

Name of Assessed Person:

Registration:

UNIT MEA227: Test and Troubleshoot Aircraft Electrical Systems and Components

1. Prepare for Troubleshooting	a. AC and/or DC Power Generation, Regulation and Distribution Systems	No. of Entries	1	2	3
		Tail / Job No.			
		LAME Sign.			
		Date			
		Simulated	Yes No	Yes No	Yes No
	b. Rotary and Static Inverters and TR Units	No. of Entries	1	2	3
		Tail / Job No.			
		LAME Sign.			
		Date			
		Simulated	Yes No	Yes No	Yes No
	c. Air Cycle Air Conditioning and Pressurisation Systems	No. of Entries	1	2	3
		Tail / Job No.			
		LAME Sign.			
		Date			
		Simulated	Yes No	Yes No	Yes No
	d. Flight, and Engine Control Systems	No. of Entries	1	2	3
Tail / Job No.					
LAME Sign.					
Date					
Simulated		Yes No	Yes No	Yes No	

Performance Criteria:

1.1 Relevant maintenance documentation and modification status, including system defect reports, where relevant, are used to identify an unserviceability.

Name of Assessed Person:

Registration:

UNIT MEA227: Test and Troubleshoot Aircraft Electrical Systems and Components

1. Cont'd Prepare for Troubleshooting	e. Ignition and Starting Systems	No. of Entries	1	2	3
		Tail / Job No.			
		LAME Sign.			
		Date			
		Simulated	Yes No	Yes No	Yes No
	f. Fire / Smoke Detection and Extinguishing	No. of Entries	1	2	3
		Tail / Job No.			
		LAME Sign.			
		Date			
		Simulated	Yes No	Yes No	Yes No
	g. Lighting	No. of Entries	1	2	3
		Tail / Job No.			
		LAME Sign.			
		Date			
		Simulated	Yes No	Yes No	Yes No
	h. Master and Caution Warning Systems	No. of Entries	1	2	3
		Tail / Job No.			
		LAME Sign.			
		Date			
		Simulated	Yes No	Yes No	Yes No

Performance Criteria:

1.1 Relevant maintenance documentation and modification status, including system defect reports, where relevant, are used to identify an unserviceability.

Name of Assessed Person:

Registration:

UNIT MEA227: Test and Troubleshoot Aircraft Electrical Systems and Components

1. Cont'd Prepare for Troubleshooting	i. Equipment Cooling and Ventilation	No. of Entries	1	2	3
		Tail / Job No.			
		LAME Sign.			
		Date			
		Simulated	Yes No	Yes No	Yes No
	j. Equipment and Furnishing	No. of Entries	1	2	3
		Tail / Job No.			
		LAME Sign.			
		Date			
		Simulated	Yes No	Yes No	Yes No
	k. Position Indicating Systems	No. of Entries	1	2	3
		Tail / Job No.			
		LAME Sign.			
		Date			
		Simulated	Yes No	Yes No	Yes No
	l. Fuel Storage and Distribution	No. of Entries	1	2	3
		Tail / Job No.			
		LAME Sign.			
		Date			
		Simulated	Yes No	Yes No	Yes No

Performance Criteria:

1.1 Relevant maintenance documentation and modification status, including system defect reports, where relevant, are used to identify an unserviceability.

Name of Assessed Person:

Registration:

UNIT MEA227: Test and Troubleshoot Aircraft Electrical Systems and Components

1. Cont'd Prepare for Troubleshooting	m. Landing Gear Indication and Antiskid	No. of Entries	1	2	3
		Tail / Job No.			
		LAME Sign.			
		Date			
		Simulated	Yes No	Yes No	Yes No
	n. Battery Installations and Bus Ties / Interlocks	No. of Entries	1	2	3
		Tail / Job No.			
		LAME Sign.			
		Date			
		Simulated	Yes No	Yes No	Yes No
	o. Propeller Control Systems (may be omitted where not applicable to the enterprise)	No. of Entries	1	2	3
		Tail / Job No.			
		LAME Sign.			
		Date			
		Simulated	Yes No	Yes No	Yes No
	p. Ice and Rain Protection (may be omitted where not applicable to the enterprise)	No. of Entries	1	2	3
		Tail / Job No.			
		LAME Sign.			
		Date			
		Simulated	Yes No	Yes No	Yes No

Performance Criteria:

1.1 Relevant maintenance documentation and modification status, including system defect reports, where relevant, are used to identify an unserviceability.

Name of Assessed Person:

Registration:

UNIT MEA227: Test and Troubleshoot Aircraft Electrical Systems and Components

1. Cont'd Prepare for Troubleshooting	q. Wastewater (may be omitted where not applicable to the enterprise)	No. of Entries	1	2	3
		Tail / Job No.			
		LAME Sign.			
		Date			
		Simulated	Yes No	Yes No	Yes No

Performance Criteria:

1.1 Relevant maintenance documentation and modification status, including system defect reports, where relevant, are used to identify an unserviceability.

Name of Assessed Person:

Registration:

UNIT MEA227: Test and Troubleshoot Aircraft Electrical Systems and Components

2. Test/adjust electrical systems	a. AC and/or DC Power Generation, Regulation and Distribution Systems.	No. of Entries	1	2	3
		Tail / Job No.			
		LAME Sign.			
		Date			
		Simulated	Yes No	Yes No	Yes No
	b. Rotary and Static Inverters and TR Units	No. of Entries	1	2	3
		Tail / Job No.			
		LAME Sign.			
		Date			
		Simulated	Yes No	Yes No	Yes No
	c. Air Cycle Air Conditioning and Pressurisation Systems	No. of Entries	1	2	3
		Tail / Job No.			
		LAME Sign.			
		Date			
		Simulated	Yes No	Yes No	Yes No
	d. Flight, and Engine Control Systems	No. of Entries	1	2	3
		Tail / Job No.			
		LAME Sign.			
		Date			
		Simulated	Yes No	Yes No	Yes No

Performance Criteria:

- 2.1 Aircraft and system are prepared in accordance with applicable maintenance manual for the application of power/system operation.
- 2.2 Electrical system is functionally tested, in accordance with maintenance manual, for evidence of serviceability or malfunction while observing all relevant work health and safety (WHS) requirements.
- 2.3 System calibration or adjustments are performed in accordance with maintenance manual, as appropriate.

Name of Assessed Person:

Registration:

UNIT MEA227: Test and Troubleshoot Aircraft Electrical Systems and Components

2. Cont'd Test/adjust electrical systems	e. Ignition and Starting Systems	No. of Entries	1	2	3
		Tail / Job No.			
		LAME Sign.			
		Date			
		Simulated	Yes No	Yes No	Yes No
	f. Fire / Smoke Detection and Extinguishing	No. of Entries	1	2	3
		Tail / Job No.			
		LAME Sign.			
		Date			
		Simulated	Yes No	Yes No	Yes No
	g. Lighting	No. of Entries	1	2	3
		Tail / Job No.			
		LAME Sign.			
		Date			
		Simulated	Yes No	Yes No	Yes No
	h. Master and Caution Warning Systems	No. of Entries	1	2	3
		Tail / Job No.			
		LAME Sign.			
		Date			
		Simulated	Yes No	Yes No	Yes No

Performance Criteria:

- 2.1 Aircraft and system are prepared in accordance with applicable maintenance manual for the application of power/system operation.
- 2.2 Electrical system is functionally tested, in accordance with maintenance manual, for evidence of serviceability or malfunction while observing all relevant work health and safety (WHS) requirements.
- 2.3 System calibration or adjustments are performed in accordance with maintenance manual, as appropriate.

Name of Assessed Person:

Registration:

UNIT MEA227: Test and Troubleshoot Aircraft Electrical Systems and Components

2. Cont'd Test/adjust electrical systems	i. Equipment Cooling and Ventilation	No. of Entries	1	2	3
		Tail / Job No.			
		LAME Sign.			
		Date			
		Simulated	Yes No	Yes No	Yes No
	j. Equipment and Furnishing	No. of Entries	1	2	3
		Tail / Job No.			
		LAME Sign.			
		Date			
		Simulated	Yes No	Yes No	Yes No
	k. Position Indicating Systems	No. of Entries	1	2	3
		Tail / Job No.			
		LAME Sign.			
		Date			
		Simulated	Yes No	Yes No	Yes No
	l. Fuel Storage and Distribution	No. of Entries	1	2	3
		Tail / Job No.			
		LAME Sign.			
		Date			
		Simulated	Yes No	Yes No	Yes No

Performance Criteria:

- 2.1 Aircraft and system are prepared in accordance with applicable maintenance manual for the application of power/system operation.
- 2.2 Electrical system is functionally tested, in accordance with maintenance manual, for evidence of serviceability or malfunction while observing all relevant work health and safety (WHS) requirements.
- 2.3 System calibration or adjustments are performed in accordance with maintenance manual, as appropriate.

Name of Assessed Person:

Registration:

UNIT MEA227: Test and Troubleshoot Aircraft Electrical Systems and Components

2. Cont'd Test/adjust electrical systems	m. Landing Gear Indication and Antiskid	No. of Entries	1	2	3
		Tail / Job No.			
		LAME Sign.			
		Date			
		Simulated	Yes No	Yes No	Yes No
	n. Battery Installations and Bus Ties / Interlocks	No. of Entries	1	2	3
		Tail / Job No.			
		LAME Sign.			
		Date			
		Simulated	Yes No	Yes No	Yes No
	o. Propeller Control Systems (may be omitted where not applicable to the enterprise)	No. of Entries	1	2	3
		Tail / Job No.			
		LAME Sign.			
		Date			
		Simulated	Yes No	Yes No	Yes No
	p. Ice and Rain Protection (may be omitted where not applicable to the enterprise)	No. of Entries	1	2	3
		Tail / Job No.			
LAME Sign.					
Date					
Simulated		Yes No	Yes No	Yes No	

Performance Criteria:

- 2.1 Aircraft and system are prepared in accordance with applicable maintenance manual for the application of power/system operation.
- 2.2 Electrical system is functionally tested, in accordance with maintenance manual, for evidence of serviceability or malfunction while observing all relevant work health and safety (WHS) requirements.
- 2.3 System calibration or adjustments are performed in accordance with maintenance manual, as appropriate.

Name of Assessed Person:

Registration:

UNIT MEA227: Test and Troubleshoot Aircraft Electrical Systems and Components

2. Cont'd Test/adjust electrical systems	q. Wastewater (may be omitted where not applicable to the enterprise)	No. of Entries	1	2	3
		Tail / Job No.			
		LAME Sign.			
		Date			
		Simulated	Yes No	Yes No	Yes No

Performance Criteria:

- 2.1 Aircraft and system are prepared in accordance with applicable maintenance manual for the application of power/system operation.
- 2.2 Electrical system is functionally tested, in accordance with maintenance manual, for evidence of serviceability or malfunction while observing all relevant work health and safety (WHS) requirements.
- 2.3 System calibration or adjustments are performed in accordance with maintenance manual, as appropriate.

Name of Assessed Person:

Registration:

UNIT MEA227: Test and Troubleshoot Aircraft Electrical Systems and Components

<p>3. Troubleshoot electrical systems</p>	<p>a. AC and/or DC Power Generation, Regulation and Distribution Systems</p>	No. of Entries	1	2	3
		Tail / Job No.			
		LAME Sign.			
		Date			
		Simulated	Yes No	Yes No	Yes No
	<p>b. Rotary and Static Inverters and TR Units</p>	No. of Entries	1	2	3
		Tail / Job No.			
		LAME Sign.			
		Date			
		Simulated	Yes No	Yes No	Yes No
	<p>c. Air Cycle Air Conditioning and Pressurisation Systems</p>	No. of Entries	1	2	3
		Tail / Job No.			
		LAME Sign.			
		Date			
		Simulated	Yes No	Yes No	Yes No
	<p>d. Flight, and Engine Control Systems</p>	No. of Entries	1	2	3
		Tail / Job No.			
		LAME Sign.			
		Date			
		Simulated	Yes No	Yes No	Yes No

Performance Criteria:

- 3.1 Available information from maintenance documentation and inspection and test results is used, where necessary, to assist in fault determination.
- 3.2 Maintenance manual fault diagnosis guides and logic processes are used to ensure efficient and accurate **troubleshooting** to line replacement level.
- 3.3 Specialist advice is obtained, where required, to assist with the troubleshooting process.
- 3.4 System faults are located and the causes of the faults are clearly identified and correctly recorded in maintenance documentation, where required.
- 3.5 Rectification requirements are determined.

**** Note: Troubleshooting:** involves the use of fault finding charts or similar, to line replacement level.

Name of Assessed Person:

Registration:

UNIT MEA227: Test and Troubleshoot Aircraft Electrical Systems and Components

<p>3. Cont'd Troubleshoot electrical systems</p>	e. Ignition and Starting Systems	No. of Entries	1	2	3
		Tail / Job No.			
		LAME Sign.			
		Date			
		Simulated	Yes No	Yes No	Yes No
	f. Fire / Smoke Detection and Extinguishing	No. of Entries	1	2	3
		Tail / Job No.			
		LAME Sign.			
		Date			
		Simulated	Yes No	Yes No	Yes No
	g. Lighting	No. of Entries	1	2	3
		Tail / Job No.			
		LAME Sign.			
		Date			
		Simulated	Yes No	Yes No	Yes No
	h. Master and Caution Warning Systems	No. of Entries	1	2	3
		Tail / Job No.			
		LAME Sign.			
		Date			
		Simulated	Yes No	Yes No	Yes No

Performance Criteria:

- 3.1 Available information from maintenance documentation and inspection and test results is used, where necessary, to assist in fault determination.
- 3.2 Maintenance manual fault diagnosis guides and logic processes are used to ensure efficient and accurate **troubleshooting**.
- 3.3 Specialist advice is obtained, where required, to assist with the troubleshooting process.
- 3.4 System faults are located and the causes of the faults are clearly identified and correctly recorded in maintenance documentation, where required.
- 3.5 Rectification requirements are determined.

**** Note: Troubleshooting:** involves the use of fault finding charts or similar, to line replacement level.

Name of Assessed Person:

Registration:

UNIT MEA227: Test and Troubleshoot Aircraft Electrical Systems and Components

<p>3. Cont'd Troubleshoot electrical systems</p>	i. Equipment Cooling and Ventilation	No. of Entries	1	2	3
		Tail / Job No.			
		LAME Sign.			
		Date			
		Simulated	Yes No	Yes No	Yes No
	j. Equipment and Furnishing	No. of Entries	1	2	3
		Tail / Job No.			
		LAME Sign.			
		Date			
		Simulated	Yes No	Yes No	Yes No
	k. Position Indicating Systems	No. of Entries	1	2	3
		Tail / Job No.			
		LAME Sign.			
		Date			
		Simulated	Yes No	Yes No	Yes No
	l. Fuel Storage and Distribution	No. of Entries	1	2	3
		Tail / Job No.			
		LAME Sign.			
		Date			
		Simulated	Yes No	Yes No	Yes No

Performance Criteria:

- 3.1 Available information from maintenance documentation and inspection and test results is used, where necessary, to assist in fault determination.
- 3.2 Maintenance manual fault diagnosis guides and logic processes are used to ensure efficient and accurate **troubleshooting**.
- 3.3 Specialist advice is obtained, where required, to assist with the troubleshooting process.
- 3.4 System faults are located and the causes of the faults are clearly identified and correctly recorded in maintenance documentation, where required.
- 3.5 Rectification requirements are determined.

**** Note: Troubleshooting:** involves the use of fault finding charts or similar, to line replacement level.

Name of Assessed Person:

Registration:

UNIT MEA227: Test and Troubleshoot Aircraft Electrical Systems and Components

<p>3. Cont'd Troubleshoot electrical systems</p>	<p>m. Landing Gear Indication and Antiskid</p>	No. of Entries	1	2	3
		Tail / Job No.			
		LAME Sign.			
		Date			
		Simulated	Yes No	Yes No	Yes No
	<p>n. Battery Installations and Bus Ties / Interlocks</p>	No. of Entries	1	2	3
		Tail / Job No.			
		LAME Sign.			
		Date			
		Simulated	Yes No	Yes No	Yes No
	<p>o. Propeller Control Systems (may be omitted where not applicable to the enterprise)</p>	No. of Entries	1	2	3
		Tail / Job No.			
		LAME Sign.			
		Date			
		Simulated	Yes No	Yes No	Yes No
	<p>p. Ice and Rain Protection (may be omitted where not applicable to the enterprise)</p>	No. of Entries	1	2	3
		Tail / Job No.			
		LAME Sign.			
		Date			
		Simulated	Yes No	Yes No	Yes No

Performance Criteria:

- 3.1 Available information from maintenance documentation and inspection and test results is used, where necessary, to assist in fault determination.
- 3.2 Maintenance manual fault diagnosis guides and logic processes are used to ensure efficient and accurate **troubleshooting**.
- 3.3 Specialist advice is obtained, where required, to assist with the troubleshooting process.
- 3.4 System faults are located and the causes of the faults are clearly identified and correctly recorded in maintenance documentation, where required.
- 3.5 Rectification requirements are determined.

**** Note: Troubleshooting:** involves the use of fault finding charts or similar, to line replacement level.

Name of Assessed Person:

Registration:

UNIT MEA227: Test and Troubleshoot Aircraft Electrical Systems and Components

3. Cont'd Troubleshoot electrical systems	q. Wastewater (may be omitted where not applicable to the enterprise)	No. of Entries	1	2	3
		Tail / Job No.			
		LAME Sign.			
		Date			
		Simulated	Yes No	Yes No	Yes No

Performance Criteria:

- 3.1 Available information from maintenance documentation and inspection and test results is used, where necessary, to assist in fault determination.
- 3.2 Maintenance manual fault diagnosis guides and logic processes are used to ensure efficient and accurate **troubleshooting**.
- 3.3 Specialist advice is obtained, where required, to assist with the troubleshooting process.
- 3.4 System faults are located and the causes of the faults are clearly identified and correctly recorded in maintenance documentation, where required.
- 3.5 Rectification requirements are determined.

**** Note: Troubleshooting:** involves the use of fault finding charts or similar, to line replacement level.

Name of Assessed Person:

Registration:

Confirmation of Underpinning Knowledge and Skills to Test and Troubleshoot Aircraft Electrical Systems and Components

A person cannot be assessed as competent until it can be demonstrated to the satisfaction of the workplace assessor that the relevant elements and performance criteria of the unit of competency are being achieved under routine supervision on a system and at least one (1) item from each of groups a) to q), including all related electrical hardware, looms and cables. ***(Groups o) to q) may be omitted where they are not Applicable to the Enterprise)*** in the range statement and at least one major component for each listed system type. This shall be established via the records in the Log of Industrial Experience and Achievement or, where appropriate, an equivalent Industry Evidence Guide (for details refer to the Companion Volume Assessment Guidelines).

UNIT MEA227: Test and Troubleshoot Aircraft Electrical Systems and Components	Date / MTO Stamp
Evidence has been confirmed of the attainment of the following pre-requisite units of competency (as they are related to attainment of the elements of competency specified in this unit). <p style="text-align: center;">223</p>	
Evidence has been confirmed of the knowledge requirements for this unit as delivered by a CASR 147 Approved Organisation. <p style="text-align: center;">OR</p> Assessment has been conducted to determine that the underpinning knowledge and skills have been achieved in accordance with the Competency Unit.	

Certification of Unit Completion

I certify that I have reviewed the certification of the elements for this competency unit and that all of the competency unit requirements have been met.

Signed: _____ Assessor No. _____ MTO: _____ Date: _____