









# **BSA Series**

High Pressure, High Performance Trailer Pumps

# Powerful performance across multiple applications

#### Proven Reliability

Only Putzmeister has the technology to combine both high output and high pressure in one pump. Our extended line of BSA Series trailer pumps, from the BSA 2109 Series to the BSA 14000 Series, facilitate pumping in a wide variety of applications, such as high-rise and long-distance concrete pumping, tunnel construction, sludge pumping and other specialty jobs.

#### **Key Advantages**

- High output and high pressure in one pump
- Convenient controls
- High pressure S-Valve
- RS 905 Hopper
- Rugged delivery cylinders
- Heavy-duty tandem axles

- Putzmeister's exclusive
   Free Flow Hydraulics
- Tier 4 emissions compliant
- Gate and diversion valves
- Simple cleanup
- Long-term dependability



## Putzmeister BSA series advantages

#### **Convenient Controls**

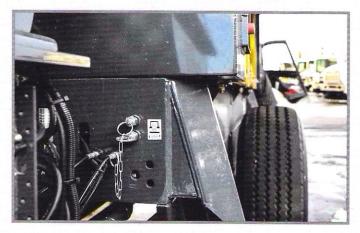
The control panel is fully enclosed for weatherproof wear and includes an emergency stop button. The remote control, with 33 ft. (10m) of cable, features pump on/off, pump forward/ reverse and stroke change. An auxiliary hydraulic connection on the pump is standard for the 2100 and 14000 Series.

#### Making Quick Work of Tough Mixes

Our powerful pumps handle the harshest mixes with pumpable consistencies down to a 0" slump, with a max 2.5" (63mm) aggregate size.



Optional high pressure flushing water pump for easier and more effective clean-out.



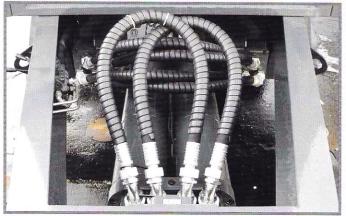
An auxiliary hydraulic connection is included on 2100 and 14000 pumps to operate stand-alone diversion or shutoff valves.

#### **Heavy-duty Tandem Axles**

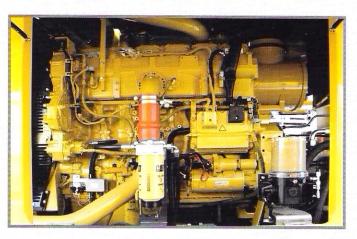
Designed for highway travel and job site use, the steel frame trailer is fully equipped with four manually-operated outriggers and a front jack stand with a support wheel on a tow bar.

#### **Rugged Delivery Cylinders**

Special hard-chromed material cylinders and automatic central lubrication of the heavy-duty multi-piece piston cup assure long service life.



Optional rod/piston change-over system is designed to be fast and easy to facilitate output or pressure, when needed.



Easy access to engine provides quick maintenance.

### BSA tier 4 final emission compliance

#### Meeting the Emission Directive, Exceeding Performance Expectations

Our new BSA D4 models feature efficient exhaust gas treatment systems that incorporate a Diesel Partical Filter (DPF), which reduces soluble particles and diesel soot, and also includes Selective Catalytic Reduction (SCR) that reduces nitrogen oxides. New machines can only be refueled with diesel fuel that does not contain sulfhur, and needs the addition of a urea-based exhaust gas purification fluid called AdBlue®.

While our improved BSA trailer-mounted concrete pumpes effectively meet all emission requirements, these Putzmeister units do not sacrifice performance. In fact, they offer even greater efficiency than prior models, while also reducing operating costs.

#### **RS 905 Hopper**

#### The RS 905 Hoppers offer more standard features:

- Large capacity hopper
- 21.2 cu ft (600L) capacity (2100 and 14000 Series)
- Wide opening for simultaneous unloading of mixer trucks
- Rubber collar (2100 and 14000 Series)
- Agitator with safety switch-off
- Vibrator
- Grate with splash guard
- Central lubrication

#### **Key Advantages**

- Compliance with Directive 97/68/EC, Tier 4 Final
- Smoother operating performance that protects the machine
- Reduction in noise levels
- Reduction in average fuel consumption up to 10%, resulting in lower operating costs
- Up to 15% more power than similar Tier 3 engines



#### **High Pressure S-Valve**

Ideal for high pressure applications, the S-Valve features a "thick-walled" construction that maximizes the valve's life to help reduce wear part costs. It also easily adjusts to compensate for wear. In addition, the S-Valve features:

- Hard-faced, wear-resistant alloys on the spectacle wear plate and automatic seal ring.
- Twin, single-acting hydraulic shift cylinders, mounted outside the hopper, for better protection and easy adjustments.
- Optional carbide wear parts.

#### **Gate and Diversion Valves**

Gate valves and hydraulic diversion valves are completely leak-proof to meet modern pipeline requirements, while hydraulic diversion valves are also ideal for use with two or more delivery lines.



**GVM 2/2** 



**GVHM 2/2** 

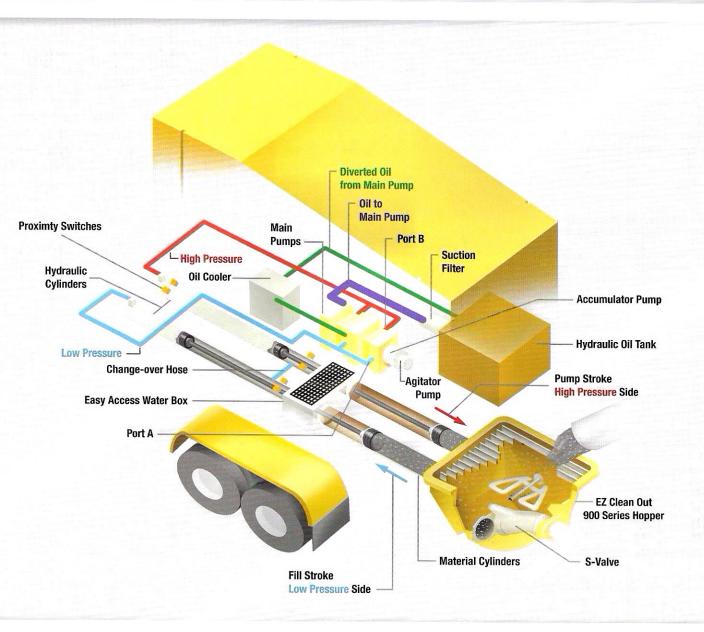


DVH 5/2



**SDVH 3/2** 

# Putzmeister free flow hydraulics



# Free Flow Hydraulics in a Closed Loop System

Simple and reliable, Putzmeister's closed loop, free flow hydraulics (FFH) design provides a smoother, more controllable and economical approach to pumping. The pump has a fully adjustable volume control to allow very slow pumping while retaining full concrete pressure. Convenient to use and easy to service, this exclusive system is known for its performance and reliability worldwide.

#### Key Advantages of Putzmeister's Free Flow Hydraulics

- Changes in material pressure in the delivery line are reduced to ensure smooth pumping and a consistent concrete flow.
- Intelligent design minimizes wear-inducing pressure peaks, increases service life and makes our pumps extremely powerful.
- Greater pump output is due to the efficient use of all available energy.
- Rapid change-over of the stroke means higher outputs, a smoother flow of concrete and less boom bounce.

# BSA series specifications

Performance	BSA 2109 H-D4°	BSA 2108 HP-E*	BSA 2110 HP-D4
Maximum Theoretical Output Rod Side Piston Side	124 yd³/hr (95m³/hr) 75 yd³/hr (57m³/hr)	124 yd³/hr (95m³/hr) 86 yd³/hr (66m³/hr)*	133 yd³/hr (102m³/hr) 92 yd³/hr (70m³/hr)*
Maximum Theoretical Pressure Rod Side Piston Side	1,320 psi (91 bar) 2,205 psi (152 bar)	2,176 psi (150 bar) 3,190 psi (220 bar)*	2,176 psi (150 bar) 3,190 psi (220 bar)*
Maximum Size Aggregate	2.5" (63mm)	2.5" (63mm)	2.5" (63mm)
Technical Information			
Material Cylinders	8" x 83" (200 x 2,100mm)	8" x 83" (200 x 2,100mm)	8" x 83" (200 x 2,100mm)
Maximum Strokes Per Minute Rod Side Piston Side	24 15	24 17	26 18
Variable Volume	0 to full	0 to full	0 to full
S-Valve	S-2015D	S-1812D	S-2015D
Chromed Cylinders	Standard	Standard	Standard
Hydraulic System	FFH-EL	FFH-EPS	FFH-EL
Hydraulic System Pressure	5,075 psi (350 bar)	5,075 psi (350 bar)	5,075 psi (350 bar)
Hydraulic Cylinders	5.1" x 3.2" (130 x 80mm)	6.3" x 3.5" (160 x 90mm)	6.3" x 3.5" (160 x 90mm)
Hopper Model Capacity Height	RS 900H 21.2 cu ft (600L) 51" (1,295mm)	RS 905HF 21.2 cu ft (600L) 50" (1,270mm)	RS 905HF 21.2 cu ft (600L) 50" (1,270mm)
Outlet Diameter	ZX150	ZX125	ZX150
Power			
Diesel Engine/Motor	Deutz	460V 60hz	Deutz
Engine Horespower	268 hp (200kW)	335 hp (250kW)	443 hp (330kW)
Trailer			
Trailer Type	Tandem axles	Tandem axles	Tandem axles
Dimensions			
Length	287" (7,300mm)	284" (7,221mm)	304" (7,725mm)
Width	81" (2,050mm)	85" (2,169mm)	101" (2,560mm)
Height	98" (2,500mm)	90" (2,277mm)	94" (2,390mm)
Weight (approx.)	14,400 lbs (6,530kg)	21,800 lbs (9,890kg)	22,000 lbs (9,980kg)

#### **BSA 2100 Series**

- High performance long stroke.
- Designed for jobs extending up to 800 ft (244m).



BSA 14000 HP-D4 7" *	BSA 14000 HP-D4 8" *	BSA 14000 HP-E 8"	BSA 14000 SHP-D4 7"
110 yd³/hr (84m³/hr) 74 yd³/hr (57m³/hr)*	133 yd³/hr (102m³/hr) 92 yd³/hr (70m³/hr)*	116 yd³/hr (89m³/hr) 78 yd³/hr (60m³/hr)	94 yd³/hr (72m³/hr) 48 yd³/hr (37m³/hr)*
2,290 psi (158 bar) 3,350 psi (231 bar)*	2,176 psi (150 bar) 3,190 psi (220 bar)*	2,176 psi (150 bar) 3,190 psi (220 bar)*	3,190 psi (220 bar) 3,626 psi (250 bar)*
2.5" (63mm)	2.5" (63mm)	2.5" (63mm)	2.5" (63mm)
7" x 83" (180 x 2,100mm)	8" x 83" (200 x 2,100mm)	8" x 83" (200 x 2,100mm)	7" x 83" (180 x 2,100mm)
26 17	26 18	22 15	22 11
0 to full	0 to full	0 to full	0 to full
S-1812D	S-1812D	S-1812D	S-1812D
Standard	Standard	Standard	Standard
FFH-EL	FFH-EL	FFH-EL	FFH-EL
5,075 psi (350 bar)	5,075 psi (350 bar)	5,075 psi (350 bar)	Consult Factory
6.3" x 3.5" (160 x 90mm)	6.3" x 3.5" (160 x 90mm)	6.3" x 3.5" (160 x 90mm)	7.9" x 5.5" (200 x 140mm)
RS 905HF 21.2 cu ft (600L) 51" (1,295mm)	RS 905HF 21.2 cu ft (600L) 51" (1,295mm)	RS 905HF 21.2 cu ft (600L) 51" (1,295mm)	RS 905 SHP F 21.2 cu ft (600L) 51" (1,295mm)
ZX125	ZX125	ZX125	ZX125
Caterpillar	Caterpillar	460V 60hz	Caterpillar
630 hp (470kW)	630 hp (470kW)	2x 248 hp (185kW)	630 hp (470kW)
Tandem axles	Tandem axles	Tandem axles	Jobsite axles
308" (7,830mm)	308" (7,830mm)	308" (7,830mm)	297" (7,545mm)
101" (2,560mm)	101" (2,560mm)	101" (2,560mm)	92" (2,331mm)
142" (3,600mm)	142" (3,600mm)	142" (3,600mm)	130" (3,302mm)
24,200 lbs (11,000kg)	25,340 lbs (11,600kg)	23,840 lbs (10,810kg)	24,250 lbs (11,000kg)

#### **BSA 1400 Series**

- Most powerful concrete pump.
- Multiple cylinder sizes available to fit any job requirements.



#### **Genuine Putzmeister Parts**

Not all parts are created equal. Putzmeister offers longer lasting, better performing parts under increased wear conditions. Our in-stock inventory includes more than 20,000 parts totaling more than \$40 million dollars. This means greater savings and less downtime.

#### **Customer Support and Service**

Putzmeister proudly offers a dedicated Customer Support Group to provide assistance, answer questions, and help you order parts. Count on 24/7 support from Putzmeister's highly trained technical support team to keep your equipment operating smoothly.

#### Parts Orders, Services & Customer Support

7 am - 7 pm CST (800) 890-0269

#### Save and Earn with Advantage Rewards

As a member of our coveted loyalty program, you will find outstanding value on parts purchases. The Advantage Rewards Program offers savings on quality parts, and allows you to earn credit toward future orders with each qualifying purchase.

Learn more at **PutzmeisterAmerica.com**, and speak with your regional parts representative to sign up today.

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