



Wayne  
County  
Community  
College  
District

# Aviation Mechanics: Airframe/Powerplant

## PAY

In May 2019, the median annual wage for aircraft mechanics and service technicians was \$64,310.

## JOB OUTLOOK

Employment of aircraft and avionics equipment mechanics and technicians is projected to increase 3 percent from 2018 to 2028. Job prospects will be best for mechanics who hold an Airframe and Powerplant (A&P) certificate.

*Bureau of Labor Statistics, U.S. Department of Labor, Occupational Outlook Handbook, April 2020, Aircraft and Avionics Equipment Mechanics and Technicians, on the Internet at <http://www.bls.gov/ooh/installation-maintenance-and-repair/aircraft-and-avionics-equipment-mechanics-and-technicians.htm>*

## ABOUT THE PROGRAM

The Aviation Mechanics Associate of Applied Science and College Certificate programs offer two options: Airframe and Powerplant. The programs are designed to prepare students for entry into a variety of occupations, which require competence in the areas of airframe and powerplant technology. Students completing the certificate or the Associate of Applied Science Degree program will be qualified to obtain a Federal Aviation Administration (FAA) Certificate to be licensed as an airframe or powerplant technician. Students seeking career advancement in the field or transfer to a four-year institution should elect the Associate of Applied Science Degree. Students who wish to prepare only for the FAA license should select the Certificate.



## WHAT DO AIRCRAFT AND AVIONICS EQUIPMENT MECHANICS AND TECHNICIANS DO?

Aircraft and avionics equipment mechanics and technicians repair and perform scheduled maintenance on airplanes and helicopters. They also inspect airplanes and helicopters as required by the Federal Aviation Administration (FAA).

## WHERE DO THEY WORK?

Aircraft and avionics equipment mechanics and technicians work in hangars, in repair stations, or on airfields. To maintain flight schedules, they must often meet strict deadlines. Most mechanics and technicians work full-time, and overtime and weekend work is common.



# Recommended Sequence of Courses

## Aviation Mechanics (Airframe): College Certificate

Note: Courses from the following are required to achieve a Federal Aviation Administration (FAA) Certificate in Aviation Mechanics Airframe:

### Airframe Section

AFM 201 Basic Sheet Metal	.8
AFM 202 Non-Metallic Structures and Finishes	.8
AFM 203 Airframe Electrical	.8
AFM 204 Aircraft Navigation and Communications	.8
AFM 205 Assembly and Rigging and Aircraft Systems	.8
AFM 206 Landing Gear Systems and Airframe Inspections	.8

**AVIATION AIRFRAME CERTIFICATE TOTAL: . . . . .48**

## Aviation Mechanics (Airframe):

### Associate of Applied Science

#### GENERAL EDUCATION COURSES

ENG 119 English I	.3
ENG 120 English II	.3
PS 101 American Government	.3
Natural Science with Lab	.4

**GENERAL EDUCATION TOTAL: . . . . .13**

#### OCCUPATIONAL SUPPORT COURSES

MAT 155 College Algebra	.4
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**OCCUPATIONAL SUPPORT TOTAL: . . . . .4**

#### AIRFRAME OCCUPATIONAL SPECIFIC COURSE

(Courses from the following required to achieve a Federal Aviation Administration (FAA):

### Air Science Section

ATP 101 Introduction to Aviation I	.8
ATP 102 Introduction to Aviation II	.8
ATP 103 Basic Electricity	.8
ATP 104 Materials, Fuel, Fire and Corrosion	.8

**AIR SCIENCE SECTION TOTAL . . . . .32**

### Airframe Section

AFM 201 Basic Sheet Metal	.8
AFM 202 Non-Metallic Structures and Finishes	.8
AFM 203 Airframe Electrical	.8
AFM 204 Aircraft Navigation and Communications	.8
AFM 205 Assembly and Rigging and Aircraft Systems	.8
AFM 206 Landing Gear Systems and Airframe Inspections	.8

**AIRFRAME SECTION TOTAL . . . . .48**

**AIRFRAME A.A.S. PROGRAM TOTAL: . . . . .97**

Note: Program totals may not include prerequisites.

## Aviation Mechanics (Powerplant): College Certificate

Note: Courses from the following are required to achieve a Federal Aviation Administration (FAA) Certificate in Aviation Mechanics Powerplant:

### Powerplant Section

PPM 201 Reciprocating Engine Operation	.8
PPM 202 Reciprocating Engine Systems	.8
PPM 203 Reciprocating Engine Overhaul and Troubleshooting	.8
PPM 204 Propellers and Turbine Engine Operation	.8
PPM 205 Turbine Engine Designs, Accessories and Instruments	.8
PPM 206 Turbine Engine Overhaul and Troubleshooting	.8

**AVIATION POWERPLANT CERTIFICATE TOTAL . .48**

## Aviation Mechanics (Powerplant):

### Associate of Applied Science

#### GENERAL EDUCATION COURSES

ENG 119 English I	.3
ENG 120 English II	.3
PS 101 American Government	.3
Elective: Natural Science with Lab	.4

**GENERAL EDUCATION TOTAL . . . . .13**

#### OCCUPATIONAL SUPPORT COURSES

MAT 155 College Algebra	.4
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**OCCUPATIONAL SUPPORT TOTAL . . . . .4**

#### POWERPLANT OCCUPATIONAL SPECIFIC COURSES

Courses from the following required to achieve a Federal Aviation Administration (FAA):

### Air Science Section

ATP 101 Introduction to Aviation I	.8
ATP 102 Introduction to Aviation II	.8
ATP 103 Basic Electricity	.8
ATP 104 Materials, Fuel, Fire and Corrosion	.8

**AIR SCIENCE SECTION TOTAL . . . . .32**

### Powerplant Section

PPM 201 Reciprocating Engine Operation	.8
PPM 202 Reciprocating Engine Systems	.8
PPM 203 Reciprocating Engine Overhaul and Troubleshooting	.8
PPM 204 Propellers and Turbine Engine Operation	.8
PPM 205 Turbine Engine Designs, Accessories and Instruments	.8
PPM 206 Turbine Engine Overhaul and Troubleshooting	.8

**POWERPLANT SECTION TOTAL . . . . .48**

**POWERPLANT A.A.S. PROGRAM TOTAL . . . . .97**

Note: Program totals make not include prerequisites.

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