

RGMAT EA W 5/4 Pump Station

v1.2_04/2020



Main features

Application	keeping water temperature at boiler (fire) inlet by means of a thermostatic valve
Description	consists of Wilo Yonos PARA RS 25/7.5 RKC pump, TSV5 load valve (with manual by-pass balancing), thermometer, insulation
Function	pump station for solid-fuel boilers and fires, prevents low-temperature corrosion and boiler clogging
Working fluid	water, water-glycol mix (max. 1:1) or water-glycerine mix (max. 2:1)
Installation	on return pipe, min. pipe centre distance from wall = 100 mm; for proper operation it is necessary to install a valve at the B inlet to balance flowrate

Code max. boiler output

16032 for 72 °C valve opening temperature	max. 50 kW at ΔT 20 K and a fully open balancing valve
16037 for 65 °C valve opening temperature	max. 50 kW at ΔT 20 K and a fully open balancing valve

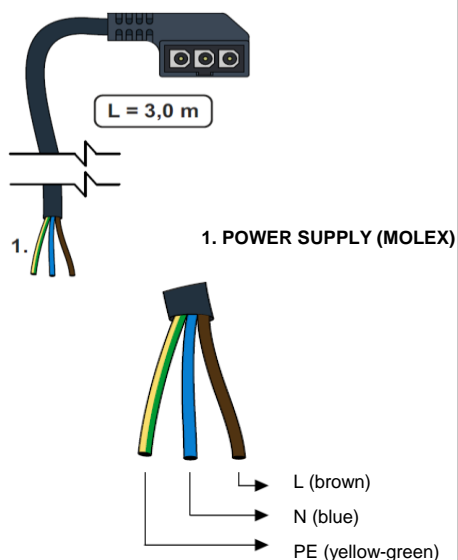
Pump Station Technical Data

Fluid operating temp.	0 - 95 °C
Max. working pressure	6 bar
Ambient temperature	58 °C
Power supply	230 V, 50 Hz
Insulation material	EPP RG 60 g/l
Overall dimensions	325 x 140 x 220 mm
Total weight	3,7 kg
Connection	3 x G 5/4" F

Accessories

By-pass with non-return valve	code 16139
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Connection of WILO Yonos PARA RS Pump



Wilo Yonos PARA RS 25/7.5 Pump Data

Electric data

Power supply	230 V, 50 Hz
Power input (min./max.)	4/75 W
Current (min./max)	0,04/0,66 A
IP rating	IPX4D
Max. speed	4770 rpm
Energy efficiency index	≤ 0.21 per EN 16 297/3
Motor protection	integrated

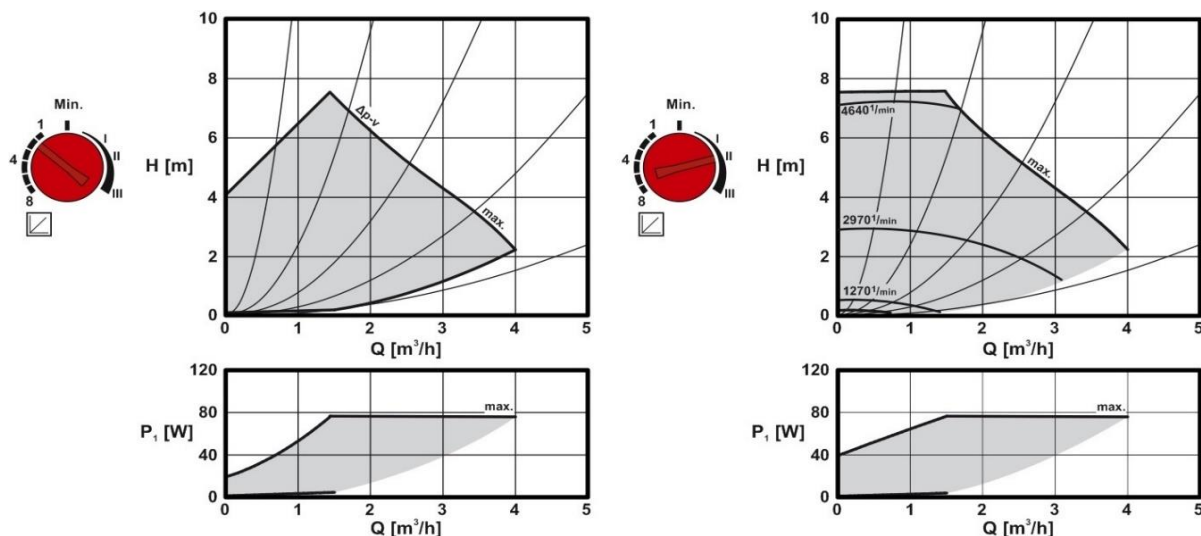
Min. pressures at pump suction port to avoid cavitation

Min. pressures at the suction port	0.5 mH ₂ O at 50 °C 4.4 mH ₂ O at 95 °C
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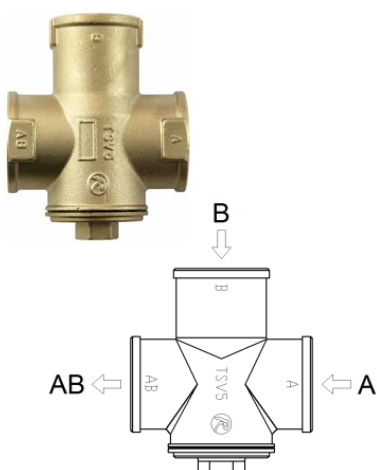
Operation data

Fluid operating temp.	0 - 100 °C at 58 °C ambient temp.
Max. working pressure	6 bar
Max. ambient temperature	7,6 m

WILO Yonos Para RS Pump performance curves



TSV5 valve



TSV5 Thermostatic valve data

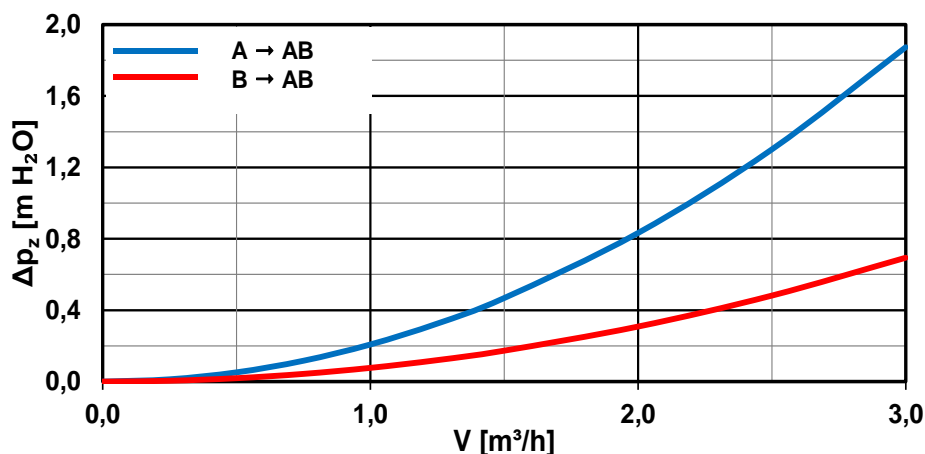
Technical data

Max. operating temp.	95 °C
Max. working pressure	6 bar
Valve opening temp.	as the thermostatic element
Range of control	$t_{v,o} + 5\text{ °C}$
Valve Kvs (A→AB direction)	7,0 m³/hod
Valve Kvs (B→AB direction)	11,5 m³/hod
Connection	3 x G 5/4" F
Nominal inner diameter	DN 32

Materials

Housing, cone and plug	brass
Spring	stainless steel
Element and plug seal	EPDM
Cone seal	NBR

Valve pressure drop diagram



Kvs value, and thus also the pressure drop in the B → AB direction, depends on the by-pass balancing valve settings.