

## Compressed Air Distribution (Systems)



**Table 4.1** Air Requirements of Various Tools

Tool	Free Air, cfm at 90 psig, 100% Load Factor
Grinders, 6" and 8" wheels	50
Grinders, 2" and 2 1/2" wheels	14-20
File and burr machines	18
Rotary sanders, 9" pads	53
Rotary sanders, 7" pads	30
Sand rammers and tampers,	
1" x 4" cylinder	25
1 1/4" x 5" cylinder	28
1 1/2" x 6" cylinder	39
Chipping hammers, weighing 10-13 lb	28-30
Heavy	39
Weighing 2-4 lb	12
Nut setters to 5/16" weighing 8 lb	20
Nut setters 1/2" to 3/4" weighing 18 lb	30
Sump pumps, 145 gal (a 50-ft head)	70
Paint spray, average	7
Varies from	2-20
Bushing tools (monument)	15-25
Carving tools (monument)	10-15
Plug drills	40-50
Riveters, 3/32"-1" rivets	12
Larger weighing 18-22 lb	35
Rivet busters	35-39
Wood borers to 1" diameter weighing 4 lb	40
2" diameter weighing 26 lb	80
Steel drills, rotary motors	
Capacity up to 1/4" weighing 1 1/4-4 lb	18-20
Capacity 1/4" to 3/8" weighing 6-8 lb	20-40
Capacity 1/2" to 3/4" weighing 9-14 lb	70
Capacity 7/8" to 1" weighing 25 lb	80
Capacity 1 1/4" weighing 30 lb	95
Steel drills, piston type	
Capacity 1/2" to 3/4" weighing 13-15 lb	45
Capacity 7/8" to 1 1/4" weighing 25-30 lb	75-80
Capacity 1 1/4" to 2" weighing 40-50 lb	80-90
Capacity 2" to 3" weighing 55-75 lb	100-110