



SURFACE VEHICLE STANDARD

J526™

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Superseding J526 NOV2016

Welded Low-Carbon Steel Tubing Suitable for
Bending, Flaring, Beading, Forming, and Brazing

RATIONALE

This Five-Year Review of the SAE J526 standard incorporate revisions requested by producers, fabricators, and users of the material type. The updates include revised Tables 1 and 2 to include inch sizes and updated verbiage.

1. SCOPE

The SAE J526 Standard covers electric-resistance welded single-wall low-carbon steel pressure tubing intended for general automotive, refrigeration, hydraulic, and other similar applications requiring tubing of a quality suitable for bending, flaring, beading, forming, and brazing. Material produced to this specification is not intended to be used for single flare applications due to the potential leak path that would be caused by the ID weld bead or scarfed region. Assumption of risks when using this material for single flare applications shall be defined by agreement between the producer and tube purchaser. The material produced to this specification is intended to service pressure applications where severe forming and bending is not required. As this material may exhibit mechanical properties that reduce some desired forming characteristics versus SAE J356, the severity of the forming requirements of the finished assembly should be considered when utilizing material produced to this specification.

In an effort to standardize within a global marketplace and ensure that companies can remain competitive in an international market, it is the intent to convert to metric tube sizes, which will:

- Lead to one global system
- Guide users to preferred system
- Reduce complexity
- Eliminate inventory duplications

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SAE WEB ADDRESS:

Full document details: SAE J526_202209

For more information on this standard, visit
https://www.sae.org/standards/content/J526_202209/

Documents

Document Sharing Hub

2. REFERENCES

2.1 Applicable Documents

The following publications form a part of this specification to the extent specified herein. Unless otherwise indicated, the latest issue of SAE publications shall apply.

2.1.1 SAE Publications

Available from SAE International, 400 Commonwealth Drive, Warrendale, PA 15096-0001, Tel: 877-606-7323 (inside USA and Canada) or +1 724-776-4970 (outside USA), www.sae.org.

SAE J356	Welded, Flash-Controlled, Low-Carbon Steel Tubing Normalized for Bending, Double Flaring, Beading, Forming, and Brazing
SAE J403	Chemical Compositions of SAE Carbon Steels
SAE J409	Product Analysis—Permissible Variations from Specified Chemical Analysis of a Heat or Cast of Steel
SAE J514/1	Metallic Connections for Fluid Power and General use - Part 1: 37 Degree Flared Fittings
SAE J533	Flares for Tubing
SAE J1677	Tests and Procedures for Carbon Steel and High Strength Low Alloy Steel Tubing

2.2 Related Publications

The following publications are provided for information purposes only and are not a required part of this SAE Technical Report.

2.2.1 SAE Publications

Available from SAE International, 400 Commonwealth Drive, Warrendale, PA 15096-0001, Tel: 877-606-7323 (inside USA and Canada) or +1 724-776-4970 (outside USA), www.sae.org.

SAE J516	Hydraulic Hose Fittings
SAE J1065	Nominal Reference Working Pressures for Steel Hydraulic Tubing
SAE J1290	Automotive Hydraulic Brake System - Metric Tube Connections
SAE J1453-1	Specification for O-Ring Face Seal Connectors: Part 1 - Tube Connection Details and Common Requirements for Performance and Tests
SAE J1453-2	Specification for O-Ring Face Seal Connectors: Part 2 - Requirements, Dimensions, and Tests For Steel Unions, Bulkheads, Swivels, Braze Sleeves, Braze-on Tube Ends, Caps, and Connectors with ISO 6149-2 Metric Stud Ends and ISO 6162 4-Bolt Flange Heads
SAE J1453-3	Specification for O-Ring Face Seal Connectors: Part 3 - Requirements, Dimensions, and Tests for Steel Unions, Bulkheads, Swivels, Braze Sleeves, Caps, and Connectors with SAE J1926-2 Inch Stud Ends
SAE J2551-1	Recommended Practices for Fluid Conductor Carbon, Alloy and High Strength Low Alloy Steel Tubing Applications - Part 1: Design and Fabrication
SAE J2551-2	Recommended Practices for Fluid Conductor Carbon, Alloy and High Strength Low Alloy Steel Tubing Applications - Part 2: General Specifications and Performance Requirements