

Data sheet



Customer pos. no.: PU-ME42 A/B/C/D
Purchase order date: 2009-08-10
Your P/O no.: B09M0170
Quantity: 4,000

Number: 9971598635 - 044
Line: 001300
Date: 2009-08-26
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Etanorm RGC1 250-500

Volute casing pump in back pull-out design

Version no.: 9

Operating data

Requested flow rate	757.30 m ³ /h	Actual flow rate	757.30 m ³ /h
Requested developed head	74.00 m	Actual developed head	74.00 m
Pumped medium	Water, drinking water / tap water Clean water Materials are not affected by chemical and mech. substances	Efficiency	83.2 %
Fluid temperature	38.0 °C	Power absorbed	182.21 kW
Fluid density	993 kg/m ³	Pump speed of rotation	1486 rpm
Fluid viscosity	0.68 mm ² /s	NPSH required	4.27 m
Suction pressure max.	0.10 bar.g	Permissible operating pressure	10.00 bar.g
Suction pressure min.	0.10 bar.g	Discharge press.	7.30 bar.g
NPSH available	10.61 m	Max. power on curve	216.29 kW
Mass flow rate	208.84 kg/s	Min. allow. flow rate	276.55 m ³ /h
		Min. allow. mass flow rate	76.26 kg/s
		Shutoff head	81.72 m

Design

Pump standard	EN 733	Sealing plan	P1 Gland packing, internal sealing liquid (Na)
Design	Baseplate mounted, long-coupled	A liquid free of solids is assumed.	
Orientation	Horizontal	Seal chamber design	Standard seal chamber
Suction nominal dia.	DN 300	Calculated for inlet pressure	0.10 bar.g
Suction nominal pressure	PN 10	Contact guard	with
Suction position	axial	Wear ring	Casing wear ring
Suction Flange standard	EN 1092-2	Impeller diameter	482.0 mm
Discharge nominal dia.	DN 250	Direction of rotation from drive	Clockwise
Discharge nominal pressure	PN 10	Bearing bracket construction	Standard (normal)
Pump discharge position	top (0°/360°)	Bearing bracket size	WE65
Connection standard	EN 1092-2	Bearing seal	Lip seal
discharge		Bearing type	Anti-friction bearings
Shaft seal	Gland packing	Lubrication type	Oil
Manufacturer	KSB	Lubrication monitoring	Constant level oiler
Type	RT-P	Colour	Ultramarine blue (RAL 5002)
Material code	RT/P		KSB-blue

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Driver, accessories

Manufacturer	Flender	Motor const. type	B3
Coupling type	Arpex NAN	Motor size	without assignment
Nominal size	212	Frequency	50 Hz
Spacer length	200.0 mm	Operating voltage	6600 V
Coupling guard type	Tread-proof (ZN3230)	Rated power P2	336.00 kW
Guard size	A3	Rated current	340.0 A
Guard material	Steel	Starting current ratio	6.5
Baseplate type	Welded steel	Insulation class	F to IEC 34-1
Baseplate size	14	Motor enclosure	IP55
Baseplate drain	Drip tray	Cos phi at 4/4 load	0.88
Baseplate fixing	Foundation bolts galvanized steel	PTC resistor	6 PTC resistors
Driver type	Electric motor	Standstill heater	with
Model (make)	Siemens	Motor winding	400 V
Drive supplied by	Spec. motor supplied by KSB - mounted by KSB	Number of poles	4
		Operating mode	Delta
		Motor cooling method	Surface cooling
		Motor material	Grey cast iron GG/CAST IRON

Materials GC1

Notes		Impeller (230)	Stainless steel 1.4408
general criteria for a water analysis: pH-value \geq 7; chloride content (Cl) \leq 250 mg/kg. chlorine (Cl2) \leq 0.6 mg/kg.		Joint ring (411)	DPAF Sealing plate asbestos-free
Volute casing (102)	Grey cast iron JL 1040	Casing wear ring (502.1)	Grey cast iron JL 1040
Casing cover material (161)	Grey cast iron JL 1040	Shaft sleeve (523)	Chrome steel 1.4122+QT750
Shaft (210)	Chrome steel 1.4057+QT800	Shaft protecting sleeve (524)	Chrome steel 1.4122+QT750

Packaging

Packaging for transport	Ship	Packaging for country	Germany
Packaging for storage	Outdoor	Packaging category	B1 Wooden or plywood case, cover provided with polypropylene cellular sheet, outdoor storage up to 3 months

Name plates

Name plates language	English	Mount customer spec. nameplate	Without
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Certifications

Hydrostatic pressure test with water

Range	Complete pump with shaft seal
Test pressure	15.00 bar.g
Certificate	Inspection cert. 3.1 to EN 10204
Test time	10.0 min

Hydraulic performance test

Test participation	Without customer
Acceptance standard	ISO 9906 class 2, annex A
Quantity meas. points Q-H	5

Quantity meas. points NPSH	0
Certificate	Inspection cert. 3.1 to EN 10204
Test participation	Without customer
Quantity without customer	4
Quantity with customer	0
Bearing temperature test	No

Material tests for Volute casing, casing cover, shaft, impeller (etanormr)

Certificate	Test report 2.2 to EN 10204
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