

N1000 Series Bronze Pedestal Rotary Gear Pumps



Features

- 1/4" NPT Ports
- Bronze corrosion resistant castings
- Special cast bronze gears
- Stainless steel shafts & fasteners
- Formed ring seal packing, lip seals or mechanical seals are available
- Heavy duty carbon bearings (self lubricating)
- Positive displacement flow

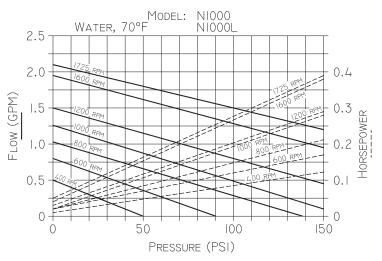
Liquids and Temperature

Service life will be increased substantially if the liquid pumped is clean and has some degree of lubricity. These positive displacement pumps have tight tolerances. Fine abrasives like sand, silt, or powders in suspension will accelerate pump wear and reduce throughput.

Liquids compatible with bronze and stainless steel can be pumped providing proper seal has been specified (see chemical compatibility or check factory). No carbon bearings used. When possible, flush the pump after each usage.

Performance

Capacity Water 70° F



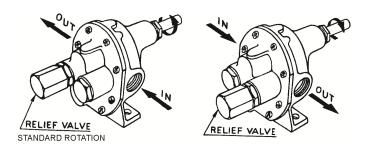
Temperature extremes are detrimental to service life and should be avoided. Basic metals of construction allow a temperature range of -40° to 400°F. Some lip seal elastomers have a limit of 212°F. (see engineering data or check factory). Allowing a liquid to freeze in the pump can cause damage.

By-Pass and Rotation

The pump by-pass is not intended to be a metering or flow control device. Its main purpose is to function as a pres-sure relief when the desired set point is exceeded, over-heating can occur within 5-10 minutes if the discharge line is completely shut off for extended periods.

Reversing rotation reverses the "IN" and "OUT" ports and the location of the by-pass ports have to be reversed.

The by-pass valve is factory set at 50 PSI. To increase the setpoint, turn the by-pass valve adjusting screw in a clock-wise direction.





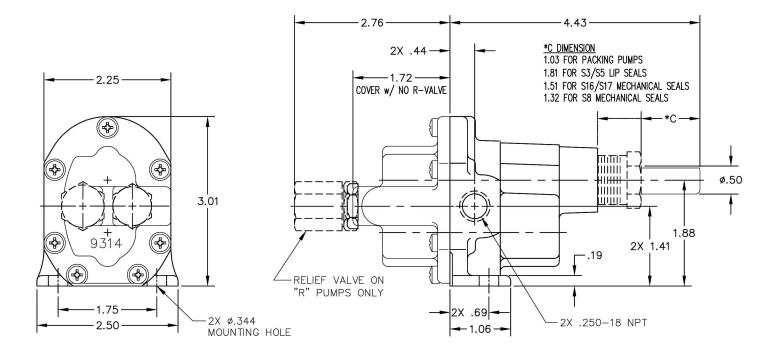
Suction Lift

Close tolerances and the positive pumping action make the rotary gear pump capable of lifting water on the suction side as high as 20 feet. Though gear pumps are self priming, a foot valve is recommended. If possible, wet the gears with liquid to be pumped for the first dry start. Liquid retained in the system and gear chambers serves to "wet" the pump on subsequent starts.

Drive

Either direct drive with flexible coupling or pulley drive can be used. Make sure both flexible coupling halves are properly aligned. When using a pulley, do not overtighten the belt. Also, to absorb belt side thrust at higher pressures and larger size pumps, an external ball bearing support is recommended - consult factory.

Dimensions





Parts List

	Seal Arrangement	1		2	3	4	5	6	7	8	9	10	- 11	12	13	14
		Packnut or Retaining Ring	Packing	Seal	Body	Bearing	Drive Gear Assy	Idle Gear Assy	O-Ring	Cover	Screw	Ball	Plug Nut	Spring	Adjust. Screw	Locknut
Model		Qty. 1	Qty. 2	Qty. 1	Qty. 1	Qty. 4	Qty. 1	Qty. 1	Qty. 1	Qty. 1	Qty. 7	Qty. 1	Qty. 1	Qty. 1	Qty. 1	Qty. 1
OBN1000	Packing	OB1892	OB5481	NA	OB 9311NB1N	OB5024	OB32101	OB32110	OB9797-033	OB 9314NN5N	OB5385	NA	NA	NA	NA	NA
OBN1000S3	NBR Lip	NA	NA	OB5007	OB 9311NB2N	OB5024	OB32101	OB32110	OB9797-033	OB 9314NN5N	OB5385	NA	NA	NA	NA	NA
OBN1000S5	FKM Lip	NA	NA	OB7580	OB 9311NB2N	OB5024	OB32101	OB32110	OB9797-033	OB 9314NN5N	OB5385	NA	NA	NA	NA	NA
OBN1000S16	NBR Bellows Mech.	OB7639	NA	OB32584	OB 9370NB4N	OB5024	OB32687	OB32110	OB9797-033	OB 9314NN5N	OB5385	NA	NA	NA	NA	NA
OBN1000S17	FKM Bellows Mech.	OB7639	NA	OB32585	OB 9370NB4N	OB5024	OB32687	OB32110	OB9797-033	OB 9314NN5N	OB5385	NA	NA	NA	NA	NA
OBN1000S8	PTFE Wedge Mech.	OB7639	NA	OB32335	OB 9370NB6N	OB5024	OB32687	OB32110	OB9355-033	OB 9314NN5N	OB5385	NA	NA	NA	NA	NA
Relief Valve Versions: OBN1000R, OBN1000RS3, OBN1000RS5, OBN1000RS16, OBN1000S17, OBN1000S8									OB 9314NN5B		OB5809	OB5775R	OB5806	OB5766	OB5774E	

