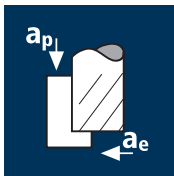


Application



Material

Wrought aluminium
Construction aluminium



| d1 [mm] | z | v _c [m/min] | f _s [mm] | a _p [mm] | a _e [mm] | n [min ⁻¹] | v _r [mm/min] | Q [cm ³ /min] |
|------------|---|---------------------------|------------------------|------------------------|------------------------|---------------------------|----------------------------|-----------------------------|
| 3.00 | 2 | 396 | 0.050 | 4.500 | 1.200 | 42015 | 4200 | 22.7 |
| 4.00 | 2 | 528 | 0.065 | 6.000 | 1.600 | 42015 | 5460 | 52.4 |
| 5.00 | 2 | 550 | 0.080 | 7.500 | 2.000 | 35015 | 5600 | 84.0 |
| 6.00 | 2 | 550 | 0.110 | 9.000 | 2.400 | 29180 | 6420 | 138.7 |
| 8.00 | 2 | 550 | 0.145 | 12.000 | 3.200 | 21885 | 6345 | 243.7 |
| 10.00 | 2 | 550 | 0.180 | 15.000 | 4.000 | 17505 | 6305 | 378.2 |
| 12.00 | 2 | 550 | 0.195 | 18.000 | 4.800 | 14590 | 5690 | 491.6 |
| 16.00 | 2 | 550 | 0.220 | 24.000 | 6.400 | 10940 | 4815 | 739.5 |
| 20.00 | 2 | 550 | 0.255 | 30.000 | 8.000 | 8755 | 4465 | 1071.4 |

Unalloyed copper



| | | | | | | | | |
|-------|---|-----|-------|--------|-------|-------|------|-------|
| 3.00 | 2 | 396 | 0.040 | 4.500 | 1.200 | 42015 | 3360 | 18.2 |
| 4.00 | 2 | 400 | 0.050 | 6.000 | 1.600 | 31830 | 3185 | 30.6 |
| 5.00 | 2 | 400 | 0.065 | 7.500 | 2.000 | 25465 | 3310 | 49.7 |
| 6.00 | 2 | 400 | 0.090 | 9.000 | 2.400 | 21220 | 3820 | 82.5 |
| 8.00 | 2 | 400 | 0.115 | 12.000 | 3.200 | 15915 | 3660 | 140.6 |
| 10.00 | 2 | 400 | 0.145 | 15.000 | 4.000 | 12730 | 3690 | 221.5 |
| 12.00 | 2 | 400 | 0.155 | 18.000 | 4.800 | 10610 | 3290 | 284.2 |
| 16.00 | 2 | 400 | 0.175 | 24.000 | 6.400 | 7960 | 2785 | 427.8 |
| 20.00 | 2 | 400 | 0.205 | 30.000 | 8.000 | 6365 | 2610 | 626.4 |

Thermoplastics



| | | | | | | | | |
|-------|---|------|-------|--------|-------|-------|-------|--------|
| 3.00 | 2 | 396 | 0.050 | 4.500 | 1.200 | 42015 | 4200 | 22.7 |
| 4.00 | 2 | 528 | 0.065 | 6.000 | 1.600 | 42015 | 5460 | 52.4 |
| 5.00 | 2 | 660 | 0.080 | 7.500 | 2.000 | 42015 | 6725 | 100.8 |
| 6.00 | 2 | 792 | 0.110 | 9.000 | 2.400 | 42015 | 9245 | 199.7 |
| 8.00 | 2 | 1000 | 0.145 | 12.000 | 3.200 | 39790 | 11540 | 443.1 |
| 10.00 | 2 | 1000 | 0.180 | 15.000 | 4.000 | 31830 | 11460 | 687.5 |
| 12.00 | 2 | 1000 | 0.195 | 18.000 | 4.800 | 26525 | 10345 | 893.8 |
| 16.00 | 2 | 1000 | 0.220 | 24.000 | 6.400 | 19895 | 8755 | 1344.5 |
| 20.00 | 2 | 1000 | 0.255 | 30.000 | 8.000 | 15915 | 8115 | 1948.1 |

Cast aluminium



| | | | | | | | | |
|-------|---|-----|-------|--------|-------|-------|------|-------|
| 3.00 | 2 | 396 | 0.050 | 4.500 | 1.200 | 42015 | 4200 | 22.7 |
| 4.00 | 2 | 440 | 0.065 | 6.000 | 1.600 | 35015 | 4550 | 43.7 |
| 5.00 | 2 | 440 | 0.080 | 7.500 | 2.000 | 28010 | 4480 | 67.2 |
| 6.00 | 2 | 440 | 0.110 | 9.000 | 2.400 | 23345 | 5135 | 110.9 |
| 8.00 | 2 | 440 | 0.145 | 12.000 | 3.200 | 17505 | 5075 | 195.0 |
| 10.00 | 2 | 440 | 0.180 | 15.000 | 4.000 | 14005 | 5040 | 302.5 |
| 12.00 | 2 | 440 | 0.195 | 18.000 | 4.800 | 11670 | 4550 | 393.3 |
| 16.00 | 2 | 440 | 0.220 | 24.000 | 6.400 | 8755 | 3850 | 591.6 |
| 20.00 | 2 | 440 | 0.255 | 30.000 | 8.000 | 7005 | 3570 | 857.1 |

Wrought aluminium
Construction aluminium



| | | | | | | | | |
|-------|---|-----|-------|--------|--------|-------|------|-------|
| 3.00 | 2 | 396 | 0.035 | 2.100 | 3.000 | 42015 | 2940 | 18.5 |
| 4.00 | 2 | 450 | 0.045 | 2.800 | 4.000 | 35810 | 3225 | 36.1 |
| 5.00 | 2 | 450 | 0.055 | 3.500 | 5.000 | 28650 | 3150 | 55.1 |
| 6.00 | 2 | 450 | 0.075 | 4.200 | 6.000 | 23875 | 3580 | 90.2 |
| 8.00 | 2 | 450 | 0.100 | 5.600 | 8.000 | 17905 | 3580 | 160.4 |
| 10.00 | 2 | 450 | 0.125 | 7.000 | 10.000 | 14325 | 3580 | 250.7 |
| 12.00 | 2 | 450 | 0.135 | 8.400 | 12.000 | 11935 | 3225 | 324.9 |
| 16.00 | 2 | 450 | 0.155 | 11.200 | 16.000 | 8950 | 2775 | 497.3 |
| 20.00 | 2 | 450 | 0.180 | 14.000 | 20.000 | 7160 | 2580 | 721.9 |

Unalloyed copper



| | | | | | | | | |
|-------|---|-----|-------|--------|--------|-------|------|-------|
| 3.00 | 2 | 350 | 0.030 | 2.100 | 3.000 | 37135 | 2230 | 14.0 |
| 4.00 | 2 | 350 | 0.035 | 2.800 | 4.000 | 27850 | 1950 | 21.8 |
| 5.00 | 2 | 350 | 0.045 | 3.500 | 5.000 | 22280 | 2005 | 35.1 |
| 6.00 | 2 | 350 | 0.060 | 4.200 | 6.000 | 18570 | 2230 | 56.1 |
| 8.00 | 2 | 350 | 0.080 | 5.600 | 8.000 | 13925 | 2230 | 99.8 |
| 10.00 | 2 | 350 | 0.100 | 7.000 | 10.000 | 11140 | 2230 | 156.0 |
| 12.00 | 2 | 350 | 0.110 | 8.400 | 12.000 | 9285 | 2040 | 205.9 |
| 16.00 | 2 | 350 | 0.125 | 11.200 | 16.000 | 6965 | 1740 | 311.9 |
| 20.00 | 2 | 350 | 0.145 | 14.000 | 20.000 | 5570 | 1615 | 452.3 |

Thermoplastics



| | | | | | | | | |
|-------|---|-----|-------|--------|--------|-------|------|--------|
| 3.00 | 2 | 396 | 0.035 | 2.100 | 3.000 | 42015 | 2940 | 18.5 |
| 4.00 | 2 | 528 | 0.045 | 2.800 | 4.000 | 42015 | 3780 | 42.4 |
| 5.00 | 2 | 660 | 0.055 | 3.500 | 5.000 | 42015 | 4620 | 80.9 |
| 6.00 | 2 | 792 | 0.075 | 4.200 | 6.000 | 42015 | 6305 | 158.8 |
| 8.00 | 2 | 800 | 0.100 | 5.600 | 8.000 | 31830 | 6365 | 285.2 |
| 10.00 | 2 | 800 | 0.125 | 7.000 | 10.000 | 25465 | 6365 | 445.6 |
| 12.00 | 2 | 800 | 0.135 | 8.400 | 12.000 | 21220 | 5730 | 577.5 |
| 16.00 | 2 | 800 | 0.155 | 11.200 | 16.000 | 15915 | 4935 | 884.1 |
| 20.00 | 2 | 800 | 0.180 | 14.000 | 20.000 | 12730 | 4585 | 1283.4 |

Cast aluminium



| | | | | | | | | |
|-------|---|-----|-------|--------|--------|-------|------|-------|
| 3.00 | 2 | 360 | 0.035 | 2.100 | 3.000 | 38195 | 2675 | 16.8 |
| 4.00 | 2 | 360 | 0.045 | 2.800 | 4.000 | 28650 | 2580 | 28.9 |
| 5.00 | 2 | 360 | 0.055 | 3.500 | 5.000 | 22920 | 2520 | 44.1 |
| 6.00 | 2 | 360 | 0.075 | 4.200 | 6.000 | 19100 | 2865 | 72.2 |
| 8.00 | 2 | 360 | 0.100 | 5.600 | 8.000 | 14325 | 2865 | 128.3 |
| 10.00 | 2 | 360 | 0.125 | 7.000 | 10.000 | 11460 | 2865 | 200.5 |
| 12.00 | 2 | 360 | 0.135 | 8.400 | 12.000 | 9550 | 2580 | 259.9 |
| 16.00 | 2 | 360 | 0.155 | 11.200 | 16.000 | 7160 | 2220 | 397.9 |
| 20.00 | 2 | 360 | 0.180 | 14.000 | 20.000 | 5730 | 2065 | 577.5 |