

MAC METALS MANUFACTURING & SHIPPING TOLERANCES

SOLID METAL DIMENSIONS (1)

DIMENSION IN INCHES	TOLERANCES FOR 300 & 400 SERIES ALLOYS	TOLERANCES FOR 600 & 700 SERIES ALLOYS
Up to .125"	+/- 0.010"	Not applicable
.126" — .500"	+/- 0.015"	+/- 0.020"
.501" — 1.000"	+/- 0.020"	+/- 0.025"
1.001 — 2.000"	+/- 0.025"	+/- 0.030"
2.001" — 3.000"	+/- 0.030"	+/- 0.035"
3.001" — 4.000"	+/- 0.035"	+/- 0.040"
4.001" — 5.000"	+/- 0.040"	+/- 0.050"
Over 5.000"	+/- 0.050"	+/- 0.060"

OPEN SPACE DIMENSION (2): Some Open Space Dimensions require a larger tolerances

BOW (STRAIGHTNESS): 1/8" per 6' section for product greater than 3/4" circumscribing circle. 1/4" per 6' section for product less than 3/4" circumscribing circle.

TWIST: +/- 1 degree per foot.

FLATNESS: +/- 0.007" per inch of width (0.0007" minimum).

ANGULARITY: +/- 1 degree.

MINIMUM RADII / FILLETS: 0.015" (Sharp Corner)

CUT END TOLERANCE: +1/4-0" length; +/-1 degree (from square).

SURFACE FINISH (3): Mill Finish Only. (See notes below).

TEMPER (4): M30 Hot Extruded.

STANDARD LENGTHS (5): Uniform Specified Lengths from 8 to 20'

SHIPPING TOLERANCES: [Click here to visit ordering and shipping information page.](#)

NOTES:

1. Tighter tolerances may be achieved by agreement at design stage. There may be a close tolerance pricing extra.
2. Certain Open Space dimensions may require a wider tolerance.
3. Surface Finish. Mac Metals supplies all extrusions in "mill finish" condition created by the extrusion and straightening processes. It is customary for the surface to have oxides, traces of graphite and superficial stains, scratches, handling marks, die lines and a thin layer of lubricant.
4. The standard temper designation for all Mac Metals extrusions is M30, also referred as "As Hot Extruded". Our extrusions are not annealed, cold-drawn or heat-treated.
5. Lengths shorter than 8' will be subject to a pricing extra. Product weight may determine maximum length.
6. Exact quantity requirements are subject to a pricing extra.