# Job roles made for you in the Aerospace industry

There are a huge range of manufacturing and engineering jobs that enable all civil and military aircraft, unmanned aircraft and helicopters to fly.

Your passion in Science,
Technology, Engineering
and Maths can fuel the
design, development,
manufacture, modification,
testing, operation and
maintenance of flight
vehicles and their on-board
and ground systems.

Did you know?

An Airbus A380 commercial passenger airliner has 4,000,000 parts.

The cutting-edge Joint Strike Fighter is part of a \$195 billion investment in Defence over the next decade.

The tiny Cessna 172 holds the world flight endurance record at 64 days, 22 hours, 19 minutes and 5 seconds.

There are 15,584 registered aircraft flying to 1,700 airports and airfields in Australia – and many more private airstrips.\*

Australia has 1,478 Remotely Piloted Aircraft Operator's Certificate holders - significantly more than Manned Aviation Operator's Certificate holders.\*

IBSA Manufacturing and the Aerospace Industry Reference Committees are responsible for vocational training qualifications in the aerospace sector as part of the broader manufacturing industries.

Innovation & Business Skills Australia (IBSA) acknowledges the financial support received by the Commonwealth to operate as a Skill Service Organisation.

www.ibsa.org.au





# Roles you may already know

### Vocational Education (VET)

Aircraft maintenance engineers (avionics) maintain, repair and inspect electrical, electronic, instrument, radio components and avionic systems.

**Aircraft maintenance engineers (mechanical)** repair and maintain airframes, engines and associated systems for airplane and helicopters.

Aircraft maintenance engineers (structures) inspect, disassemble and reassemble aircraft structures and repair and replace components of aircraft frames.

Engineering production systems workers perform a range of production process tasks including assembling components and working on production line operations finishing metal products such as tubing and moulds.

**Metal engineering process workers** perform routine tasks in manufacturing metal products including operating power hammers, spot welding components and assembling items.

**Metal fitters and machinists** set up and operate precision metal cutting and grinding machines to make and repair items made from metals and plastics to space-age alloys.

**Industrial spraypainter/sand blaster/surface finishers** prepare product surfaces and applies protective and decorative coatings to manufactured items or structures.

## **Higher Education**

**Aeronautical engineers** design and test products for aircrafts, spacecrafts, satellites, and missiles.

**Aerospace engineers** design and coordinate the building of aircraft such as commercial and military airplanes, helicopters, rockets and spaceships.

# That's not all

Advanced manufacturing processes are creating new roles like:

- Robot coordinators
- Carbon fibre technicians
- Drone software developers
- Unmanned systems engineers



Photos courtesy of Hawker Pacific and Lomax Media