

ACP 7 / ACP 7R

*Excellent machining properties
with high demands on mechanical
properties and material stability.*

The precision surface machined plate ACP 7 or ACP 7R, the latter with a sawn surface, is particularly suitable for applications with high demands on mechanical properties in combination with excellent machining properties. As the world's leading manufacturer of aluminum cast plates, with ACP 7 we have succeeded in achieving outstanding cast plate quality in the EN AW 7000 alloy range.

ACP 7 / ACP 7R

EXCELLENT MACHINING PROPERTIES WITH HIGH DEMANDS ON MECHANICAL PROPERTIES AND MATERIAL STABILITY.

Chemical Composition

EN AW-7021 (Al Zn5.5Mg1.5), acc. to DIN EN 573-3

Material Properties

Machinability	very good (HSC/HPC)
Dimensional Stability	very good
Polishing	very good
Weldability (TIG, MIG)	good (MIG-EB)
Anodizing Properties	acceptable
Corrosion Resistance	acceptable

Typical Mechanical Properties

Tensile Strength R_m	49 - 52 ksi (~345 Mpa)
0.2 % Yield Strength $R_p 0.2$	43 - 49 ksi (~315 Mpa)
Elongation A	1-2 %
Brinell Hardness	121 HB

Typical Physical Properties

Density	0.10 lb / in ³
Thermal Conductivity	86.7 Btu / (ft* h °F)
Electrical Conductivity	38% IACS
Modulus of Elasticity	10.4*10 ⁶ psi
Coefficient of Thermal Expansion	13.1 μ in / in °F (68 - 212 °F)

alimex GmbH Precision in Aluminium

Karl-Arnold-Straße 14 - 16 | 47877 Willich | Germany
Phone: +49 (0) 2154 9177 0
Email: contact@alimex.de | www.alimex.de

alimex Benelux B.V.

Patersstraat 19b | 5801 AT Venray | Netherlands
Phone: +31 (0) 478 550288
Email: info@alimex.nl | www.alimex.de

ACP 7 Standard Sizes

Thickness	0.393" - 7.87"
Width	59.84"
Length	118.90"

ACP 7 Tolerances

Surface Finish R_a	≤ 17.6 RMS
Tolerance in Thickness	+/- 0.0039"
Flatness	0.39" - 0.472" thickness on request > 0.472" - 7.87" thickness $\leq 0.0051"$ (Linear measured section 39.37")
Tolerance in Width for Plates	-0/+0.393"
Tolerance in Length for Plates	-0/+0.590"

Other tolerances on request.

ACP 7R Standard Sizes

Thickness	0.590" - 19.69"
Width	59.80" - 79.528"
Length	118.90" - 158.268"
Standard Plate Formats:	$\geq 0.590"$ - 15.748" x 59.80" x 118.90" $\geq 1.969"$ - 19.69" x 79.528" x 158.268"

Wider or longer material may be available upon request.

ACP 7R Tolerances

Surface	sawn on all sides
Tolerance in Thickness	0/+0.118"
Tolerance in Width for Plates	-0/+0.393"
Tolerance in Length for Plates	-0/+0.590"

Other tolerances on request.

alimex ACP Asia Sdn Bhd

Block 1 no. 7, Jalan SiLC 1/4, Kawasan Perindustri SiLC
Iskandar Puteri 79200, Johor Malaysia
Phone: +60 (7) 553 9827
Email: info@alimex.com.my | www.alimex.com.my

alimex Precision in Aluminum, Inc. (alimex Americas)

195 Shop Grove Drive - Unit A, Columbia, SC 29209 USA
Phone: +1 (803) 339-0757
Email: sales@alimexamericas.com | www.alimexamericas.com