

## Master Syllabus

### AVT 2143 - Review & Recommendation

**Division:** Science, Mathematics and Engineering

**Department:** Aviation Technology

**Credit Hour Total:** 2.0

**Lecture Hrs:** 2.0

**Other Prerequisite(s):** Approval of Department

**Date Revised:** October 2013

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### Course Description:

This course provides the aviation mechanic with critical review for the required Federal Aviation Administration (FAA) knowledge exams in the following areas under Part 147 Appendixes B, C and D: General, Airframe, and Powerplant aviation maintenance subjects with hands-on review in preparation for oral and practical exams.

### General Education Outcomes:

- ❑ Oral Communication Competency
- ❑ Written Communication Competency
- ❑ Critical Thinking/Problem Solving Competency
- ❑ Values/Citizenship/Community Competency
- ❑ Computer Literacy Competency
- ❑ Information Literacy Competency

### Course Outcomes:

#### Turbine engines

Demonstrate a knowledge of turbine engines to include the following: types of turbine engines, modules of a turbine engine, engine electrical components, lubricating systems, inspection, safety requirements, removal and installation.

**Assessment Method:** Locally developed exams

**Performance Criteria:** 70% or higher on exams

#### Reciprocating engines

Demonstrate knowledge of the operation of reciprocating engines to include the following: magnetos, magneto timing to engine, engine electrical, lubrication, fuel metering, and regulations,

**Assessment Method:** Locally developed exams

**Performance Criteria:** 70% or higher on exams

#### Regulations for maintenance

Demonstrate in-depth knowledge of Federal Aviation Regulations to include the following: part 39, part 43, part 65, part 91, Airworthiness Directives, manufacturers' manuals, Service Bulletins, and Service Letters.

**Assessment Method:** Locally developed exams

**Performance Criteria:** 70% or higher on exams

### Outline:

Electricity, AC and DC circuits  
Regulations for maintenance  
Structures of airplanes  
Reciprocating engines  
Turbine engines  
Recommendation testing