

GENERAL AND TECHNICAL INFORMATION

SHEET AND PLATE – ALUMINUM

THICKNESS TOLERANCES ¹

ALLOYS 2014, 2024, 2219, 3004, 5052, 5083, 5086, 5154, 5252, 5254, 5454, 5456, 5652, 6061, 7075, 7079, 7178, AND BRAZING SHEET NOS. 11, 12, 21, 22, 23 AND 24.

STANDARD TOLERANCES

NOTE: ALSO APPLICABLE TO THE ALLOYS LISTED WHEN SUPPLIED AS ALCLAD.

| SPECIFIED THICKNESS Inches | SPECIFIED WIDTH – Inches | | | | | | | | | | | | | | |
|----------------------------|--------------------------|-----------------|-----------------|-----------------|-----------------|-----------------|-----------------|-----------------|-----------------|-----------------|-----------------|------------------|-------------------|-------------------|-------------------|
| | Up thru 18 | Over 18 thru 36 | Over 36 thru 48 | Over 48 thru 54 | Over 54 thru 60 | Over 60 thru 66 | Over 66 thru 72 | Over 72 thru 78 | Over 78 thru 84 | Over 84 thru 90 | Over 90 thru 96 | Over 96 thru 132 | Over 132 thru 144 | Over 144 thru 156 | Over 156 thru 168 |
| 0.006-0.010 | .0015 | .0025 | .0025 | .0025 | .004 | .004 | .004 | .006 | .006 | .007 | .009 | .011 | | | |
| 0.011-0.017 | .0015 | .0025 | .0035 | .0035 | .004 | .004 | .004 | .006 | .006 | .007 | .008 | .012 | .013 | | |
| 0.018-0.028 | .0015 | .0025 | .0035 | .0035 | .004 | .005 | .005 | .006 | .006 | .007 | .012 | .016 | .016 | | |
| 0.029-0.036 | .002 | .0025 | .004 | .004 | .005 | .005 | .005 | .006 | .006 | .008 | .016 | .018 | .020 | | |
| 0.037-0.045 | .002 | .0025 | .003 | .004 | .005 | .005 | .005 | .006 | .006 | .007 | .016 | .018 | .020 | | |
| 0.046-0.068 | .0025 | .004 | .004 | .005 | .006 | .006 | .006 | .007 | .007 | .008 | .012 | .016 | .018 | | |
| 0.077-0.096 | .0035 | .004 | .005 | .005 | .006 | .006 | .006 | .007 | .007 | .008 | .016 | .018 | .020 | | |
| 0.097-0.108 | .004 | .004 | .005 | .005 | .007 | .007 | .007 | .008 | .008 | .008 | .016 | .018 | .020 | | |
| 0.109-0.125 | .0045 | .005 | .005 | .005 | .007 | .007 | .007 | .008 | .008 | .008 | .016 | .018 | .020 | | |
| 0.126-0.140 | .0045 | .005 | .005 | .005 | .007 | .010 | .012 | .013 | .014 | .016 | .018 | .020 | .020 | | |
| 0.141-0.172 | .006 | .008 | .008 | .008 | .009 | .012 | .014 | .015 | .016 | .017 | .019 | .023 | .023 | | |
| 0.173-0.203 | .007 | .007 | .010 | .010 | .011 | .014 | .016 | .017 | .017 | .017 | .022 | .026 | .026 | | |
| 0.204-0.249 | .009 | .009 | .011 | .011 | .013 | .016 | .018 | .018 | .018 | .018 | .024 | .028 | .028 | | |
| 0.250-0.320 | .013 | .013 | .013 | .013 | .015 | .018 | .020 | .020 | .020 | .020 | .025 | .030 | .035 | .042 | .053 |

TOLERANCE – Inches Plus and Minus

SHEET AND PLATE – ALUMINUM
THICKNESS TOLERANCES ¹

STANDARD TOLERANCES
CONTINUED

ALLOYS 2014, 2024, 2219, 3004, 5052, 5083, 5086, 5154, 5252, 5254, 5454, 5456, 5652, 6061, 7075, 7079, 7178,
AND BRAZING SHEET NOS. 11, 12, 21, 22, 23 AND 24.

NOTE: ALSO APPLICABLE TO THE ALLOYS LISTED WHEN SUPPLIED AS ALCLAD.

| SPECIFIED THICKNESS Inches | SPECIFIED WIDTH – Inches | | | | | | | | | | | | | | |
|-------------------------------|--------------------------|--------------------------|--------------------------|--------------------------|--------------------------|--------------------------|--------------------------|--------------------------|--------------------------|--------------------------|--------------------------|---------------------------|----------------------------|----------------------------|----------------------------|
| | Up thru 18 | Over 18 thru 36 | Over 36 thru 48 | Over 48 thru 54 | Over 54 thru 60 | Over 60 thru 66 | Over 66 thru 72 | Over 72 thru 78 | Over 78 thru 84 | Over 84 thru 90 | Over 90 thru 96 | Over 96 thru 132 | Over 132 thru 144 | Over 144 thru 156 | Over 156 thru 168 |
| 0.321-0.438 | .019 | .019 | .019 | .019 | .020 | .020 | .023 | .023 | .025 | .025 | .026 | .033 | .038 | .048 | .057 |
| 0.439-0.625 | .025 | .025 | .025 | .025 | .025 | .025 | .030 | .030 | .030 | .030 | .035 | .035 | .043 | .049 | .067 |
| 0.626-0.875 | .030 | .030 | .030 | .030 | .030 | .030 | .037 | .037 | .037 | .037 | .045 | .045 | .054 | .059 | .077 |
| 0.876-1.125 | .035 | .035 | .035 | .035 | .035 | .035 | .045 | .045 | .045 | .045 | .055 | .055 | .065 | .070 | .088 |
| 1.126-1.375 | .040 | .040 | .040 | .040 | .040 | .040 | .052 | .052 | .052 | .052 | .065 | .065 | .075 | .080 | .098 |
| 1.376-1.625 | .045 | .045 | .045 | .045 | .045 | .045 | .060 | .060 | .060 | .060 | .075 | .075 | .085 | .090 | .108 |
| 1.626-1.875 | .052 | .052 | .052 | .052 | .052 | .052 | .070 | .070 | .070 | .070 | .088 | .088 | | | |
| 1.876-2.250 | .060 | .060 | .060 | .060 | .060 | .060 | .080 | .080 | .080 | .080 | .100 | .100 | | | |
| 2.251-2.750 | .075 | .075 | .075 | .075 | .075 | .075 | .100 | .100 | .100 | .100 | .125 | .125 | | | |
| 2.751-3.000 | .090 | .090 | .090 | .090 | .090 | .090 | .120 | .120 | .120 | .120 | .150 | .150 | | | |
| 3.001-4.000 | .110 | .110 | .110 | .110 | .110 | .110 | .140 | .140 | .140 | .140 | .160 | .160 | | | |
| 4.001-5.000 | .125 | .125 | .125 | .125 | .125 | .125 | .150 | .150 | .150 | .150 | .160 | .160 | | | |
| 5.001-6.000 | .135 | .135 | .135 | .135 | .135 | .135 | .160 | .160 | .160 | .160 | .170 | .170 | | | |

GENERAL AND TECHNICAL INFORMATION

GENERAL AND TECHNICAL INFORMATION

WIDTH TOLERANCES¹ SHEARED FLAT SHEET AND PLATE – ALUMINUM

| SPECIFIED THICKNESS Inches | SPECIFIED WIDTH – in. | | | | | | |
|-------------------------------|-----------------------|-------------------|--------------------|--------------------|---------------------|----------------------|-------|
| | Up thru 6 | Over 6 thru 24 | Over 24 thru 60 | Over 60 thru 96 | Over 96 thru 132 | Over 132 thru 168 | |
| | TOLERANCE 2 – in. | | | | | | |
| 0.006-0.124 | + 1/16 | + 3/32 | + 1/8 | + 1/8 | + 5/32 | + 3/16 | + 1/2 |
| 0.125-0.249 | + 3/32 | + 3/32 | + 1/8 | + 5/32 | + 3/16 | | |
| 0.250-0.499 | + 1/4 | + 5/16 | + 3/8 | + 3/8 | + 7/16 | | |

LENGTH TOLERANCES¹ SHEARED FLAT SHEET AND PLATE – ALUMINUM

| SPECIFIED THICKNESS Inches | SPECIFIED LENGTH – in. | | | | | | | | |
|-------------------------------|------------------------|--------------------|---------------------|----------------------|----------------------|----------------------|----------------------|----------------------|--|
| | Up thru 30 | Over 30 thru 60 | Over 60 thru 120 | Over 120 thru 240 | Over 240 thru 360 | Over 360 thru 480 | Over 480 thru 600 | Over 600 thru 720 | |
| | TOLERANCES 2-in. | | | | | | | | |
| 0.006-0.124 | + 1/16 | + 3/32 | + 1/8 | + 5/32 | + 3/16 | + 7/32 | + 9/32 | — | |
| 0.125-0.249 | + 3/32 | + 3/32 | + 1/8 | + 5/32 | + 7/32 | + 1/4 | + 5/16 | — | |
| 0.250-0.499 | + 1/4 | + 3/8 | + 7/16 | + 1/2 | + 9/16 | + 5/8 | + 11/16 | + 3/4 | |

WIDTH TOLERANCES¹
SLIT COILED SHEET – ALUMINUM

| SPECIFIED THICKNESS Inches | SPECIFIED WIDTH – in. | | | | |
|-------------------------------|-----------------------|-------------------|--------------------|--------------------|---------------------------------|
| | Up thru 6 | Over 6 thru 24 | Over 24 thru 60 | Over 60 thru 96 | Over 96 thru 132 thru 168 |
| | TOLERANCE 2 – in. | | | | |
| 0.006-0.125 | 0.010 | 0.016 | 1/32 | 3/64 | 1/16 |
| 0.126-0.186 | 0.012 | 0.020 | 1/32 | 1/16 | 3/32 |
| 0.187-0.249 | 0.016 | 0.025 | 3/64 | 3/32 | 1/8— |

1. When a dimension tolerance is specified other than as an equal bilateral tolerance, the value of the standard tolerance is that which would apply to the mean of the maximum and minimum dimensions permissible under the tolerance.
2. Tolerance applicable at ambient mill temperatures. A change in dimension of 0.013 in. per 100 in 10 F (6 C) must be recognized.

GENERAL AND TECHNICAL INFORMATION

GENERAL AND TECHNICAL INFORMATION

THICKNESS TOLERANCES¹ – ALUMINUM

ALLOYS EC, 1060, 1100, 3003, 3005, 3105, 5005, 5050, 5357, 5457, 5657, 1100 REFLECTOR SHEET, CLAD 1100 REFLECTOR SHEET AND CLAD 3003 REFLECTOR SHEET.

NOTE: ALSO APPLICABLE TO THE ALLOYS LISTED WHEN SUPPLIED AS ALCLAD.

| SPECIFIED THICKNESS Inches | WIDTH – Inches | | | | | | | | | |
|----------------------------|----------------|-----------------|-----------------|-----------------|-----------------|------------------|-------------------|-------------------|-------------------|-------------------|
| | Up thru 18 | Over 18 thru 36 | Over 36 thru 54 | Over 54 thru 72 | Over 72 thru 90 | Over 90 thru 102 | Over 102 thru 132 | Over 132 thru 144 | Over 144 thru 156 | Over 156 thru 168 |
| 0.006-0.007 | .001 | .001 | .002 | | | | | | | |
| 0.008-0.010 | .001 | .0015 | .002 | | | | | | | |
| 0.011-0.017 | .0015 | .0015 | .002 | | | | | | | |
| 0.018-0.028 | .0015 | .002 | .0025 | .003 | .004 | | | | | |
| 0.029-0.036 | .002 | .002 | .0025 | .0035 | .005 | .006 | | | | |
| 0.037-0.045 | .002 | .0025 | .003 | .004 | .005 | .006 | | | | |
| 0.046-0.068 | .0025 | .003 | .004 | .005 | .006 | .007 | .008 | | | |
| 0.069-0.076 | .0025 | .003 | .004 | .006 | .008 | .008 | .009 | | | |
| 0.077-0.096 | .003 | .003 | .004 | .006 | .008 | .009 | .010 | | | |
| 0.097-0.108 | .0035 | .004 | .005 | .007 | .009 | .010 | .012 | | | |

TOLERANCE – Inches Plus and Minus

THICKNESS TOLERANCES¹ – ALUMINUM

| SPECIFIED THICKNESS Inches | WIDTH – Inches | | | | | | | | | |
|----------------------------|-----------------------------------|-----------------|-----------------|-----------------|-----------------|------------------|-------------------|-------------------|-------------------|-------------------|
| | Up thru 18 | Over 18 thru 36 | Over 36 thru 54 | Over 54 thru 72 | Over 72 thru 90 | Over 90 thru 102 | Over 102 thru 132 | Over 132 thru 144 | Over 144 thru 156 | Over 156 thru 168 |
| | TOLERANCE – Inches Plus and Minus | | | | | | | | | |
| 0.109-0.140 | .0045 | .0045 | .005 | .007 | .009 | .010 | .012 | | | |
| 0.141-0.172 | .006 | .006 | .008 | .009 | .011 | .012 | .015 | | | |
| 0.173-0.203 | .007 | .007 | .009 | .011 | .013 | .015 | .017 | | | |
| 0.204-0.249 | .009 | .009 | .011 | .013 | .017 | .020 | | | | |
| 0.250-0.320 | .013 | .013 | .013 | .015 | .017 | .020 | .023 | .032 | .040 | .050 |
| 0.321-0.438 | .019 | .019 | .019 | .019 | .023 | .026 | .026 | .035 | .043 | .052 |
| 0.439-0.625 | .025 | .025 | .025 | .025 | .030 | .035 | .035 | .040 | .046 | .055 |
| 0.626-0.875 | .030 | .030 | .030 | .030 | .037 | .045 | .045 | .050 | .056 | .064 |
| 0.876-1.125 | .035 | .035 | .035 | .035 | .045 | .055 | .055 | .060 | .066 | .074 |
| 1.126-1.375 | .040 | .040 | .040 | .040 | .052 | .065 | .065 | .070 | .075 | .082 |
| 1.376-1.625 | .045 | .045 | .045 | .045 | .060 | .075 | .075 | .080 | .085 | .092 |
| 1.626-1.875 | .052 | .052 | .052 | .052 | .070 | .088 | .088 | | | |
| 1.876-2.250 | .060 | .060 | .060 | .060 | .080 | .100 | .100 | | | |
| 2.251-2.750 | .075 | .075 | .075 | .075 | .100 | .125 | .125 | | | |
| 2.751-3.000 | .090 | .090 | .090 | .090 | .120 | .150 | .150 | | | |
| 3.001-4.000 | .110 | .110 | .110 | .110 | .140 | .160 | .160 | | | |
| 4.001-5.000 | .125 | .125 | .125 | .125 | .150 | .160 | .160 | | | |
| 5.001-6.000 | .135 | .135 | .135 | .135 | .160 | .170 | | | | |

GENERAL AND TECHNICAL INFORMATION

GENERAL AND TECHNICAL INFORMATION

WIDTH AND LENGTH TOLERANCES¹ – ALUMINUM

SAWED FLAT SHEET AND PLATE

| SPECIFIED THICKNESS Inches | SPECIFIED LENGTH – in. | | | | | | | |
|-------------------------------|------------------------|--------------------|---------------------|----------------------|----------------------|----------------------|----------------------|----------------------|
| | Up thru 30 | Over 30 thru 60 | Over 60 thru 120 | Over 120 thru 240 | Over 240 thru 360 | Over 360 thru 480 | Over 480 thru 600 | Over 600 thru 720 |
| 0.080-0.249 | ± 1/8 | ± 1/8 | ± 3/16 | ± 1/4 | ± 1/4 | ± 5/16 | ± 3/8 | ± 7/16 |
| 0.250-6.000 | ± 1/4 | ± 5/16 | ± 3/8 | ± 1/2 | ± 9/16 | ± 5/8 | ± 3/4 | ± 7/8 |

TOLERANCES 2-in.

LATERAL BOW TOLERANCES

COILED SHEET

| SPECIFIED THICKNESS Inches | SPECIFIED WIDTH – Inches | | | | |
|-------------------------------|--------------------------|---------------------|---------------------|----------------------|------------|
| | 1/2 thru 1 | Over 1 thru 2 | Over 2 thru 4 | Over 4 thru 10 | Over 10 |
| 0.006-0.064 | 3/4 | 9/16 | 3/8 | 1/4 | 3/16 |
| 0.065-0.125 ² | | 3/8 | 3/8 | 1/4 | 3/16 |

TOLERANCE – Inches in 6 Feet ALLOWABLE DEVIATION OF A SIDE EDGE FROM A STRAIGHT LINE

1. When a dimension tolerance is specified other than as an equal bilateral tolerance, the value of the standard tolerance is that which would apply to the mean of the maximum and minimum dimensions permissible under the tolerance.
2. Tolerances applicable at ambient mill temperatures. A change in dimension of 0.013 in. per 100 in. per 10 F (6 °C) must be recognized.