

PRODUCT DATA SHEET

Indalloy[®]301 for Wire and Bar

Introduction

Indalloy[®]301 is a patented novel alloy that enables lower processing temperatures while soldering. This bismuth-free alloy enables low-temperature processing without sacrificing reliability like the traditional bismuth-containing low-temperature alloys. **Indalloy[®]301** is a low-temperature Pb-free solder capable of reducing peak reflow temperature by 30°C relative to SAC305, with drop shock reliability two orders of magnitude greater than standard low-temperature alloys.

Features

- Low-temperature Pb-free solution
- Reduced reflow peak temperatures
- Excellent drop shock reliability—comparable to SAC
- Enables step soldering with Pb-free alloys
- Excellent thermal and electrical conductivity
- Reduced energy consumption

Available As

- Solid Solder Wire
- Cored Solder Wire
- Solder Bar

Product Specifications

Solidus (°C)	Liquidus (°C)	Density (g/cm ³)	Electrical Conductivity (% IACS)	Thermal Conductivity (W/m°C)	Tensile Strength (psi)	Young's Module (GPa)	Thermal Shock (TST)
190	205	7.4	11	43	8,360	52	-40°C–125°C per AQG324 (pending qualification)



Technical Support

Indium Corporation's internationally experienced engineers provide in-depth technical assistance to our customers. Thoroughly knowledgeable in all facets of Materials Science as it applies to the electronics and semiconductor sectors, Technical Support Engineers provide expert advice in solder preforms, wire, ribbon, and paste. Indium Corporation's Technical Support Engineers provide rapid response to all technical inquiries.

Safety Data Sheets

Please refer to the SDS document within the product shipment, or contact our local team to receive a copy.

This product data sheet is provided for general information only. It is not intended, and shall not be construed, to warrant or guarantee the performance of the products described which are sold subject exclusively to written warranties and limitations thereon included in product packaging and invoices. All Indium Corporation's products and solutions are designed to be commercially available unless specifically stated otherwise.

All of Indium Corporation's solder paste and preform manufacturing facilities are IATF 16949:2016 certified. Indium Corporation is an ISO 9001:2015 registered company.

From One Engineer To Another[®]

Contact our engineers: askus@indium.com

Learn more: www.indium.com



Form No. 100189 R0

ASIA +65 6268 8678 • CHINA +86 (0) 512 628 34900 • EUROPE +44 (0) 1908 580400 • USA +1 315 853 4900



©2024 Indium Corporation