 150			⑫ Elastic union piece with flange PN 10, screws and seal	DN80 DN80/100 DN100	2159021 ** **	⑯ Elastic union piece for diaphragm pump	BSP 1 1/2"	*
①c Vertical inlet	DN 100		⑫a Connection piece with elastic connection, for twin unit PE 40	DN80/ 80 DN80/100 DN100/100	2155080 2155081 2155100	⑰ Diaphragm pump	BSP 1 1/2" F 8502455		
①d Lower tank connection	DN 150			for twin unit PE 80	DN100/150 DN100/150	2155150 2155200 2155205	⑱ Control panel with pneumatic level control		*
①e Cleaning cover			⑬ Pressure line with loop above sewer backflow level:			⑱a Connecting cable pump motor			
② Sewage pump		*		- FF-piece with 2 flanges, 1m long, screws and seal	DN 80 DN 100 DN 150	2152081 2152201 2152251	⑱b Pneumatic-pressure hose		*
③ Elastic hose connector inlet	DN 150	*		- Pressure line extension, per m	DN 80 DN 100 DN 150	2150080 2150100 2150150	⑲ Automatic drainage pump series		see individual leaflet
⑤ PVC-inlet valve	DN 100 DN 150	2214110 2214160		- 90° bend with 2 flanges PN 10, screws and seal	DN 80 DN 100 DN 150	2153302 2153303 2153353	* in scope of supply		
⑦ Elastic threaded hose fitting	DN 100	*		- 180° bend with 2 flanges PN 10, screws and seal	DN 80 DN 100 DN 150	2153401 2153403 2153453	** in scope of supply depending on pump discharge size		
⑧ Flange with pipe socket	DN 100	*							
⑨ Flanged gate valve GG, Pump inlet with 2 flanges PN 10	DN 100 DN 150	2216100 2216150							



We reserve the right to alter our specifications without notice!