

"Meeting customers expectations through value added service & innovative products"

B SERIES: ADVANTAGES

Pump with Confidence

The BRUBIN B Series pump can handle your toughest pumping needs - from abrasive and aggressive to shear-sensitive viscous materials.

Durable

Ductile iron and steel construction allow higher discharge pressures up to 15 bar. Its solid construction and advanced design also reduce maintenance and repairs.

Low Maintenance Costs

With a simple design using minimum parts the pump offers easy maintenance by lesser skilled labourers. The pumps and spare parts are very economically priced and stock is always available from a South African supplier or reseller.

Reliable

The BRUBIN B Series pump is self-priming up to 9 meters suction lift. This pump is able to run dry continuously without detrimental effects. The pump is capable of operating in forward or reverse.

Seal Free

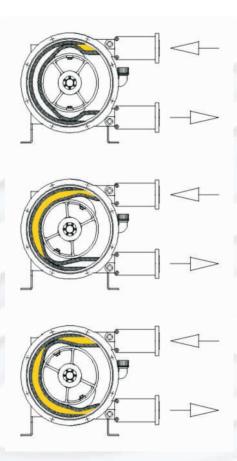
Seal free design eliminates leaks and contamination. Fluids are contained within the hose. The hose is the primary maintenance component.

Quality and Warranty

The pumps and spare parts are assembled and supplied by Brubin Pumps according to ISO 9001:2008. All our equipment is guaranteed to our highly rated workmanship and materials in accordance with our clients requirements, offering total peace of mind.

PRINCIPLE OF OPERATION

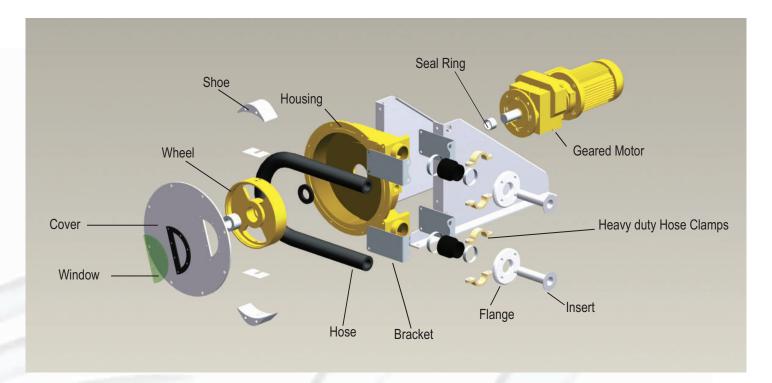
Pumping action is achieved by compression of a circular loop of elastomeric hose with two diametrically opposed rotating shoes. This rotational motion forces the fluid in the hose to move ahead of each shoe. When each shoe reaches the end of the loop, the reinforced tube immediately returns to its original shape, thereby ensuring suction and priming. The pump housing is partially filled with lubricant, aiding smooth running of the shoes on the hose. The inside of the hose and inserts are the only parts in contact with pumped fluids, allowing aggressive and contaminated fluids to be pumped.



APPLICATIONS

- **Mineral Process** (thickener underflow, sludge up to 60000 Cps, Cyanide dosing, activated carbon, fly ash slurry, explosives, flocculant & reagent dosing)
- Water Treatment (lime liquor, flocculate dispersion, sludge, chemical dosing)
- · Building & Construction (liquid or fibrous mortar, liquid plaster, light concrete, roof coating)
- Ceramics (ceramic slips, mould filling, filter press)
- Sugar Industry (syrup, molasses, filter press)
- Paper Industry (latex, slurries, kaolin, lime)
- Nuclear (contaminated slurries and mud, ammonium dioxide)
- **Food industry** (tomato sauce, mashed potatoes, gelatine, beer slurries, fish paste, olive oil, organic waste, yeast, Kieselguhr)
- Filter Press (filling and pressing)
- Chemical Industry (acid, alcohol, detergents, API dam sludge, acrylic & water based paint, pigments, glue, fertilizer, soap slurry, latex)





PUMP CONSTRUCTION

Pump Housing: Ductile iron

• Wheel: Ductile iron

Shoes: Aluminium or Cast Iron
Cover: Steel and Polycarbonate

Flanges: Stainless steel - DIN or ASME

· Brackets: Stainless steel

FEATURES AND BENEFITS

Hoses & Lubricant

The manufacturer of our hoses, Albin Pump SAS, only work with high quality compounded rubbers, reinforced with 2 to 6 individual layers of braided polyamide and with an outer layer made to strict tolerances to ensure perfect compression.

The characteristics of Albin hoses enable them to last approximately 30% longer compared to other hoses on the market. They also fit the majority of other hose pumps.

It is essential that you purchase the lubricant from a credible source. We only supply the purest grade lubricant.

Hose Temperature Limits

For continuous duties

• NR: 75° C

• NBR: 75° C

• NBR. 75 C • EPDM: 85° C.

For CIP duties

• NR: 85° C

• NBR/ Hypalon: 95° C

• EPDM: 110° C

• Inserts: Stainless steel (standard), PPH or PVDF

· Hose Clamps: Stainless steel or plated

• Bolts & Nuts: 304SS

• Base Frame: 304SS or Carbon Steel (Zinc Plated)

· Paint Finish: QD Enamel - Mango Tang

· Name Plate: 304SS



Hose Material

Each hose is coded with a colored band and delivered with it's own shimming chart.

For the hose inner layers, 5 materials are available to suit the diversity of the pumped fluids:

- NR Natural rubber (White marking)
- NBR Buna (Yellow marking)
- NBR Food Buna (White & yellow marking)
- EPDM (Red marking)
- HYPALON (Blue marking).

FEATURES AND BENEFITS

Hose Surface Finish

Our hoses are offered un-machined on the external surface without compromising the dimensional tolerance. With an un-machined hose, the lubricant has a better grip on the hose, causing less friction and heat build up between the shoe and the hose, resulting in a longer hose life and reducing power requirements.

High Temperature Applications

Over 75°C, the hose life reduces rapidly. The hose life can be drastically increased by reducing the lubricant temperature. To do this, BRUBIN can offer an optional water cooling jacket on the pump cover, without using additional lubricant.

Close Coupled design

- No coupling alignment, less chance of bearing failure.
- · No internal bearings. Shaft support by external



reinforced gearbox bearings.

• Small foot print, space saving, easy installation.

Locking device on shaft

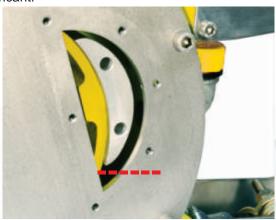
- · Easy assembly and disassembly.
- · No special tools required.



 No internal bearings that can be damaged when the medium enters due to hose breakage, resulting in complete pump failure

Window on Cover

 Large window on cover for easy removal of shoes and for shimming, without removing cover and draining the lubricant.



- · Alternative large opening for filling of lubricant.
- · Bottom of window serves as lubricant level indicator.

Hose installation

 Quick and Easy hose clamping device by means of three heavy duty hose clamps especially designed to retain the lubricant and to ensure maximum securing of the hose to the insert on the pressure side.



- Inserts standard in 316SS (PP & PVDF optional).
- Easy and uncomplicated maintenance compared to conventional hose wedging design which sometimes results in the breaking of the stud.





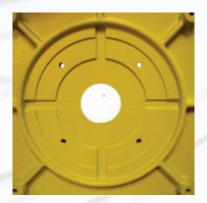
Double shaft seal

· The pump is fitted with a double shaft seal design, the primary on the pump housing and the secondary on the atmosphere side of the gearbox shaft for maximum drive protection.



Leakage Channel

· A wide leakage drain groove is situated on the back of the main housing for any possible leakage of lubricant or pumped medium to atmosphere.



Standard Geared Motors

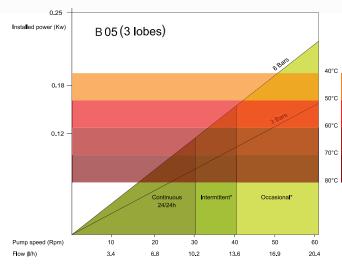
- The pump series B10 to BX40 are fitted with standard off the shelf helical geared motors, whereas the series B50 to B125 are fitted with standard off the shelf planetary gear motor drives.
- · All geared motor makes supplied, are locally represented in all the main business centres either direct from the stockist or our distributor for easy replacement at minimal cost to maintenance.
- Studs, compared to others with fixing bolts, ensure increased securing of the gearbox to the housing.

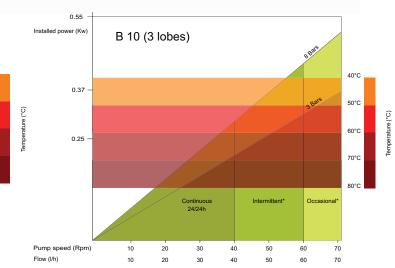


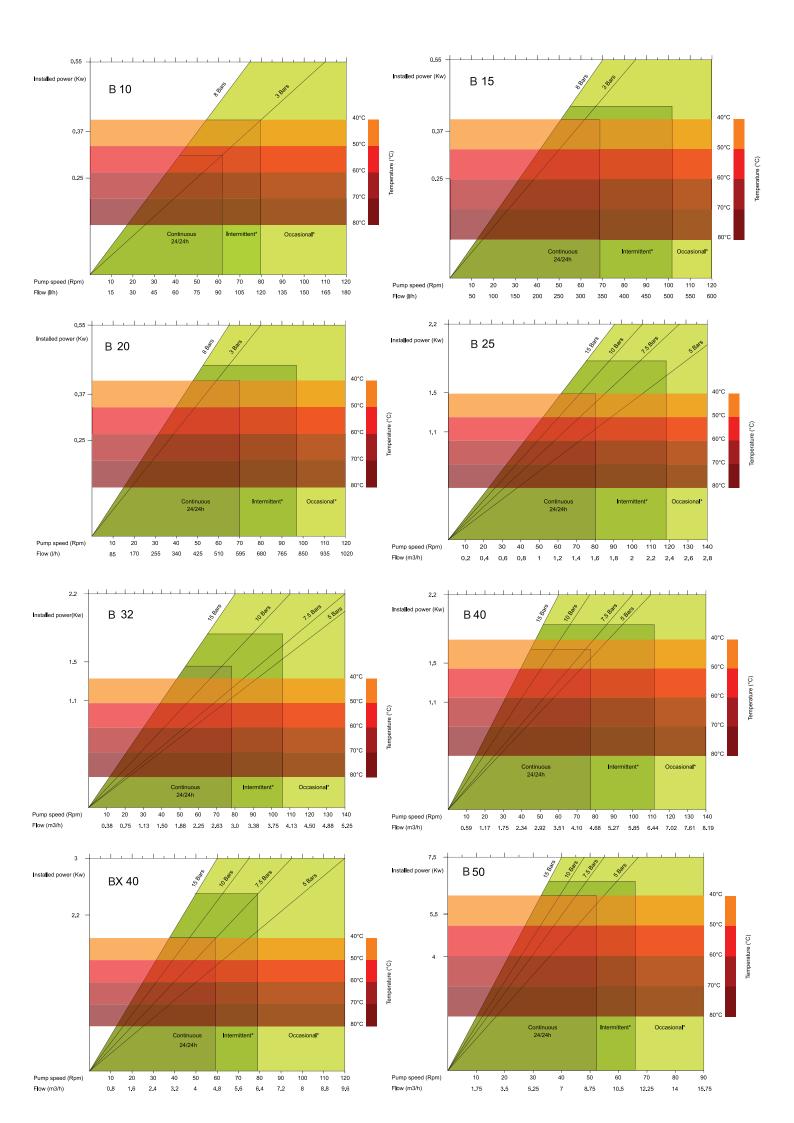
Optional extras

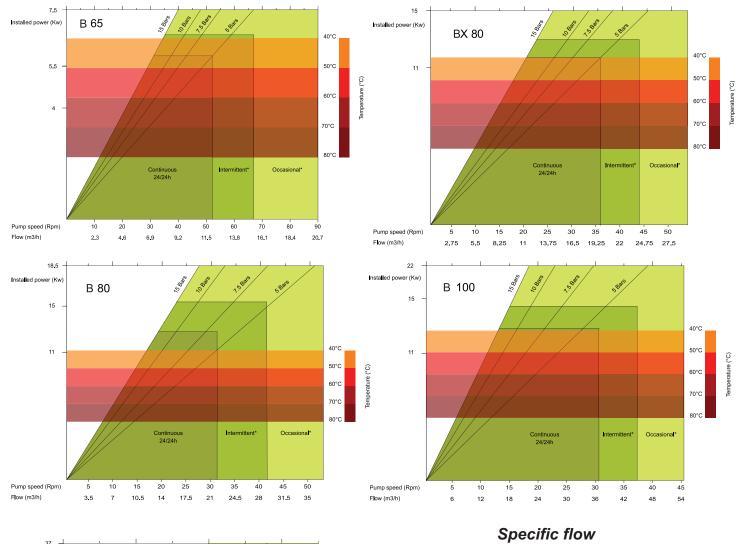
- · Special paint or coating on housing and internal parts.
- Pulsation dampeners (in-line or diaphragm).
- Instrumentation for leakage detection and NF5008 wheel rotation counter (for batch processes).

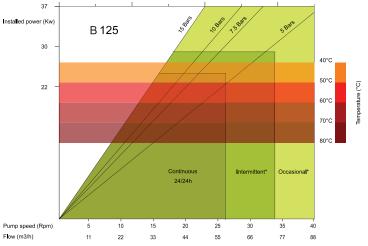
PERFORMANCE DATA







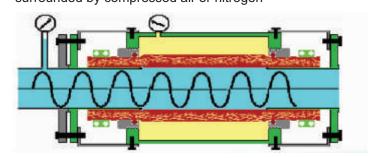




| Model | Litres / rev |
|--------|--------------|
| B 05_3 | 0.0056 |
| B 10_3 | 0.0167 |
| B 10 | 0.0250 |
| B 15 | 0.0833 |
| B 20 | 0.1417 |
| B 25 | 0.3333 |
| B 32 | 0.6250 |
| B 40 | 0.9750 |
| BX 40 | 1.3333 |
| B 50 | 2.9167 |
| B 65 | 3.8333 |
| BX 80 | 9.1667 |
| B 80 | 11.666 |
| B 100 | 20.000 |
| B 125 | 36.667 |
| | |

INLINE PULSATION DAMPENER

The pulsation damper reduces the pulses created in the discharge line by the hose pump. This is achieved by means of a thick-walled, reinforced rubber hose which is mounted in a carbon steel, cylindrical pressure vessel. The hose is surrounded by compressed air or nitrogen

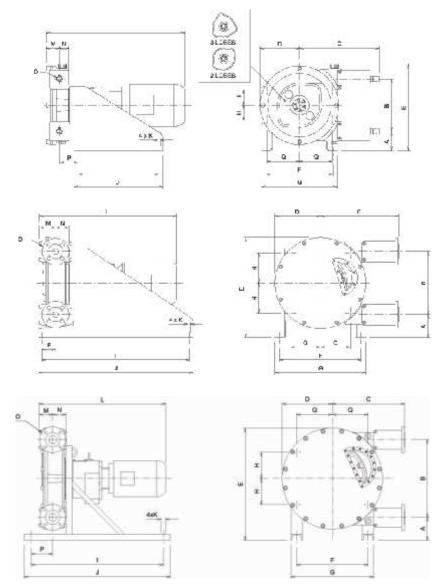


| Pulsation dampener type: | Hose Pump type: |
|--------------------------|---------------------|
| ALHP40 | B25, B32, B40, BX40 |
| ALHP50 | B50, B65 |
| ALHP100 | B100, BX80, B80 |
| ALHP125 | B125 |

B 05 B 10 B 15 B 20

> B 25 B 32 B 40

BX 40 B 65 BX 80 B 80 B 100 B 125



| 1 | | _ | | | _ | | _ | | | | | | | | | | | |
|-------|-------|------|--------|--------------|-----|-------|------|------|-------|------|------|------|---|-------|------|-----------|------|-----|
| Type | Α | В | C (BA) | C (B) | D | E | F | G | Н | 1 | J | K | L | М | N | 0 | Р | Q |
| B 05 | 103.5 | 115 | 196 | 225.5 | 95 | 271 | 220 | 240 | 33.5 | 260 | 280 | 4X9 | - | 43.5 | 34.5 | 16Hose | 64.5 | 81 |
| B 10 | 103.5 | 115 | 196 | 225.5 | 95 | 271 | 220 | 240 | 33.5 | 260 | 280 | 4X9 | - | 43.5 | 34.5 | 16Hose | 64.5 | 81 |
| B 15 | 73 | 193 | 259 | 296 | 145 | 322 | 250 | 280 | 51.5 | 300 | 330 | 4x13 | - | 49 | 35.5 | 20Hose | 70.5 | 125 |
| B 20 | 73 | 193 | 259 | 296 | 145 | 322 | 250 | 280 | 51.5 | 300 | 330 | 4x13 | - | 49 | 35.5 | 25Hose | 70.5 | 125 |
| B 25 | 95 | 262 | 311 | 355.5 | 190 | 416 | 312 | 352 | 110 | 560 | 600 | 4x13 | - | 65 | 69 | DN25PN16 | 69 | 110 |
| B 32 | 122.5 | 330 | 382.5 | 435.5 | 238 | 525.5 | 426 | 476 | 157.5 | 770 | 810 | 4X13 | - | 83 | 89 | DN32PN16 | 91 | 158 |
| B 40 | 122.5 | 330 | 382.5 | 435.5 | 238 | 525.5 | 426 | 476 | 157.5 | 770 | 810 | 4X13 | - | 83 | 89 | DN40PN16 | 91 | 158 |
| BX 40 | 110 | 430 | 416 | 400 | 291 | 616 | 340 | 420 | 170 | 850 | 950 | 4x19 | - | 73 | 88 | DN40PN16 | 87 | 170 |
| B 50 | 164.5 | 554 | 455 | 517.5 | 360 | 801.5 | 513 | 593 | 186.5 | 950 | 1050 | 4X19 | - | 97.5 | 102 | DN50PN16 | 162 | 257 |
| B 65 | 164.5 | 554 | 455 | 517.5 | 360 | 801.5 | 513 | 593 | 186.5 | 950 | 1050 | 4X19 | - | 97.5 | 102 | DN65PN16 | 162 | 257 |
| BX 80 | 158 | 746 | 584 | 604 | 473 | 1004 | 580 | 680 | 290 | 1150 | 1250 | 4X19 | - | 129 | 133 | DN80PN16 | 167 | 290 |
| B 80 | 262 | 876 | 733 | 803 | 555 | 1320 | 690 | 830 | 345 | 1300 | 1400 | 4X27 | - | 140.5 | 145 | DN80PN16 | 210 | 345 |
| B 100 | 300 | 1040 | 820 | 887 | 685 | 1575 | 820 | 960 | 410 | 1900 | 2000 | 4X27 | - | 170 | 174 | DN100PN16 | 361 | 410 |
| B 125 | 263.5 | 1273 | 958 | 1038 | 785 | 1750 | 1000 | 1140 | 500 | 1900 | 2000 | 4X27 | - | 300 | 232 | DN125PN16 | 660 | 500 |

Base frames B 05 to B40 are zinc plated Bx40 to B125 in Channel iron. Dimensions can vary slightly when using standard Channel iron available. Standard flanges DIN PN16 (ASME 150# available on request). Series B is with extra long flange bracket & inserts. Dimension L is subject to the geared motor fitted.



Unit 2, 36 Plantation Road, Eastleigh, Edenvale PO Box 1199, Edenvale 1610 Tel: +27 11 609 1940 • Fax: +27 11 452 7821

E-mail : sales@brubin.co.za Web : www.brubin.co.za

| CONTACT | YOUR | DISTRIB | UTOR: |
|---------|------|---------|-------|