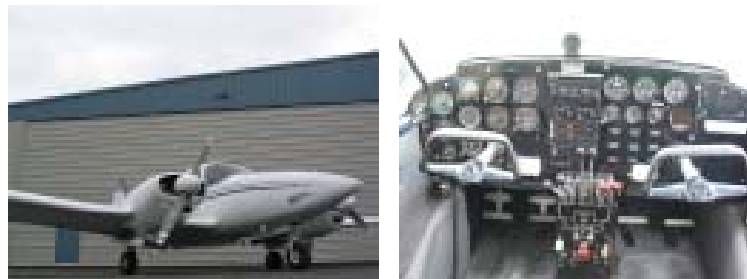




## Multi Engine Syllabus



Part 61  
Federal Aviation Regulations

# Phase one – Solo

## Lesson One -

Ground	Flight
Course and Objectives	Use of Checklist
FAR 61 – 91	Preflight inspection
ME aerodynamics	Cockpit Management
Service Ceiling	Starting Procedures
Absolute Ceiling	Taxi
SE Service Ceiling	Run-up
SE Absolute Ceiling	Normal Take off
Critical Engine	Four basics
P-Factor	Steep Turns
Counter rotating Props	Slow Flight
Review POH	Power off Stall
	Power on Stall
	Collision avoidance
	Normal approach and landing
	Post flight

Lesson Complete: \_\_\_\_\_ Date

## Lesson Two - Dual

Student preflight – Instructor monitor

Student does: Taxi and Run-up – Instructor monitor

Take off - Instructor assists

Traffic avoidance

Straight and level flight – Student practice

Climbs, descents, and turns – Student practice

Climbing and descending turns – Student practice

Demonstrate flight at various airspeeds and minimum controllable airspeed

Demonstrate power-off stall

Student practice - Flight at various airspeeds, minimum controllable airspeed and power-off stall

Demonstrate flight at minimum controllable airspeed

Student practice

Student Practice lesson one and two

Demonstrate Landing

Completion standards

Altitude within 300 feet

Headings within 30 degrees

Lesson Complete: \_\_\_\_\_ Date

### Lesson three - Dual

Student preflight, Start Engine, Call for taxi clearance, Taxi, Run up, Call tower for take off clearance, Take off, climb out and level off at assigned altitude - Instructor Monitor

Review slowflight and stall.  
Demonstrate Departure, arrival, and accelerated stalls.  
Student practice

Demonstrate Steep turns  
Student practice

Student practice lesson 1,2, and 3

Demonstrate Landing

Completion standards  
Altitude within 200 feet  
Headings within 20 degrees  
Bank angle within 10 degrees

Lesson Complete: \_\_\_\_\_ Date

## Lesson four - Dual

Student should be able to: preflight, taxi, run up, take off, and lesson one unassisted. – Instructor monitor. Instructor assist with radio if needed.

Review and Practice lesson two and three.

Demonstrate Emergency Procedures:

- 1 Engine Failure
- 2 Engine Fire in flight
- 3 Emergency Descent

Student Practice

Demonstrate ground reference maneuvers: Turns around a point and “S” turns across a road.

Student practice

Student Landing – Instructor assist

Completion standards

Altitude within 200 feet

Headings within 20 degrees

Bank angle within 10 degrees

Lesson Complete: \_\_\_\_\_ Date

## Lesson five - Dual

Student does complete unassisted preflight, radio, taxi, run up, take off.

Practice lesson 1,2,3,4 until completion standards are met.

Demonstrate Cross wind take off and landings, Slips to a landing, and Go-Around

Student practice landings – Instructor assist

Completion standards

Altitude within 200 feet

Headings within 20 degrees

Bank angle within 10 degrees

Outcome of every maneuver never in doubt

Lesson Complete: \_\_\_\_\_ Date

Lesson six – Dual and Solo

Student does complete unassisted preflight, radio, taxi, run up, take off.

Student Landings – Instructor assist

Student practice take off and landings until consistently landing the airplane with confidence, at correct airspeed, on center line with positive use of all controls.

First supervised solo!

Lesson Complete: \_\_\_\_\_ Date

Lesson Seven – Dual and Solo

Student will demonstrate that he or she is proficient in all aspects of flight.  
Instructor monitor

Second Supervised solo

Lesson Complete: \_\_\_\_\_ Date

Lesson eight - Solo

Third Supervised solo

Student will practice take off and landings totally unassisted.

Lesson Complete: \_\_\_\_\_ Date

## Lesson nine – Dual and Solo

Instructor will introduce student to Arlington airport, discussing arrival procedures, including AWOS, Unicom, and traffic pattern entries and exits.

Student will practice entering and exiting pattern and communications at uncontrolled airports

Instructor will discuss arrival and traffic patterns used at Paine Field.

Student will practice entering and exiting pattern and communications at controlled airports

### Completion standards

Altitude within 200 feet

Headings within 20 degrees

Bank angle within 10 degrees

Outcome of every maneuver never in doubt

Lesson Complete: \_\_\_\_\_ Date

Lesson 10, 11, and 12 – Solo

Student will practice all maneuvers in lessons 1 – 9 solo.

There will be a minimum of three hours of supervised solo in these lessons.

Completion standards

Private Pilot Practical Test Standards (PTS)

And

Outcome of every maneuver never in doubt

Lesson Complete: \_\_\_\_\_ Date

Lesson 13 – Dual

Solo Phase check

Completion standards

Private Pilot Practical Test Standards

And

Outcome of every maneuver never in doubt

Lesson Complete: \_\_\_\_\_ Date

# Phase two – Cross-Country

## Lesson One – Dual

Student will plan a dual cross-country flight from Paine Field (PAE) to Port Angeles (CLM) to Bellingham (BLI) and return.

Leg one – PAE-CLM the student will fly using only pilotage navigation

Leg two – CLM – BLI the student will fly using only dead reckoning navigation

Leg three – BLI – PAE the student will fly using only VOR navigation

## Completion standards

Private Pilot Practical Test Standards

And

Outcome of every maneuver never in doubt

Lesson Complete: \_\_\_\_\_ Date

## Lesson two – Solo

The student will plan and fly a cross country from PAE – BLI – CLM – PAE using his/her choice of navigation.

Completion standards

Private Pilot Practical Test Standards

And

Outcome of every maneuver never in doubt

Lesson Complete: \_\_\_\_\_ Date

### Lesson three – Solo

The student will plan and fly a cross-country from PAE – HQM – UIL – PAE using his/her choice of navigation.

Completion standards

Private Pilot Practical Test Standards

And

Outcome of every maneuver never in doubt

Lesson Complete: \_\_\_\_\_ Date

## Lesson four – Dual

The student will plan and fly a night cross-country from PAE – OLM – SEA – PAE using Victor airways to OLM, and then Direct to SEA.

Upon leaving OLM the student will contact Seattle Approach Control on the appropriate frequency and request VFR flight following and clearance through the Class “B” airspace around SEA.

The flight will not land at SEA, but rather over-fly the airport at an altitude assigned by Seattle Approach Control. The flight will depart the Class “B” to the east and fly Direct PAE.

Completion standards

Private Pilot Practical Test Standards

And

Outcome of every maneuver never in doubt

Lesson Complete: \_\_\_\_\_ Date

## Lesson five – Dual

The student will practice night take off and landing at PAE until the three hour minimum as required by the FAR has been met. In addition, the student will have made the minimum 10 night landings (to a full stop) as required by the FAR. A total of three hours and 10 takeoff and landings must be completed prior to progressing to the next lesson.

Completion standards

Private Pilot Practical Test Standards

And

Outcome of every maneuver never in doubt

Lesson Complete: \_\_\_\_\_ Date

Lesson six – Dual

The student will learn the technique used to take off and land from short, or soft runways.

Emphasis will be placed on runway alignment, and airspeed control.

Completion standards

Private Pilot Practical Test Standards

And

Outcome of every maneuver never in doubt

Lesson Complete: \_\_\_\_\_ Date

## Lesson seven – Dual

The student will learn attitude instrument flight (solely by reference to instruments) in simulated or actual instrument conditions.

Included maneuvers are:

- Straight and level
- Climbs – descents
- Turns (normal and steep)
- VOR intercept and tracking
- Recovery from unusual attitudes
- Lost procedures

This lesson may be spread over two or three flights depending on the student's ability to stay focused on the tasks.

Completion standards

Private Pilot Practical Test Standards

And

Outcome of every maneuver never in doubt

Lesson Complete: \_\_\_\_\_ Date

# Phase three – Practical Test Prep

## Lesson One – Dual

The student will Demonstrate all maneuvers listed in the Private Pilot Practical Test Standards as requested by the instructor. This mock check ride will allow the Student to gain the confidence he/she needs to become a safe and competent Private Pilot.

Again this lesson may cover more than one flight, and will conclude when the student demonstrates that he/she can perform each maneuver in the PTS with in the tolerance given and safely.

In every case the lesson will be three hours in length as required by the FAR.

Completion standards

Private Pilot Practical Test Standards

And

Outcome of every maneuver never in doubt

Lesson Complete: \_\_\_\_\_ Date

Lesson two –

Flight with FAA Designated Examiner

Issue Private Pilot Certificate

Lesson Complete: \_\_\_\_\_ Date

Total time allocated to each lesson

Phase	Lesson	Dual	Solo	Total
1	1	1.0		1.0
	2	1.0		2.0
	3	1.0		3.0
	4	1.0		4.0
	5	1.0		5.0
	6	5.5	.5	11.0
	7	.5	1.0	12.5
	8		1.5	14.0
	9	2.0		16.0
	10		1.0	17.0
	11		1.0	18.0
	12		1.0	19.0
	13	1.5		20.5
<b>Total phase 1</b>		<b>14.5</b>	<b>6</b>	<b>20.5</b>
2	1	2.5		23.0
	2	0	2.5	25.5
	3	0	3.5	29.0
	4	2.0		31.0
	5	1.0		32.0
	6	3.0		35.0
	7	2.0		37.0
<b>Total phase 2</b>		<b>10.5</b>	<b>6.0</b>	<b>37.0</b>
3	1	3.0		40.0
<b>Total Time</b>		<b>28.0</b>	<b>12.0</b>	<b>40.0</b>

Lesson Complete: \_\_\_\_\_ Date