



## Accredited Laboratory

A2LA has accredited

**AMERICAN TESTING SERVICES, LTD.**

*Miamisburg, OH*

for technical competence in the field of

**Mechanical Testing**

This laboratory is accredited in accordance with the recognized International Standard ISO/IEC 17025:2005 *General requirements for the competence of testing and calibration laboratories*. This laboratory also meets the requirements of GE Aviation S-400 in the Mechanical field. This accreditation demonstrates technical competence for a defined scope and the operation of a laboratory quality management system (refer to joint ISO-ILAC-IAF Communiqué dated 8 January 2009).



Presented this 9<sup>th</sup> day of August 2017.

A handwritten signature in black ink, appearing to read 'L. S. ...', written over a horizontal line.

President & CEO  
For the Accreditation Council  
Certificate Number 2855.01  
Valid to July 31, 2019  
Revised August 9, 2017

*For the tests to which this accreditation applies, please refer to the laboratory's Mechanical Scope of Accreditation.*



SCOPE OF ACCREDITATION TO ISO/IEC 17025:2005

AMERICAN TESTING SERVICES, LTD.  
2000 Old Byers Road  
Miamisburg, OH 45342  
Chris Small Phone: 937 298 9390

MECHANICAL

Valid To: July 31, 2019

Certificate Number: 2855.01

In recognition of the successful completion of the A2LA evaluation process, including compliance to R223 – Specific Requirements – GE Aviation S-400 Accreditation Program, accreditation is granted to the American Testing Services to perform the following tests on metals and metal components in Stainless Steel, Carbon Steel, Alloy Steel, Aluminum, Nickel, and Titanium Alloys:

<u>Test</u>	<u>Test Method(s)</u>
Hardness (Rockwell) A, B, C, E, F, 15N, 30N, 45N, 15T, 30T, 45T	ASTM E18
Brinell Hardness (500kg, 3000kg)	ASTM E10
Microhardness (Knoop, Vickers) (500g) (100g)	ASTM E384, E92
Tensile Testing of Metals (Room Temperature, (0.1 to 60) klbs)	ASTM A370, B557, E8
Bend Testing	ASTM E190
Welder Qualification Testing	AMS-STD-1595; API 1104; ASME IX; ASTM A488/A488M; AWS B2.1/B2.1M, B2.2/B2.2M, D1.1/D1.1M, D1.2/D1.2M, D1.3/D1.3M, D1.4/D1.4M, D1.5/D1.5M, D1.6/D1.6M, D1.7/D1.7M, D1.8/D1.8M, D1.9/D1.9M, D9.1/D9.1M, D14.1/D14.1M, D14.3/D14.3M, D14.4/D14.4M, D14.6/D14.6M, D15.1/D15.1M, D17.1/D17.1M,; ISO 15614-1; BS EN287-1, 287- 1(Canceled 12/17/04) <sup>2</sup> , 288-3(Canceled 6/22/04) <sup>2</sup> , 288-49(Canceled 8/28/97) <sup>2</sup> , MIL-STD 1595A(Canceled 6/16/98) <sup>2</sup> , 2219(Canceled 9/04/09) <sup>2</sup> , 1261(Canceled 7/28/03) <sup>2</sup> , NAVSEA S9074-AQ-GIB- 010

<u>Test</u>	<u>Test Method(s)</u>
<u>Metallographic Evaluation (Metals and Alloys)</u>	
Preparation	ASTM E3
Microetch	ASTM E407; ASTM E340, E81
Macroetch	ASTM B487
Plating Thickness	ASTM E112
Grain Size	AMS 2759/7
Case Depth	GE P3TF19
Alpha Case Depth	ASTM E1077; NASM 8831
Decarburization Depth	NASM 8831, ASTM E1268, ASM
Microstructure Evaluation	Metals HBK, Vol 9
Corrosion Testing	ASTM A262, Practice A, E
Flarability (Tubing)	AMS 5557
Optical Emission Spectroscopy (OES) (Al, B, C, Cr, Co, Cu, Fe, Pb, Mn, Mo, Ni, Nb, P, Si, S, Sn, Ti, W, V, Zn, Zr, Fe)	ASTM A751, E415, E1086, E1251
Combustion Analysis (Carbon and Sulfur)	ASTM E1019
ICP-OES ) (Al, Cr, Cu, Fe, Pb, Mg, Mn, Mo, Ni, Nb, P, Si, Ta, Sn, Ti, Zn, Co)	QP-10-830
Positive Material Identification (PMI) via Portable XRF	ASTM E1476, E1916
Scanning Electron Microscopy with Energy Dispersive Spectroscopy (Materials Analysis and Characterization) SEM/EDS	ASTM E1508; ATS QP-10-817
Failure Analysis (Fractography, Failure Mode Determination, Weld Integrity) using methods listed above	ATS QP-10-816

<sup>1</sup>This laboratory's scope contains withdrawn or superseded methods. As a clarifier, this indicates that the applicable method itself has been withdrawn or is now considered "historical" and not that the laboratory's accreditation for the method has been withdrawn.

