

Series P Geared-drive Prismatic-column Drills

With Electromagnetic Clutch Automatic Feed Control

The P series Industrial Drilling Machines are built with an extra heavy-duty base and worktable to handle large and heavy work pieces.

Standard Features and Equipment:

- Drilling capacity in steel: 2.75" (70mm) maximum
- Drilling capacity in cast iron: 3.14" (80mm) maximum
- Tapping capacity in steel: 2.51" (64mm) maximum
- Tapping capacity in cast iron: 2.68" (68mm) maximum
- Automatic feed reversing system for tapping on "RS" models
- Adjustable vertical position of head by geared-motor
- Large worktable with 3 T-slots
- Hardened and ground high quality steel gears
- Gear box lubrication by automatic pump
- Guide ways lubricated by manual pump
- Speed plate and selecting levers on front of head
- Coolant tank and pump in machine base
- Automatic feed and cut-off by electromagnetic clutch
- Work light
- Front hand wheel for fine feed work
- Depth scale and adjustable depth stop
- Built-in low voltage electrical equipment in column rear
- Emergency STOP
- Automatic tool ejector
- Forward and reverse turn push buttons
- Drill guard with microswitch

Optional Equipment:

- Automatic pitch control tapping with single speed brake motor
- Automatic pitch control tapping with pneumatic rapid approach
- Master guide spindle and nut set for automatic pitch control tapping
- Pneumatic counterbalance with rapid approach and retract
- Pneumatic counterbalance with rapid approach and retract for tube and and profile drilling
- Pneumatic counterbalance with rapid approach and retract with pitch controlled tapping
- 50% lower feed range
- Mechanical spotface device
- Pneumatic counterbalance
- Multi-spindle head guide rod
- Union, dragging cone and assembly for multi-spindle head
- START-STOP and emergency STOP pendent control
- Pendant control panel with all functions
- Cross slide table
- ISO-40 spindle with quick change nut (models BP-40,50,70)
- ISO-50 spindle with quick change nut (models BP-70 only)



BP-70L



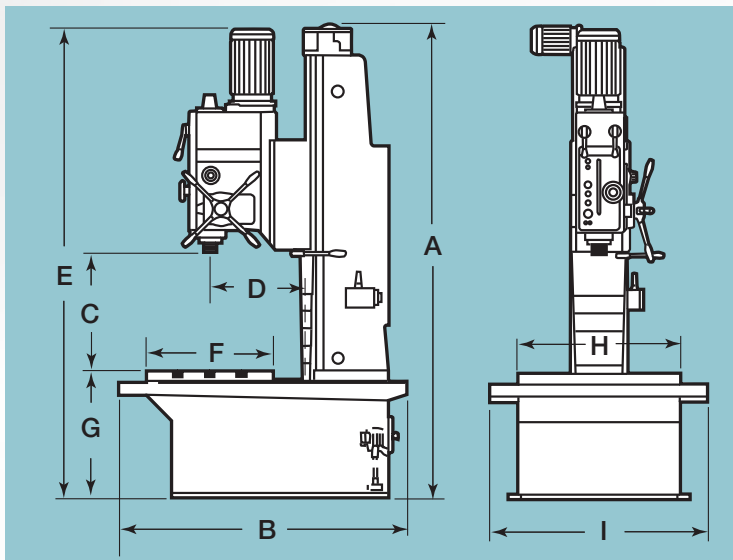
All Series P models are supplied with side protection panels with front doors except those equipped with a cross table.



View of left side of machine head showing lifting equipment, stroke microswitches and automatic lubrication pump for the guides.

Capacities, Specifications and Dimensions

Standard Models Auto feed reversing for tapping Models	BP-40 BP-40RS	BP-50/50L BP-50RS/50LRS	BP-70/70L BP-70RS/70LRS
Capacities:			
Maximum drilling capacity in steel	1.57" (40mm)	1.97" (50mm)	2.76" (70mm)
Maximum drilling capacity in cast iron	1.97" (50mm)	2.36" (60mm)	3.14" (80mm)
Maximum tapping capacity in steel	1.30" (33mm)	1.65" (42mm)	2.51" (64mm)
Maximum tapping capacity in cast iron	1.57" (40mm)	1.97" (50mm)	2.68" (68mm)
Specifications:			
Spindle taper	4MT	4MT	5MT
Spindle taper (optional upon request)	ISO-30	ISO-40	ISO-40/50
Quill diameter	2.95" (75mm)	3.46" (88mm)	3.54" (90mm)
Spindle travel (drilling depth)	7.87" (200mm)	9.06" (230mm)	10.24" (260mm)
Main motor power	3 Hp (2.2Kw)	5.5 Hp (4Kw)	10 Hp (7.3Kw)
Coolant pump motor power	.12 Hp (.09Kw)	.12 Hp (.09Kw)	.12 Hp (.09Kw)
Head geared-motor power	1 Hp (.7Kw)	1.5 Hp (1.1Kw)	1.5 Hp (1.1Kw)
Number of speed (see speed charts)	9	9	12
Number of automatic feeds	3	6	6
Auto feed range in./rev. (mm/rev)	.0039/.0079/.0118 (1/2/.3)	.0039/.0079/.118/.157/.197/.236 (1/2/.3/.4/.5/.6)	
Dimensions and Weights			
Height (A)	85.8" (2180mm)	97.2"/122.8" (2470/3120mm)	103.1"/122.8" (2620/3120mm)
Base length (B)	52" (1320mm)	55.9"/58.6" (1420/1490mm)	62.6"/64.6" (1590/1640mm)
Spindle to Table (C)			
Minimum	7.09" (180mm)	11.02"/25.6" (280/650mm)	9.06"/23.6" (230/6000mm)
Maximum	33.07" (840mm)	39.4"/64.9" (1000/1650mm)	43.3"/63" (1100/1600mm)
Spindle center to column (D)	15.75" (400mm)	18.7" (475mm)	20.67" (525mm)
Maximum head height (E)	96.5" (2550mm)	108.3"/133.9" (2750/3400mm)	120.1"/139.8" (3050/3550mm)
Worktable width (F)	19.69" (500mm)	23.62" (600mm)	27.56" (700mm)
Table height (G)	27.56" (700mm)	27.56" (700mm)	27.56" (700mm)
Worktable length (H)	23.62" (600mm)	27.56" (700mm)	35.43" (900mm)
Overall width (I)	35.43" (900mm)	39.37" (1000mm)	47.24" (1200mm)
Net weight	2,425 lbs (1100Kg)	3,086/3,527 lbs (1400/1600Kg)	4,078/4,629 lbs (1850/2100Kg)
Shipping weight	2,866 lbs (1300Kg)	3,527/4,078 lbs (1600/1850Kg)	4,630/5,291 lbs (2100/2400Kg)
Shipping dimension (length x width x height)	40" x 55" x 91" (1x1.4x2.3m)	48" x 107"/130" x 79" (1.2x2.7/3.3x2m)	56" x 111"/130" x 79" (1.4x2.8/3.3x2m)



“RS” models are equipped with automatic feed reversing system for tapping.

Standard motor:

1800 rpm

Model	Spindle speeds (rpm)
BP-40	95-135-190
	267-380-534
	750-1065-1500
BP-50/50L	66-91-133
	206-288-418
	617-866-1255
BP-70/70L	62-81-104-133
	191-250-321-410
	532-683-878-1120

Optional spindle motors

Model	Motor	Speed range
BP-40	1200 rpm	63-1000 rpm
BP-40	3600 rpm	190-3000 rpm
BP-40	900/1800 rpm	47-1500 rpm
BP-40	1800-3600 rpm	95-3000 rpm
BP-50/50L	1200 rpm	46-878 rpm
BP-50/50L	3600 rpm	132-2510 rpm
BP-50/50L	900/1800 rpm	33-1255 rpm
BP-50/50L	1800-3600 rpm	33-2510 rpm
BP-70/70L	1200 rpm	40-748 rpm
BP-70/70L	3600 rpm	124-2440 rpm
BP-70/70L	900/1800 rpm	31-1120 rpm
BP-70/70L	1800-3600 rpm	62-2240 rpm