



<b>AEROSPACE STANDARD</b>	<b>AS5259™</b>	<b>REV. A</b>
	Issued 2008-09 Reaffirmed 2013-07 Revised 2021-07  Superseding AS5259	
(R) Crimping Tool and Accessories, Electrical, Crimp Barrel Size 8 to 4/0, General Purpose Use		FSC 5120

### RATIONALE

Full revision required to address AIR1351 life characteristics, crimp pressure, quality assurance requirements, qualification requirements, and minor technical or editorial changes as needed.

#### 1. SCOPE

AS5259 covers design requirements, performance requirements, and methods of procurement for tools and associated accessories used to crimp wire barrels of aircraft electrical wiring components including ferrules, terminals, splices, and connector contacts on wire/cable sizes 8 to 4/0.

##### 1.1 Intended Use

The purpose of AS5259 is to define a tool and die configuration in detail, and a tool performance. The design details assures tool and die interchangeability, repeatability, and reliability, but not the tool's component crimp characteristics. The crimp characteristics (tensile strength, etc.) are defined by the component specification which specifies the crimp tool. The ability of the tool to properly crimp a component is determined by the component specification or the engineering drawing which specifies the tool. Tools defined by AS5259 are recommended to be used only for those components which specifically call out the use of the tool in the component specification or engineering drawing (see 3.1.1).

##### 1.2 Qualification

The tool furnished under AS5259 shall be products that have been tested and have passed the qualification tests specified herein and have been listed on or approved for listing on the applicable qualified products list (see 7.2). Part numbers listed in the detail specification can only be used by a supplier qualified by the qualifying activity. A supplier that is no longer qualified may only use the part number for a purchase order, if the supplier was qualified by the qualifying activity at the time when the purchase order was approved by the purchaser.

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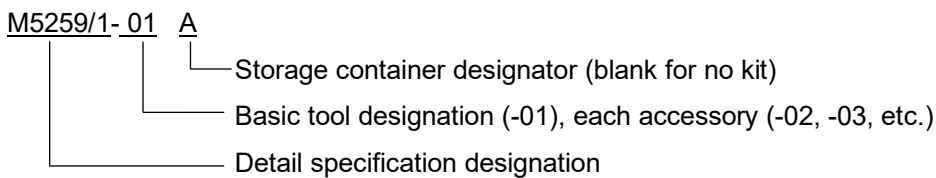
**For more information on this standard, visit**  
<https://www.sae.org/standards/content/AS5259A/>

### 1.3 Tools for U.S. Military Activities

Tools defined by AS5259 (see 2.1.1) are considered Class 1 tools. Class 1 tools are intended for use by U.S. military service activities. These tools will be the only style stocked by the services and supplied to their activities. Tools for crimping Class 1 terminals and conductor splices are listed on the applicable component detail specification. Class 2 tools are not typically used by U.S. military equipment manufacturer (supplier), but in some cases are used by the military repair activities when recommended by the manufacturer (supplier). Unless specifically justified by the military procuring activity, Class 2 tools will not be procured or stocked by military or supplied to the services unless justified for Class 2 application by that activity. Class 2 tools will not be substituted by the military stocking activity with Class 1 tools. In cases where a Class 1 tool is not available, the component detail specification will specify a Class 2 tool controlled by a tool supplier. Class 2 tools specified by a detail specification are acceptable for purchase by the military procurement activity (see 7.4).

### 1.4 Part Number Structure

The part number structure for the tool, related accessory (i.e., dies, release tool, etc.), and kit shall be:



Military standards (MS) part numbers superseded by AS5259 are maintained (i.e., MS25441-1, MS25442-1A, etc.).

## 2. REFERENCES

### 2.1 Applicable Documents

The following publications form a part of this document to the extent specified herein. The latest issue of the SAE publications shall apply. The applicable issue of other publications shall be the issue in effect on the date of the purchase order. In the event of conflict between the text of this document and references cited herein, the text of this document takes precedence. Nothing in this document, however, supersedes applicable laws and regulations unless a specific exemption has been obtained.

#### 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](http://www.sae.org).

AIR1351	Manufacturers' Identification of Aerospace Electrical and Electronic Wiring Devices and Accessories
AS9138	Aerospace Series - Quality Management Systems Statistical Product Acceptance Requirements
AS5259/1*	Crimping Tool and Accessories, Remote Crimp Head, Hydraulic, Wire Size 8 to 0000 for Insulated and Un-Insulated Crimp Barrels
AS5259/2*	Crimping Tool and Accessories, Hydraulic Pumps, 10000 psi Minimum
AS5259/3*	Crimping Tool and Accessories, Hand Operated, Die Type, Wire Sizes 8 to 0000 Un-Insulated and Insulated Crimp Barrels
AS5259/4*	Crimping Tool And Accessories, Remote Crimp Head, Hydraulic, Wire Size 8 to 00 Un-Insulated and 8 thru 2 Insulated Crimp Barrels
AS5259/5*	Crimping Tool and Accessories, Hand Operated, Lightweight, Die Type, Wire Size 8 to 00 Un-Insulated and 8 thru 2 Insulated Crimp Barrels
AS5259/6*	Crimping Tool and Accessories, Inspection Gages, for AS5259 Dies

AS5259/7*	Crimping Tool and Accessories, Dies, Wire Size 8 to 0000 Un-Insulated and Insulated Crimp Barrels
AS5259/8*	Crimping Tool and Accessories, 18 VDC Battery Electric, Portable Hydraulic, Wire Size 8 to 00 Un-Insulated, and Size 8 Through 2 Insulated Crimp Barrels
AS7928	Terminals, Lug: Splices, Conductor: Crimp Style, Copper, General Specification for
AS20659	Terminal, Lug, Crimp Style, Copper, Uninsulated, Ring Tongue, Type I, Class 1, for 175 °C or 260 °C Total Conductor Temperature

\*AS5259 detail specification.

### 2.1.2 ASQ Publications

Available from American Society for Quality, 600 North Plankinton Avenue, Milwaukee, WI 53203, Tel: 800-248-1946 (United States or Canada), 001-800-514-1564 (Mexico), or +1-414-272-8575 (all other locations), [www.asq.org](http://www.asq.org).

ANSI/NCSL Z540.3 Requirements for the Calibration of Measuring and Test Equipment

### 2.1.3 U.S. Government Publications

Copies of these documents are available online at <https://quicksearch.dla.mil>.

MIL-STD-202 Test Methods for Electronic and Electrical Component Parts

Sam\* System Awards Management

SD-6 Provisions Governing Qualification

\*Available from <https://www.sam.gov/portal/public/SAM/>.

### 2.1.4 ASTM Publications

Available from ASTM International, 100 Barr Harbor Drive, P.O. Box C700, West Conshohocken, PA 19428-2959, Tel: 610-832-9585, [www.astm.org](http://www.astm.org).

ASTM D3951 Package, Commercial

## 2.2 Definitions

### 2.2.1 SAE PREPARING ACTIVITY

SAE preparing activity is the SAE sub-committee responsible for preparing and maintaining the product specification and the required technical data.

### 2.2.2 2.2.2QUALIFICATION INSPECTION

Qualification inspection is a process that demonstrates that a component is capable of fully conforming to all the requirements defined in a specification. Qualification inspection includes definition of the measurements, tests, analysis, and associated data which provides consistent rationale for acceptance of a particular supplier's design as meeting the specification requirements typically prior to acquisition by the purchaser.

### 2.2.3 QUALIFIED PRODUCTS LIST

A qualified products list is a list of suppliers whose products have been evaluated to a defined process and who are authorized to provide those products to a purchaser upon request. When a qualified products list is specified, only approved suppliers are authorized to provide products under the part number defined in the component specification. A qualified products list is established and maintained by a qualifying activity.