



WASTE WATER TREATMENT

MAGNUM ESPH / CSPH

SUBMERSIBLE MOTOR PUMP IN EFFLUENT AND CUTTING DESIGN



MAGNUM ESPH / CSPH

The FAN submersible motor pumps impress with singular performance, versatile application and long lifespan.

FACTS

- Conveying capacities up to 250 m³/h
- Outstanding cutting performance
- High quality chrome steel cutting unit
- Submersible rotary motor 4.0 – 15.0 kW
- with insulation class H (optional)
- Higher flow rate efficiency class IE 2
- Temperature control for application in biogas plants
- Additional security thanks to leakage sensors
- High efficiency, low operating costs



1 Robust power cable

12 x 2.5 cable gland with strain relief.

2 Flange disc and counter disc

Special surface treatment, therefore wear resistant and corrosion resistant. Interception of pumps when cutting with big foreign bodies.

3 Impeller

Special casting with hardened cutting edges.
Auger, therefore good suction capacity and high thick material suitability.

4 Cutting bell

High quality cast material with hardened cutting edges.
Good cutting performance via cutting edges and impeller. Enormous suction capacity.

5 Radial housing

Large dimensioned conveyor tunnel, therefore, blockage free conveying of thick matter.

6 Three-phase submersible motor

Compact design. Short, stable and stainless steel motor shaft. Shaft sealing between pump and motor via two independently working mechanical seals. Ball bearing permanently lubricated and maintenance free. Thermic winding protection – temperature dependent resistors – therefore overload protection, Blockage and phase failure as well as under and over voltage (in connection with the original control unit). Isolation class IP68. Terminal box with 3 pieces of support rings M12 Stainless steel – cable entry in the axial direction and strain relief in the engine compartment. The three-phase submersible motor of the ESPH/CSPH is designed for higher ambient temperatures. Can be used for a medium temperature of up to 65 °C

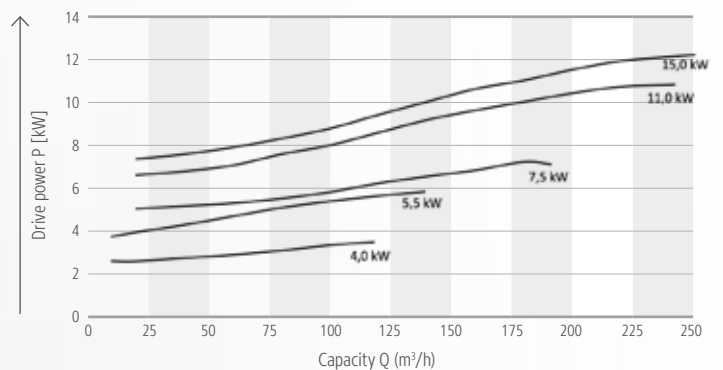
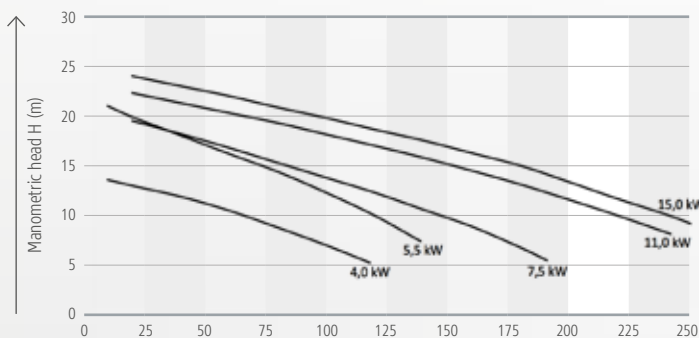
7 Oil monitoring

For the protection of the mechanical seal.

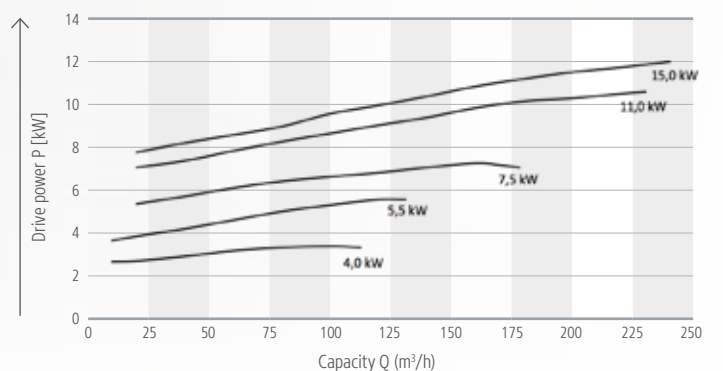
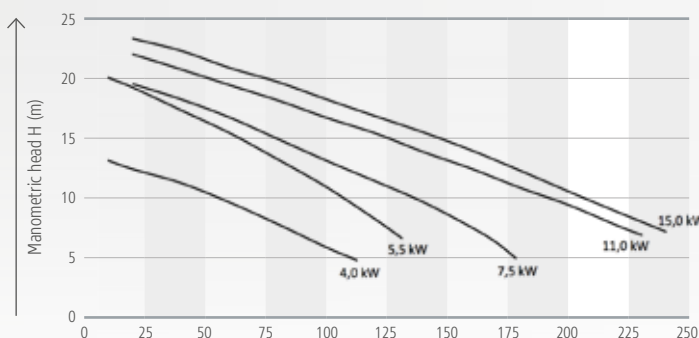
8 Mechanical sealing

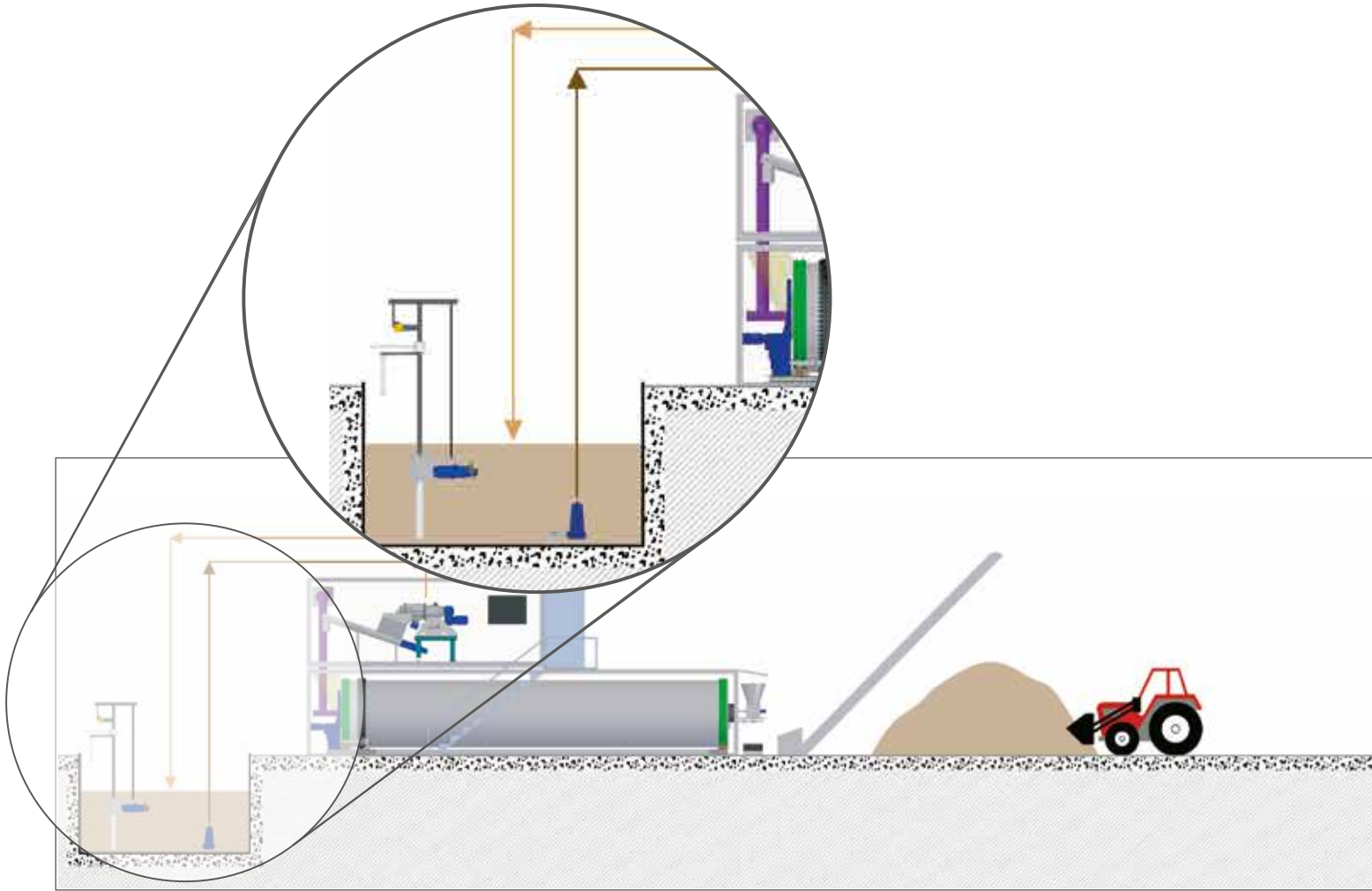
Sealing with sliding surface made of silicon carbide. Also suitable for abrasive mediums. Use with mediums to be pumped with pH-value from 4.4 to 9.9.

Characteristic curves MAGNUM ESPH



Characteristic curves MAGNUM CSPH

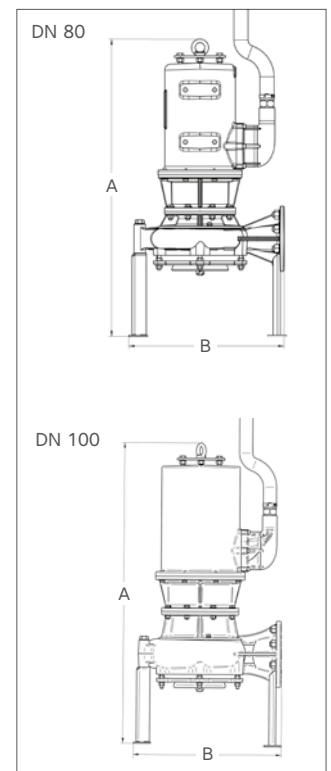




Submersible Motor Pump MAGNUM ESPH without cutting device

Model	Discharge m ³ /h	Discharge head m	max. drive power kW	max. Ampere A	Drive speed min ⁻¹	Delivery connection mm	A mm	B mm	Access
ESPH 4	20-100	13.0-7.0	4.0	8.1	1,450	DN 80	914	666	HK 89
ESPH 5,5	20-120	20.0-9.8	5.5	10.7	1,450	DN 80	913	698	HK 89
ESPH 7,5	20-200	19.6-5.5	7.5	15.6	1,450	DN 100	1,003	743	HK 108
ESPH 11	20-240	22.3-8.2	11	22.0	1,450	DN 100	1,013	743	HK 108
ESPH 15	20-250	24.0-9.1	15	28.6	1,450	DN 100	1,013	743	HK 108

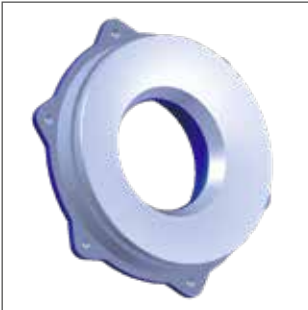
Dimension



Submersible Motor Pump MAGNUM CSPH with cutting device

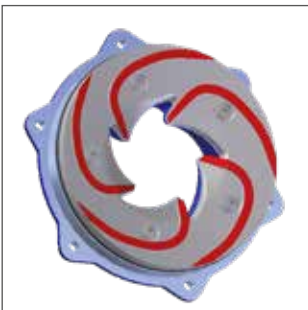
Model	Discharge m ³ /h	Discharge head m	max. drive power kW	max. Ampere A	Drive speed min ⁻¹	Delivery connection mm	A mm	B mm	Access
CSPH 4	20-100	12.3 - 5.9	4.0	8,1	1,450	DN 80	914	666	HK 89
CSPH 5,5	20-120	19.2 - 8.2	5.5	10,7	1,450	DN 80	913	698	HK 89
CSPH 7,5*	20-120	19.2 - 8.2	7.5	14,9	1,445	DN 80	913	698	HK 89
CSPH 7,5	20-180	19.5 - 5.1	7.5	15,6	1,450	DN 100	1,003	743	HK 108
CSPH 11	20-230	22.0 - 6.9	11.0	22,0	1,450	DN 100	1,013	743	HK 108
CSPH 15	20-240	23.7 - 7.4	15.0	28,6	1,445	DN 100	1,013	743	HK 108

* The CSPH 7.5/50 Hz has the same hydraulic values as the CSPH 5.5 (but with larger cutting reserves).



Higher flow rate

The new designed suction bell of the MAGNUM CSP accelerates the flow of the media.



Long lifespan

The new cutting device of the MAGNUM CSP is adjustable and easy to replace. The use of high quality chrome-steel clearly improves the lifespan of the pump.



Three way cock

With rigid stirring nozzle for ESPH / CSPH from 7.5 – 15 kW



Coupling pedestal HK89 and HK108 for ESPH-CSPH

- Stainless steel design for long life and perfect function (1.4301)
- Easy and quick mounting
- Mounting in any kind of pit possible (floor even or gradient 1 – 2%)
- Outflow flange according to DIN EN 1092-1 DN 100-PN16





SEPARATOR

A BAUER GROUP COMPANY

PRODUCTS FROM OUR SLURRY PROGRAM



MSXH
Submersible motor mixer



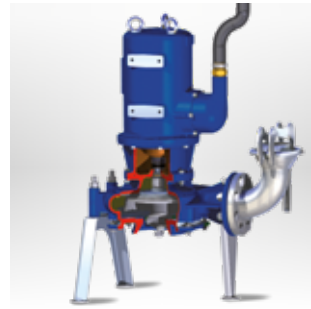
SEPARATOR SPH
Sludge press for municipal and industrial waste water



SEPARATOR PSS
Press screw separator for solid-liquid separation



SEPARATOR PLUG & PLAY
System for portable slurry separation



MAGNUM CSPH
Submersible motor pump gear unit design



HELIX DRIVE
Eccentric screw pump unit design



BRU
Bedding Recovery Unit produces fresh bedding from slurry

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