



PRESSURE BOOSTER STATIONS

TECHNICAL DATA



IMPPUMPS | Technical Data 2024



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GENERAL INFORMATION

ALL PRODUCTS AND COMPONENTS ARE MANUFACTURED FROM ENVIRONMENTALLY FRIENDLY MATERIALS.

UPON DISPOSAL INTERNAL ENVIRONMENTAL REGULATION MUST BE CONSIDERED.

FURTHER INFORMATION ON ALL PUMPING PROGRAMS WITH TECHNICAL DATA ARE AVAILABLE ON WWW.IMP-PUMPS.COM

GENERAL SALES CONDITIONS AND TERMS OF PAYMENT – DEPENDING ON THE AGREEMENT WITH THE FIRM IMP PUMPS.

IMAGES IN CATALOGUE ARE FOR ILLUSTRATIVE PURPOSES ONLY.

TECHNICAL ADJUSTMENTS AND REVISIONS ARE NOT PERMITTED!





ABOUT US

Discover the essence of pumping excellence at IMP PUMPS, a high-tech Slovenian manufacturer. Our core expertise lies in the holistic process of designing, developing, manufacturing, distributing, and maintaining state-of-the-art pumps and pumping systems. Beyond our proprietary offerings, we forge strategic partnerships to provide integrated solutions that redefine industry benchmarks. Our impact extends globally, with over 96% of our meticulously crafted pumps reaching customers in more than 80 countries. Pioneering innovation is in our DNA, particularly evident in our groundbreaking NMT MINI world's most energy-efficient circulating pump. We proudly hold the ISO 9001:2015 quality certificate, a testament to our dedication to delivering products and services of the highest standards. Choose IMP PUMPS as your trusted partner for a future where pumping technology meets precision, every drop matters and every solution reflects our relentless pursuit of quality and innovation.

HISTORY

Established in 1947 under the IMP umbrella, IMPPUMPS charted its independent course post the late 1980s. Surviving economic shifts and the turbulent nineties, the company privatized successfully in 1997 and 1999. A transformative moment came in 2000 with restructuring and renaming as IMP PUMPS d.o.o. Slovenia's EU entry fueled intensive sales network development in the changing European market, directly and through key partners. This period saw significant investments in development, marketing, information technology, and e-commerce philosophy, positioning IMP PUMPS at the forefront of HVAC industry evolution.

PRESENT

IMP PUMPS spans global markets, serving Europe, North and South America, Asia, Africa, and Australia. Our focus on elevating pump efficiency is evident in the groundbreaking NMT pump series, utilizing permanent magnet technology for superior efficiency.

As one of the pioneers in HVAC industry, we're among the select European manufacturers introducing a new era of pumps with electronically controlled wet running motors. This innovation places IMP PUMPS at the forefront of Europe's technological elite. Choose us for a future where efficiency meets global impact.

IMP PUMPS has been awarded the prestigious Golden Gazelle of Slovenia for the year 2023. The award for best and fastestgrowing Slovenian company, a testament to our dedication to excellence and innovation.

FUTURE

At IMP PUMPS, we have a global team that understands the impact of our role in development and the environment. We are committed to energy efficiency and our products prioritize the future. We continuously innovate to create cost-effective pumps and intelligent solutions.

Our goal is to expand globally and secure a top position among Europe's circulator pump manufacturers. We work by our motto, "The honest product for the honest price," and ensure excellent quality at customer-friendly prices. We apply the latest technologies and are dedicated to providing faster service to our customers.

Choose IMP PUMPS for a future defined by quality, partnership, fast service and innovation.



Product overview

At IMP PUMPS, we specialize in the production of top-quality pumps that are specifically designed for HVAC applications. We offer a wide range of pump styles to suit your needs, including multiple options of flanged and threaded connections. Pumps can be designed as either single or double motor models. Furthermore, we provide you with the flexibility of choosing the hydraulic casing material including options such as: stainless steel, bronze, or cast iron. All of our cast iron hydraulics come with a highly durable cataphoresis coating that ensures long-lasting performance and reliability.





PPT BL - PRESSURE BOOSTER STATIONS WITH VERTICAL PUMPS



No. of directly regulated vertical pumps No. of frequency regulated pumps Number of impellers Rated pump volumetric flow Pump type Pressure booster set



Conformity with standards and regulations:

• EN1717:2001

Protection against pollution of potable water in water installations and general requirements of devices to prevent pollution by backflow

• EN 806-1:2001

Specifications for installations inside buildings conveying water for human consumption

Technical specifications			
Protection class	IP55		
Insulation class	N/F		
Motor protection	Internal thermal protection		
Ambient temperature	0 - 40°C		
Ambient relative humidity	<95%		
Liquid medium	Drinking water, pH: 5 to 8		
Max. operating pressure	16 bar(g)		
Operating temperature	0 - 120°C		

VARIATIONS:

PPT BL X-X-P1X



PPT BL X-X-P3X



PPT BL X-X-P2X



PPT BL X-X-P4X



USAGE:

- Sanitary water
- Maintaining and increasing the system pressure
- Irrigation systems
- Residential buildings
- Health facilities
- Administrative buildings
- Industrial buildings
- Hotels
- & more



PPT BWJ - PRESSURE BOOSTER STATIONS WITH HORIZONTAL PUMPS



No. of directly regulated horizontal pumps No. of frequency regulated pumps Number of impellers Rated pump volumetric flow Pump type Pressure booster set



Conformity with standards and regulations:

• EN1717:2001

Protection against pollution of potable water in water installations and general requirements of devices to prevent pollution by backflow

• EN 806-1:2001

Specifications for installations inside buildings conveying water for human consumption

Protection class	IP54
Insulation class	Ν
Motor protection	Internal thermal protection
Ambient temperature	0 - 40°C
Ambient relative humidity	<95%
Liquid medium	Drinking water, pH: 6,5 to 8
Max. operating pressure	16 bar(g)
Operating temperature	0 - 120°C

Technical specifications







USAGE:

- Sanitary water
- Maintaining and increasing the system pressure
- Irrigation systems
- Residential buildings
- Health facilities
- Administrative buildings
- Industrial buildings
- Hotels
- & more



PPT BL/BWJ- materials

Materials			
Pump hydraulic and impeller parts	Stainless steel EN 1.4301 / AISI 304		
Manifolds	Stainless steel EN 1.4301 / AISI 304		
Valves	Stainless steel EN 1.4301 / AISI 304		
Fittings	Stainless steel EN 1.4301 / AISI 304		
Pressure transducer	Stainless steel EN 1.4301 / AISI 304, Al2O3, Viton		
Base plate	Zinc plated steel		
Electric panel stand	Zinc plated steel		



PPT BL/BWJ - control options

PxV - Variable Speed Drive

Features (PxV Variable Speed Drive)			
Delivery pressure setting	Delivery pressure set on master pump		
Fault monitoring	High delivery pressure, low delivery pressure, dry run, transducer fault		
Switchover	Active pump switchover interval		
Fault relay output	NO 5A/NC 3A		
Fault shift	If master fails, first auxiliary becomes master		
Pressure transducer	016 bar, 420 mA Redundancy: Master pump and first auxiliary pump		
Dry run protection	Pressure switch at suction manifold		



PxF - Direct Starting Electronic Control

Features (PxF Direct Starting Electronic Control)			
Delivery pressure setting	Delivery pressure set on control panel		
Fault monitoring	Dry run, low delivery pressure, minimum and maximum current protection for each motor, lack and sequence of phases protection, minimum and maximum voltage protection		
Switchover	Active pump switchover interval		
Fault relay output	NO/NC 5A		
Motor failure switchover	Automatic switch to next pump		
Pressure transducer	016 bar, 420 mA		
Dry run protection	Pressure switch at suction manifold		





PPT BL model examples:







PPT BL P2V







PPT BL P3F

PPT BL P3V

PPT BL P2V-V

PPT BWJ model examples:



PPT BWJ P2V



PPT BL 2-X-PXX

Pressure boosting units based on BL 2 pumps

Technical specifications		Electrical specifications		
Power supply	3~ 400 ∨ ±15%	Pump	Power per pump [kW]	Power per pump [HP]
Frequency	47-63 [Hz]	BL 2-2	0,37	0,5
Declared protection	IP55	BL 2-3	0,37	0,5
		BL 2-4	0,55	0,75
Fluid	Water, pH 5÷8	BL 2-5	0,55	0,75
Fluid temperature	0÷120 [°C]	BL 2-6	0,75	1
Insulation class	Ν	BL 2-7	0,75	1
DN	65 [mm]	BL 2-9	1,1	1,5
Max. pressure	16 [bar]	BL 2-11	1,1	1,5
Ambient temperature	up to 40 [°C]	BL 2-13	1,5	2

Performance curves for PPT BL 2-X-PXX





















PPT BL 4-X-PXX

Pressure boosting units based on BL 4 pumps

Technical specifications		Electrical specifications		
Power supply	3~ 400 V ±15%	Pump	Power per pump [kW]	Power per pump [HP]
Frequency	47-63 [Hz]	BL 4-2	0,37	0,5
Declared protection	IP55	BL 4-3	0,55	0,75
		BL 4-4	0,75	1
Fluid	Water, pH 5÷8	BL 4-5	1,1	1,5
Fluid temperature	0÷120 [°C]	BL 4-6	1,1	1,5
Insulation class	Ν	BL 4-7	1,5	2
DN	65 [mm]	BL 4-8	1,5	2
Max. pressure	16 [bar]	BL 4-10	2,2	3
	up to 10 [°C]	BL 4-12	2,2	3
		BL 4-16	3	4

Performance curves for PPT BL 4-X-PXX





















PPT BL 8-X-PXX

Pressure boosting units based on BL 8 pumps

Technical specifications		Electrical specifications		
Power supply	3~ 400 V ±15%	Pump	Power per pump [kW]	Power per pump [HP]
Frequency	47-63 [Hz]	BL 8-2	0,75	1
Declared protection	IP55	BL 8-3	1,1	1,5
	11 00	BL 8-4	1,5	2
Fluid	Water, pH 5÷8	BL 8-5	2,2	3
Fluid temperature	0÷120 [°C]	BL 8-6	2,2	3
Insulation class	Ν	BL 8-8	3	4
DN	65 [mm]	BL 8-10	4	5,5
Max. pressure	16 [bar]	BL 8-11	4	5,5
Ambient temperature	up to 40 [°C]			

Performance curves for PPT BL 8-X-PXX









PPT BL 12-X-PXX

Pressure boosting units based on BL 12 pumps

Technical specifications		Electrical specifications		
Power supply	3~ 400 V ±15%	Pump	Power per pump [kW]	Power per pump [HP]
Frequency	47-63 [Hz]	BL 12-2	1,5	2
Declared protection	IP55	BL 12-3	2,2	3
	11 3 3	BL 12-4	3	4
Fluid	Water, pH 5÷8	BL 12-5	3	4
Fluid temperature	0÷120 [°C]	BL 12-6	4	5,5
Insulation class	F	BL 12-7	5,5	7,5
DN	80 [mm]	BL 12-8	5,5	7,5
Max. pressure	16 [bar]	BL 12-9	5,5	7,5
A	up to 10 [°C]	BL 12-10	7,5	10
		BL 12-12	7,5	10

Performance curves for PPT BL 12-X-PXX





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PPT BL 16-X-PXX

Pressure boosting units based on BL 16 pumps

Technical specifications		Electrical specifications		
Power supply	3~ 400 V ±15%	Pump	Power per pump [kW]	Power per pump [HP]
Frequency	47-63 [Hz]	BL 16-2	2,2	3
Declared protection	IP55	BL 16-3	3	4
	11 00	BL 16-5	5,5	7,5
Fluid	Water, pH 5÷8	BL 16-6	5,5	7,5
Fluid temperature	0÷120 [°C]	BL 16-7	7,5	10
Insulation class	F	BL 16-8	7,5	10
DN	80 [mm]	BL 16-10	11	15
Max. pressure	16 [bar]			
Ambient temperature	up to 40 [°C]]		

Performance curves for PPT BL 16-X-PXX





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PPT BL 20-X-PXX

Pressure boosting units based on BL 20 pumps

Technical specifications		Electrical specifications			
Power supply	3~ 400 V ±15%	Pump	Power per pump [kW]	Power per pump [HP]	
Frequency	47-63 [Hz]	BL 20-2	2,2	3	
Declared protection	IP55	BL 20-3	4	5,5	
		BL 20-4	5,5	7,5	
Fluid	Water, pH 5÷8	BL 20-5	5,5	7,5	
Fluid temperature	0÷120 [°C]	BL 20-6	7,5	10	
Insulation class	F	BL 20-7	7,5	10	
DN	80 [mm]	BL 20-8	11	15	
Max. pressure	16 [bar]	BL 20-10	11	15	
Ambient temperature	up to 40 [°C]				

Performance curves for PPT BL 20-X-PXX





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PPT BL 32-X-PXX

Pressure boosting units based on BL 32 pumps

Technical specifications		Electrical specifications		
Power supply	3~ 400 V ±15%	Pump	Power per pump [kW]	Power per pump [HP]
Frequency	47-63 [Hz]	BL 32-2	4	5,5
Declared protection	IP55	BL 32-3	5,5	7,5
	11 3 3	BL 32-4	7,5	10
Fluid	Water, pH 5÷8	BL 32-5	11	15
Fluid temperature	0÷120 [°C]	BL 32-6	11	15
Insulation class	F	BL 32-7	15	20
DN	100 [mm]			
Max. pressure	16 [bar]			
Ambient temperature	up to 40 [°C]			

Performance curves for PPT BL 32-X-PXX





















PPT BWJ 2-X-PXX

Pressure boosting units based on BWJ 2 pumps

Technical specifications		
Power supply $3 \sim 400 \text{ V} \pm 15\%$		
Frequency	47-63 [Hz]	
Declared protection	IP54	
Fluid	Water, pH 6,5÷8,5	
Fluid temperature	0÷120 [°C]	
Insulation class	Ν	
DN	65 [mm]	
Max. pressure	16 [bar]	
Ambient temperature	up to 40 [°C]	

Electrical specifications			
Pump	Power per pump [kW]	Power per pump [HP]	
BWJ2-2	0,37	0,5	
BWJ2-3	0,37	0,5	
BWJ2-4	0,55	0,75	
BWJ2-5	0,55	0,75	
BWJ2-6	0,75	1	

Dimensions & Materials







	Dimensions 1
Pump	L [mm]
BWJ2-2	599
BWJ2-3	617
BWJ2-4	635
BWJ2-5	653
BWJ2-6	727







Performance curves for PPT BWJ 2-X-PXX





PPT BWJ 4-X-PXX

Pressure boosting units based on BWJ 4 pumps

Technical specifications		
Power supply	3~ 400 V ±15%	
Frequency	47-63 [Hz]	
Declared protection	IP54	
Fluid	Water, pH 6,5÷8,5	
Fluid temperature	0÷120 [°C]	
Insulation class	Ν	
DN	65 [mm]	
Max. pressure	16 [bar]	
Ambient temperature	up to 40 [°C]	

Electrical specifications			
Pump	Power per pump [kW]	Power per pump [HP]	
BWJ4-2	0,37	0,5	
BWJ4-3	0,55	0,75	
BWJ4-4	0,75	1	
BWJ4-5	1,1	1,5	
BWJ4-6	1,1	1,5	
BWJ4-5	1,1	1,5	

Dimensions & Materials







	Dimensions 1
Pump	L [mm]
BWJ4-2	617
BWJ4-3	644
BWJ4-4	727
BWJ4-5	754
BWJ4-6	781







Performance curves for PPT BWJ 4-X-PXX





PPT BWJ 8-X-PXX

Pressure boosting units based on BWJ 8 pumps

Technical specifications		
Power supply	3~ 400 V ±15%	
Frequency	47-63 [Hz]	
Declared protection	IP54	
Fluid	Water, pH 6,5÷8,5	
Fluid temperature	0÷120 [°C]	
Insulation class	Ν	
DN	65 [mm]	
Max. pressure	16 [bar]	
Ambient temperature	up to 40 [°C]	

Electrical specifications			
Pump	Power per pump [kW]	Power per pump [HP]	
BWJ8-2	0,75	1	
BWJ8-3	1,1	1,5	
BWJ8-4	1,5	2	
BWJ8-5	2,2	3	

Dimensions & Materials







Dimensions 1		
Pump	L [mm]	
BWJ8-2	659	
BWJ8-3	689	
BWJ8-4	786	
BWJ8-5	816	







Performance curves for PPT BWJ 8-X-PXX





PPT BWJ 16-X-PXX

Pressure boosting units based on BWJ 16 pumps

Technical specifications		
Power supply 3~ 400 V ±15%		
Frequency	47-63 [Hz]	
Declared protection	IP54	
Fluid	Water, pH 6,5÷8,5	
Fluid temperature	0÷120 [°C]	
Insulation class	Ν	
DN	65 [mm]	
Max. pressure	16 [bar]	
Ambient temperature	up to 40 [°C]	

Electrical specifications			
Pump	Power per pump [kW]	Power per pump [HP]	
BWJ16-2	2,2	3	
BWJ16-3	3	4	

Dimensions & Materials







Dimensions 1	
Pump	L [mm]
BWJ16-2	750
BWJ16-3	807







Performance curves for PPT BWJ 16-X-PXX



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