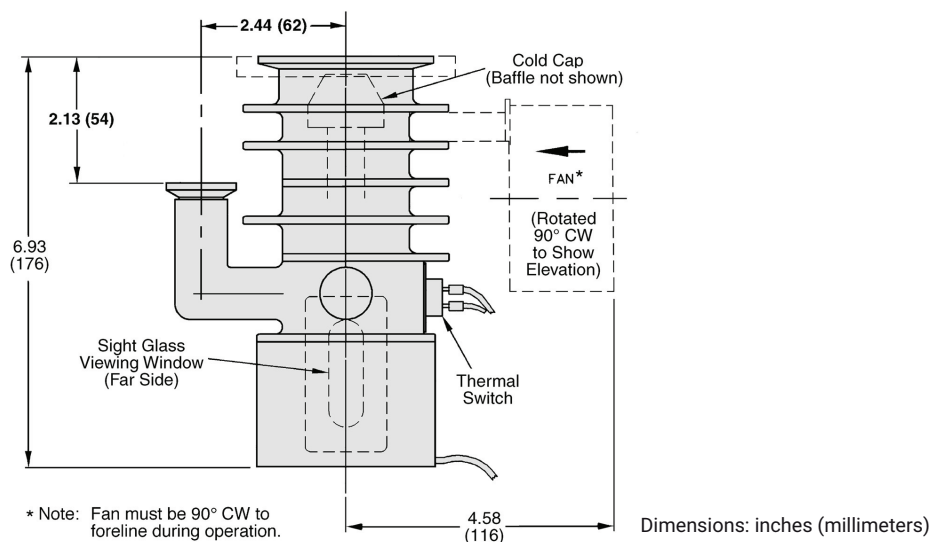


AX-65 Oil Diffusion Pump



Download 3d drawings [here](#).

The Agilent AX-65 oil diffusion pump is the smallest diffusion pump available in the market and our only pump that is air-cooled. Its vertical finned boiler and high power provide stable pumping and high helium pumping speed. This pump can be ordered with a cold cap or more optically dense halo baffle. AX-65 oil diffusion pumps include a fluid level sight glass for easy monitoring.

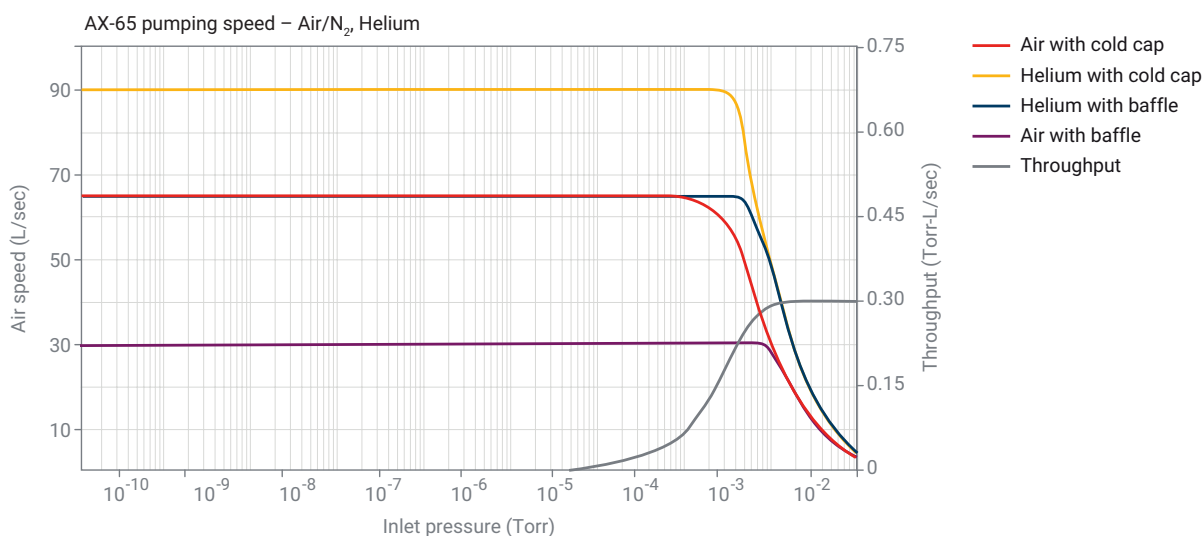
This diffusion pump is an excellent fit for instrumentation applications such as gas chromatography mass spectrometry (GC/MS), short path distillation systems, and centrifuges.

Technical specifications

Pumping Speed, Operating Range	65 L/sec air, 90 L/s He and H ₂
Maximum Throughput	0.19 T-L/s (0.25 mbar-L/s) in operating range, 0.30 T-L/s (0.40 mbar-L/s) at 0.01 Torr
Compression Ratio	4×10^7 (air), 2×10^6 (helium)
Operating Range	3×10^{-3} to $<5 \times 10^{-8}$ Torr (3.9×10^{-3} to 6.5×10^{-8} mbar)
Maximum Forepressure	No load: 0.75 Torr (1.00 mbar) Full load: 0.60 Torr (0.78 mbar)
Backstreaming Rate	With cold cap: $<2 \times 10^{-4}$ mg/cm ² /min With baffle: $<2 \times 10^{-5}$ mg/cm ² /min
Recommended Backing Pump	≥ 1.5 cfm (2.5 m ³ /hr)
Warmup Time	7 minutes
Cooldown Time	10 minutes
Fluid Charge	30 cc
Electrical Requirements	1 ph, 50/60 Hz, 90/115/165/220 VAC
Pump Power	200/250 watts
Air Cooling	30 cfm
Recommended Holding Pump*	DS40M Rotary Vane Pump

* Recommended holding pump sizes are based on estimates; assuming good vacuum practice in system design and operation. Results may vary from system to system.

Performance specifications based on tests done with DC704.



Ordering information

Description	Weight kg (lb)	Part Number	
		NW50	ISO-63
AX-65 With Standard Cold Cap, 115 V, 250 W	3.6 (8.0)	L9670301	L9707301
AX-65 With Internal Baffle, 115 V, 250 W	3.6 (8.0)	L9670311	L9707311
AX-65 With Standard Cold Cap, 220 V, 250 W	3.6 (8.0)	L9670302	L9707302
AX-65 With Internal Baffle, 220 V, 250 W	3.6 (8.0)	L9670312	L9707312
AX-65 With Standard Cold Cap, 115 V, 200 W	3.6 (8.0)	L9670303	L9707303
AX-65 With Internal Baffle, 115 V, 200 W	3.6 (8.0)	L9670313	L9707313
AX-65 With Standard Cold Cap, 220 V, 200 W	3.6 (8.0)	L9670304	L9707304
AX-65 With Internal Baffle, 220 V, 200 W	3.6 (8.0)	L9670314	L9707314
AX-65 With Standard Cold Cap, 90 V, 250 W	3.6 (8.0)	L9670305	L9707305
AX-65 With Internal Baffle, 90 V, 250 W	3.6 (8.0)	L9670315	L9707315
AX-65 With Standard Cold Cap, 165 V, 250 W	3.6 (8.0)	L9670306	L9707306
AX-65 With Internal Baffle, 165 V, 250 W	3.6 (8.0)	L9670316	L9707316

- All pumps have NW16 foreline.
- Mounted cooling fan included with each pump (p/n 661300138).
- Overtemperature thermal switch set to open at 365 °F (182 °C).
- Use 250 W heater with polyphenyl ether fluids (such as Santovac 5). Use 200 W heater for other fluids.

Description	Weight kg (lb)	Part Number
Accessories		
Santovac 5 Diffusion Pump Fluid, 40 cc	0.5 (1.0)	695405001
Santovac 5 Diffusion Pump Fluid, 65 cc	0.9 (2.0)	695405002
Internal Baffle Kit	0.9 (2.0)	R1160065
Centering Ring for Inlet Flange, NW50	0.5 (1.0)	0100-1884
Centering Ring for Inlet Flange, ISO-63	0.2 (0.5)	IC063SV
Centering Ring for Foreline Flange, NW16	0.2 (0.5)	KC16SB
Replacement Parts (One Heater Harness Required Per Pump)		
200 W, 115 V Heater Harness (for use with DC-704 and DC-702 or Equivalents)	0.5 (1.0)	L9994307
250 W, 115 V Heater Harness (for use with DC-705/or Equivalent and Santovac 5)	0.5 (1.0)	L9994303
200 W, 220 V Heater Harness (for use with DC-704 and DC-702 or Equivalents)	0.5 (1.0)	L9994308
250 W, 220 V Heater Harness (for use with DC-705/or Equivalent and Santovac 5)	0.5 (1.0)	L9994304
250 W, 90 V Heater Harness (for use with DC-705/or Equivalent and Santovac 5)	0.5 (1.0)	L9994301
250 W, 165 V Heater Harness (for use with DC-705/or Equivalent and Santovac 5)	0.5 (1.0)	L9994302
Overtemperature Thermal Switch (Included with Each Heater Harness)	0.5 (1.0)	L9964001
Pump Ready Thermal Switch (Optional)	0.5 (1.0)	L9964002

www.agilent.com/en/product/vacuum-technologies/diffusion-pumps/small-diffusion-pumps/ax-65-diffusion-pump

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