

AERONAUTICAL MATERIAL SPECIFICATION

Society of Automotive Engineers, Inc.
29 West 39th Street
New York City

AMS 4015 A

Issued 12-5-39

Revised 8-1-42

ALUMINUM ALLOY SHEET AND STRIP Magnesium Chromium (52S-0)

1. ACKNOWLEDGMENT: A vendor must mention this specification number and its revision letter in all quotations and when acknowledging purchase orders.

2. COMPOSITION:

Magnesium	2.2 - 2.8
Chromium	0.15 - 0.35
Iron plus Silicon	0.45 max
Manganese	0.10 max
Copper	0.10 max
Zinc	0.10 max
Other Impurities, each	0.05 max
Other Impurities, total	0.15 max
Aluminum	remainder

3. CONDITION: (a) Annealed conforming to the following physical properties when test specimens are cut in any direction:

<u>Thickness</u> <u>Inches</u>	<u>Tensile Strength</u> <u>lb per sq in., max</u>	<u>Elongation</u> <u>% in 2 in., min</u>
0.013 - 0.019	31,000	15
0.020 - 0.031	31,000	18
0.032 - 0.249	31,000	20

(b) The material shall not crack when cold bent flat on itself, the axis of the bend being parallel to the direction of rolling.

4. QUALITY: The material shall be uniform in quality and temper, commercially flat, clean, sound, smooth, and free from buckles, seams, cracks, laminations, blisters, and other injurious defects within the limits of best commercial manufacturing practices. Material revealing defects during fabrication is subject to rejection.