

Accreditation No: LAB 008

Awarded to

METROLOGICAL CENTRE, AIRCRAFT REBUILD FACTORY, PAKISTAN AERONAUTICAL COMPLEX, KAMRA

The scope of accreditation is in accordance with the standard specifications outlined in the following page(s) of this document. The accredited scope shall be visible and legible in areas such as customer service, sample-receiving section etc and shall not mislead its users.

The accreditation was first time granted on 8th November, 2004 by Pakistan National Accreditation Council. The laboratory complies with the requirements of ISO/IEC 17025:2017. The accreditation requires regular surveillance, and is valid until 03-03-2023.

The decision of accreditation made by Pakistan National Accreditation Council implies that the organization has been found to fulfill the requirements for accreditation within the scope. The organization however, itself is responsible for the results of performed measurements/tests.

PAKISTAN NATIONAL ACCREDITATION COUNCIL

<u>19-08-2020</u> Date <u>Sd</u> Director General



Calibration Laboratory.

Accreditation Scope of Metrological Centre, Aircraft Rebuild Factory, Pakistan Aeronautical Complex, Kamra.

Permanent laboratory premises X

Field of measurement:				
Calibration Area	Range	*Expanded Uncertainty (<u>+</u>)	Technique, Reference Standard, Equipment	
PRESSURE				
Pressure (Pneumatic)	920~ 1020 mBar	± 0.070 mBar	CP-125 Using direct comparison method Dead weight tester Pressure Standard Unit 2465 Ruska	
Oxygen Pressure	0.2 to 10 Kgf/cm ² 10.2 to 100 Kgf/cm ² 101 to 250 Kgf/cm ²	± 0.060 Kgf/cm ² ± 0.620 Kgf/cm ² ± 1.50 Kgf/cm ²	CP-105 Using direct comparison method Pressure Gauges calibrator LYL-400	
Pressure (Hydraulic)	0.4 to 5 kgf/cm ² 6 to 50 kgf/cm ² 60 to 150 kgf/cm ²	0.030 kgf/cm ² 0.060 kgf/cm ² 0.60 kgf/cm ²	CP-039 Dead weight testers Yu-6 CP-039 Dead weight testers Yu-60 CP-039 Dead weight testers Yu-600	
Temperature				
Electrical Simulation for Temperature indicator (EMF based) Temperature indicator and controller (milli volt meter) digital and analogue	0 to 1600 °C	±0.12 °C	CP-035 Comparison method using standard temperature calibrator 525B / Fluke 724	
Thermocouple	0 to 1080 °C	±0.70 °C	CP-033 Comparison method using std thermocouple Fluke, standard temperature calibrator 525B / Fluke 724 and Tubular furnace 9118A Fluke / Metrological Well 9173 Fluke	
Electrical Simulation for Temperature indicator and controller (RTD Pt100)	0 to 650 °C	±0.20 °C	CP-036 Comparison method using standard temperature calibrator 525B / Fluke 724	



Mass			
Weights	1 mg to 500 mg	0.10 mg	CP-117
(1 mg to 200 g)	1 g to 50 g	0.20 mg	Indirect Comparison Method by using TG328A Balance and Troemner Ultra
	100 g to 200 g	0.30 mg	class/ Grade II / Grade III Std Weights
Balance (1 mg to 200 g)	1 mg ~ 900 mg	0.10 mg	CP-115 Direct Comparison Method by using Troemner Ultra class / Grade II /Grade III
	1 g ~ 200 g	0.30 mg	Std Weights
Table Balance	0.1g ~100g	0.030 g	CP-116
(0.1 g to 1000 g)	200g~ 1000 g	0.20 g	Direct Comparison Method by using Grade II/ Grade III Std Weights

* Expanded Uncertainty:

Expanded Uncertainty is the measurement uncertainty at a coverage probability of 95 %, which usually requires the use of a coverage factor of k = 2. This measurement uncertainty is a value for which the laboratory has been accredited using the procedure that was the subject of assessment. In certificates issued under its accreditation scope an accredited laboratory is not permitted to quote an uncertainty that is smaller than the published uncertainty for respective ranges as given above.