



IPAF's Service Engineering Roadmap

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UK Market General Manager



Why do we need this?

Good Engineers are hard to find

There is no pipeline of new talent

We are critical to the construction industry but we sit under the radar

The qualifications aren't there to attract young people

We train them then lose them

Promotion for UK engineers is to come off the tools !



IPAF's 3-Year Strategic Plan

Develop Career Paths

Identify clear routes for engineers to achieve a CAP card

Produce a service technician qualification framework

Introduce Service Technician training

Launch IPAF Apprenticeship in the UK

UK Country Council – Aligned Primary Objectives

Training to support development and assessment of individuals from PDI Technician to CAP qualified engineer

Training to support the development and assessment of individuals without prior experience to PDI Technician

Training roadmap to ensure non-qualified engineers can work in a service / maintenance role

Apprenticeship scheme to develop school leavers / new entrants to level of competent engineer, working towards CAP status

Consider how career path development can be implemented internationally

A UKCC working group identified 2 clear pathways



A

Aimed at those new to powered access and hire rental who may undertake some maintenance/servicing of equipment or those working in a maintenance role without formal qualification.

B

Aimed at those looking to achieve an engineering apprenticeship / qualification either straight from school or those working in industry with prior knowledge

IPAF Service Engineer Roadmap

Mandatory

Modules could include-

- MEWP technology for non-t
- Preliminary stage hydraulics
- Advanced MEWP hydraulics
- Aimed fault finding on internal combustion (IC) MEWPs
- Aimed fault finding on electric MEWPs
- Batteries and chargers
- AC/DC meters

Points available on completion of section

CAP points available for each section are marked in a gold circle.

Additional requirements for CAP are included later.

[Click this text to see the trailblaze](#)

Competent Assessed Person (CAP) is the qualification that demonstrates that the engineer is competent to conduct thorough examinations as required by LOLER.

Candidates wishing to be assessed for CAP must provide-

- Curriculum Vitae (CV)
- Copies of relevant certificates
- Academic qualifications
- Vocational qualifications
- Relevant technical or product training
- Manufacturers specific training courses.

Candidate
Profiling to check
knowledge and
understanding
before moving to
Pathway B

Can demonstrate
knowledge and
competence in
maintenance and
servicing practices

Can be Profiled to
join appropriate
route on pathway B

IPAF CAP

Can complete actions

Determine suitability for the technician to
advanced level. Profiling of knowledge,
will help to determine this.

Progress to CAP

5

Can undertake
thorough
examination (LOLER)
and CAP

A

PATHWAY A –Aimed at those new to powered access and hire rental who may undertake some maintenance/servicing of equipment or those working in a maintenance role without formal qualification.

B

PATHWAY B –Aimed at those looking to achieve an engineering apprenticeship / qualification either straight from school or those working in industry with prior knowledge

UK Country Council – Aligned Primary Objectives

Training to support development and assessment of individuals from PDI Technician to CAP qualified engineer

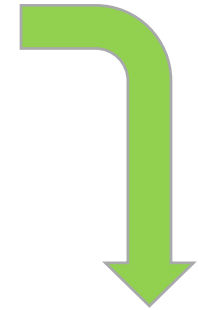
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- MEWP technology for non-technicians
- Preliminary stage hydraulics
- Advanced MEWP hydraulics
- Aimed fault finding on internal combustion (IC) MEWPs
- Aimed fault finding on electric MEWPs
- Batteries and chargers
- AC/DC motors
- Diagnostics and analysis of electrical signals
- Expert training on IC or electric MEWP
- Manufacturer specific training



CAP
COMPETENT ASSESSED PERSON

Consider how career path development can be implemented globally

IPAF's Service Engineering Roadmap



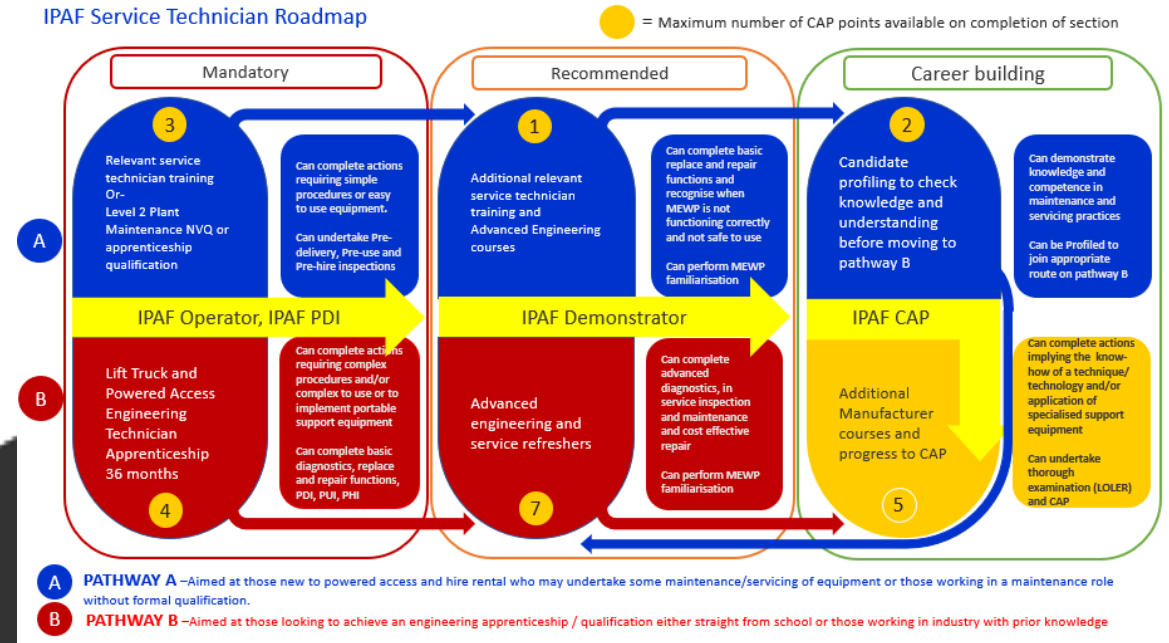
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- Battery maintenance and diagnostics
- Vehicle mounted equipment
- Masted equipment
- MEWP technology for non-technicians

Consider how career path development can be implemented globally

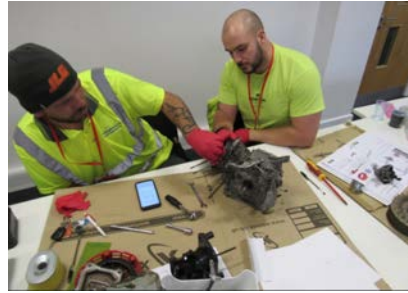
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- Electrical equipment
 - Engines and power systems
 - Basic hydraulics and hydrostatic drive systems
 - Pre delivery inspection essentials
 - Health and safety
 - Road tow equipment



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Lift truck and powered access engineering technician ST0387

In development Level 3

Current status

☒ Proposal ☒ Standard ☐ Assessment plan

<https://www.instituteforapprenticeships.org/apprenticeship-standards/lift-truck-and-powered-access-engineering-technician>

Institute for Apprenticeships & Technical Education

LIFT TRUCK AND POWERED ACCESS ENGINEERING TECHNICIAN

Reference Number: ST0387

Details of standard

This apprenticeship standard is currently in development and its contents are subject to change

Occupation summary

Lift Truck and Powered Access Engineers can be found in many sectors, wherever businesses need to lift and move products, equipment and people safely. This is vital to a huge range of industries including: engineering, manufacturing and construction, food manufacturing and the storage & logistics industries.

The broad purpose of the occupation is to service, repair and maintain lift trucks and powered access vehicles. This can include manual, electric, diesel, LPG, and hybrid powered machines both tracked and wheeled, vertical mast type machines both static and self-propelled along with equipment mounted on vehicles, such as; fork lift, scissor lift, vertical mast, articulated and telescopic boom, elevated work platform machines both static and self-propelled along with equipment mounted on vehicles. There are also Lift Truck and Powered Access machines specially designed to meet specific applications.

This can take place in a range of locations such as at a workshop, repair centre, warehouse, foundry, cold-store, manufacturing plant, engineering, construction site, storage & logistics site or any field service environment including customer's premises, so some Lift Truck and Powered Access Engineers work from their own mobile units. Many companies require staff to work shifts, which can mean that their weekly hours involve working nights, weekends, and bank holidays.

In their daily work, an employee in this occupation interacts with supervisors, warehouse staff, colleagues and customers.

An employee in this occupation will be responsible for inspecting and maintaining vehicles/equipment as well as diagnosing and repairing faults. They are in direct contact with customers and are required to understand and meet customer requirements, providing a high standard of customer care.

Consider how career path development can be implemented globally

So What's next?



- Market and promote the launch of the new UK apprenticeship to attract school leavers / new entrants
- Identify other pipelines of potential engineers



**SAPPERS
NETWORK**



- Develop a Level 3 Service Tech / Plant Maintenance qualification (NVQ)
- Internationalise the UK qualifications where appropriate or find comparable locally recognised qualifications
- Launch Service Tech Training outside of the UK, starting in Dubai

THANK YOU



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