



# AEROSPACE MATERIAL

Society of Automotive Engineers, Inc.  
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## SPECIFICATION

AMS 4751

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Revised

SOLDER, TIN - LEAD, EUTECTIC  
63Sn - 37Pb

1. ACKNOWLEDGMENT: A vendor shall mention this specification number in all quotations and when acknowledging purchase orders.
2. FORM: Bars, ingots, pellets, ribbon, and round wire.
3. APPLICATION: Primarily for effecting joints in electrical and electronic circuits where the reliability of the joint requires good control of the purity of the solder.
4. COMPOSITION:

	min	max
Tin	62.5	63.5
Antimony	0.20	0.50
Bismuth	--	0.25
Copper	--	0.02
Arsenic	--	0.02
Iron	--	0.008
Zinc	--	0.005
Aluminum	--	0.005
Total Other Elements	--	0.08
Lead	remainder	

### 5. TECHNICAL REQUIREMENTS:

- 5.1 Melting Point: Shall be approximately 183 C (361 F).

6. QUALITY: Material shall be uniform in color, quality, and condition, and free from foreign materials and from imperfections detrimental to its working qualities. Ribbon and wire shall be clean, smooth, bright, and free from slivers, splitting, ragged edges, and other injurious imperfections.

### 7. REPORTS:

- 7.1 Unless otherwise specified, the vendor of the product shall furnish with each shipment three copies of a report stating that the product conforms to the requirements of this specification. This report shall include the purchase order number, material specification number, form, size, and quantity.
- 7.2 When assemblies requiring the use of this solder are supplied, the vendor of finished or semi-finished assemblies shall, unless otherwise specified, furnish with each shipment three copies of a report showing the purchase order number, this specification number, contractor or other direct supplier of solder, part number, and quantity. When solder for making parts is produced or purchased by the parts vendor, that vendor shall inspect each lot of solder to determine conformance to the requirements of this specification, and shall include in the report a statement that the solder conforms, or shall include copies of laboratory reports showing the results of tests to determine conformance.

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