

A Aluminum Cutting Data Recommendations

| APPLICATION | GOOD | BETTER | BEST |
|------------------|-------------|-------------|-------------|
| BLOCK | | | |
| Single Pass | 63-600 | AMC 2 Flute | AMC 3 Flute |
| Roughing | AMC 2 Flute | AMC 3 Flute | AMC Rougher |
| Finishing | | 66-300 | AMC |
| Slotting | 63-600 | AMC 2 Flute | AMC 3 Flute |
| Profile/Shape | | 52-200B | AMC |
| SHEET | | | |
| Single Pass | 61-000 | 65-000 | 63-600 |
| EXTRUSION | | | |
| Single Pass | 63-600 | 81-000 | 81-100 |

DEPTH OF CUT: 1 x D Use recommended chip load
 2 x D Reduce chip load by 25%
 3 x D Reduce chip load by 50%

To view our complete line of **AMC Tools**, reference our **Milling Tools Catalog** which is available at www.onsrud.com

| Recommended Chip Load per Tooth by Cutting Diameter (in) | | | | | | | | | | | | | | | | | | | | | | | |
|--|--------|-----------|------|-----------|------|-----------|------|-----------|-----------|-----------|------|-----------|------|-----------|-----------|-----|---|-------|-------|-------|-------|---|--|
| Series | Cut | 1/16 | 3/32 | 1/8 | 5/32 | 3/16 | 7/32 | 1/4 | 5/16 | 3/8 | 7/16 | 1/2 | 9/16 | 5/8 | 3/4 | 7/8 | 1 | 1 1/8 | 1 1/4 | 1 1/2 | 1 3/4 | 2 | |
| 37-00/37-20 | Varies | | | | | | | .004-.006 | | | | | | | | | | | | | | | |
| 37-70 | Varies | | | | | | | .004-.006 | | | | | | | | | | | | | | | |
| 40-000* | 1 x D | | | .005-.007 | | .005-.007 | | .006-.008 | .006-.008 | .007-.009 | | | | | | | | | | | | | |
| 40-100 | 1 x D | | | .001-.003 | | .001-.003 | | .002-.004 | .002-.004 | .003-.005 | | .004-.008 | | | .006-.008 | | | | | | | | |
| 49-000 | 1 x D | | | .001-.003 | | | | | | .003-.005 | | | | | | | | | | | | | |
| 52-000 | 1 x D | | | .003-.005 | | .003-.005 | | .004-.006 | | .006-.008 | | .010-.012 | | | | | | | | | | | |
| 52-200B/BL | 1 x D | .002-.004 | | .003-.005 | | .003-.005 | | .004-.006 | | .006-.008 | | .010-.012 | | .012-.014 | .014-.016 | | | | | | | | |
| 57-000* | 1 x D | | | .003-.005 | | .003-.005 | | .004-.006 | | .006-.008 | | .010-.012 | | | | | | | | | | | |
| 61-000 | 1 x D | | | .001-.003 | | .002-.005 | | .002-.005 | | .003-.007 | | .007-.009 | | | | | | | | | | | |
| 62-600 | 1 x D | .002-.004 | | .002-.004 | | .003-.006 | | .003-.006 | .003-.006 | .004-.008 | | .008-.010 | | | | | | | | | | | |
| 63-000 | 1 x D | | | .006-.008 | | .006-.008 | | .007-.009 | .007-.009 | .008-.010 | | .009-.011 | | | | | | | | | | | |
| 63-600 | 1 x D | .002-.004 | | .002-.004 | | .003-.006 | | .003-.006 | .003-.006 | .004-.008 | | .008-.010 | | | | | | | | | | | |
| 63-900 | 1 x D | .002-.004 | | .002-.004 | | .003-.006 | | .003-.006 | .003-.006 | .004-.008 | | .008-.010 | | | | | | | | | | | |
| 64-000/ 65-000 | 1 x D | .002-.004 | | .002-.004 | | .003-.006 | | .003-.006 | | .004-.008 | | | | | | | | | | | | | |
| 66-300 | 1 x D | | | .002-.004 | | | | .004-.006 | | .006-.008 | | .006-.008 | | | | | | | | | | | |
| 77-100 | 1 x D | | | .002-.004 | | | | .003-.005 | | | | | | | | | | | | | | | |
| 80-000 | 1 x D | | | .001-.003 | | | | | | | | | | | | | | | | | | | |
| 81-000 | 1 x D | | | | | | | | .004-.006 | .004-.006 | | | | | | | | | | | | | |
| 81-100 | 1 x D | | | | | | | | .002-.005 | .003-.008 | | .003-.008 | | | | | | | | | | | |

* 16,000 RPM

NOTE: When cutting soft aluminum a squirt of cutting fluid every now and then will help to eliminate chip rewelding and improve surface finish.

FORMULAS: Chip Load = Feed Rate / (RPM x # of cutting edges)
 Feed Rate (IPM) = RPM x # of cutting edges x chip load
 Speed (RPM) = Feed Rate / (# of cutting edges x chip load)

DEFINITIONS: IPM = Inches Per Minute