



**Instrument Pilot
Rating Course
(ASEL)
Training Syllabus
FAR Part 61**

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**Instrument Pilot
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(ASEL)
Ground Training
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TECH AVIATION FLIGHT SCHOOL, INC.

**INSTRUMENT PILOT CERTIFICATION COURSE
AIRPLANE SINGLE-ENGINE LAND (ASEL)
GROUND TRAINING SYLLABUS**

PRINT STUDENT NAME:

LAST NAME, FIRST NAME

**_____/_____/_____
DATE (mm/dd/yyyy)**

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INTRODUCTION

This ground training syllabus is designed to allow the pilot applicant to acquire the aeronautical knowledge needed to safely operate as an Instrument Rated Pilot and satisfactorily complete the Instrument Pilot Knowledge Test.

Within this syllabus, there are three stages and fifteen separate lessons, each with stated objectives and completion standards that must be satisfied in order for the lesson to be complete. Adequate knowledge of the specified study material is necessary for satisfactory progress in the individual lessons and for overall progress in the course. The individual lesson times are not mandatory. The hours in each lesson are primarily for instructor and student guidance. Total specified training hours at the end of the course completion must be met (30 hours). However, before a student can receive a logbook endorsement or a ground school completion certificate, the sequence of lessons, including the course completion examination, must be satisfactorily completed.

Every lesson contains a training outline and a detailed list of items that the student must successfully complete. Normally, a lesson is complete in this allotted time. If a student is unable to master the lesson in the specified time, it is necessary to repeat all or portion of the lesson until completion standards are met.

This syllabus has lesson evaluations that check the student's progress. The course completion check at the end of this course assures that the student acquired the aeronautical knowledge required to satisfactorily complete the FAA Instrument Pilot (ASEL) Knowledge Test. The examination questions are extracted from the current FAA Private Pilot Knowledge Test questions in appropriate subject matter areas, or a reasonable facsimile.

A record of the ground training received, shall be formally documented on a chronological log of student attendance, including lessons covered, and names and grades of any tests taken.

TRAINING SYLLABUS

I. ENROLLMENT PREREQUISITES: There are no specific requirements to enroll in this ground training course. The applicant must hold a current private pilot certificate with an airplane single-engine land category and class rating prior to beginning the flight portion of the course. There are no prerequisites for beginning the ground training portion of this course.

II. GRADING CRITERIA
FOR THE STUDENT AND INSTRUCTOR:

I. The overall performance grade for each lesson completed is based on the evaluation assignments, knowledge, preparation, skill, attitude, and judgment of the student.

II. Grading criteria is to be based upon the building block method of instruction. A lesson is not complete unless the instructor is satisfied with the student's performance in all areas, and awards the student a grade of Satisfactory (S) or 70% or higher on the entire lesson. The above criteria should be used as a guideline for this assessment. Students will demonstrate satisfactory knowledge of lesson content and achievement of lesson objectives by active participation in class discussion and by correctly answering the instructor's verbal and written questions. Minimum passing score on the course completion examination is 70%. Incorrect responses shall be corrected to reinforce and ensure student understanding.

GROUND TRAINING LOG

Student Name: _____

	Lesson Time (h:min)	Actual Time Completed	Date Completed	Grade	Instructor Signature
301	1:30				
302	2:30				
303	2:00				
304	2:00				
305	2:00				
306	2:00				
307 <input type="checkbox"/>	2:00				
308	2:00				
309	2:00				
310	2:00				
311	2:00				
312 <input type="checkbox"/>	2:00				
313	2:00				
314	2:00				
315 <input type="checkbox"/>	2:00				
Total	30:00:00				

√ Denotes Stage Check

◆ Denotes End of Course Check

STAGE I

STAGE OBJECTIVE

During this stage, the student will review Instrument systems, Instrument Navigation, airports, airspace, flight information, departure, enroute, arrival, and approach procedures. In addition, the student will gain a greater understanding of what it means to fly by reference to flight instruments.

STAGE COMPLETION STANDARDS

This stage is complete when the student's cumulative lesson evaluations equal a minimum passing score of 70%, and the instructor has reviewed each incorrect response to ensure complete understanding before the student progresses to Stage II.

TECH AVIATION FLIGHT SCHOOL, INC.

Instrument Pilot Certification Course-ASEL

Ground Training Syllabus

LESSON 301: (1.5 Hours, Ground Instruction)

I. OBJECTIVE:

- Review knowledge of private pilot privileges.
- Become familiar with advanced pilot training and opportunities.
- Gain an understanding of the advanced human factors concepts related to aviation.

II. ACADEMIC CONTENT:

CHECK LIST

Course Overview:

Course Elements	_____
Course Material	_____
Exams and Tests	_____
Policies and Procedures	_____

Instrument Training and Opportunities:

Instrument Flight	_____
Instrument Training	_____

Advanced Human Concepts

Aeronautical Decision Making	_____
Crew Resource Management	_____
The Decision-Making Process	_____
Pilot in Command Responsibilities	_____
Communications	_____
Resource Use	_____
Workload Management	_____
Situational Awareness	_____

Aviation Physiology

Spatial Disorientation	_____
Vestibular Disorientation	_____
Motion Sickness	_____
Hypoxia	_____
Prevention of Hypoxia	_____
Decompression Sickness	_____
Hyperventilation	_____
Stress	_____
Fatigue	_____
Alcohol and Drug	_____
Fitness for Flight	_____

III. COMPLETION STANDARDS:

- Demonstrate understanding of human factors, instrument training, and aviation physiology.
- Demonstrate understanding of the instrument ground training course.

LESSON 302: (2.5 Hours, Ground Instruction)

I. OBJECTIVE:

- Gain a working knowledge of the function and use of the flight instrument components and systems.
- Become familiar with limitations and common errors of the flight instrument systems and components
- Review the basic principles of attitude instrument flying.
- Gain a working knowledge of the instrument cockpit check.
- Become familiar with instrument system failures and partial panel procedures.

II. ACADEMIC CONTENT:

CHECK LIST

Flight Instrument Systems:

FAA Instrument Requirements _____

Pilot's Operating Handbook _____

Gyroscopic Flight Instruments _____

System Operation _____

System Errors _____

Instrument Check _____

Magnetic Compass _____

System Operation _____

System Errors _____

Instrument Check _____

Pitot-Static Instruments _____

System Operation _____

System Errors _____

Instrument Check _____

Attitude Instrument Flying:

Instrument Cross-Check _____

Instrument Interpretation _____

Aircraft Control _____

Primary / Support Concept _____

Control and Performance _____

Basic Flight Maneuvers _____

Straight-and-Level _____

Standard-Rate Turns _____

Steep Turns _____

Constant Airspeed Climbs _____

Constant Rate Climbs _____

Constant Airspeed Descents _____

Constant Rate Descents _____

Level off from Climbs and Descents _____

Climbing and Descending Turns _____

Stalls _____

LESSON 302: (continued)

Instrument Failures	_____
Identifying and Instrument Failure	_____
Attitude Indicator Failure	_____
Heading Indicator Failure	_____
Partial Panel Flying	_____
Magnetic Compass Turns	_____
Timed Turns	_____
Pitot-Static Instrument Failures	_____
Unusual Attitude Recovery	_____
Nose-High Attitude	_____
Nose-Low Attitude	_____
Partial Panel Unusual Attitude Recovery	_____

III. COMPLETION STANDARDS:

- Demonstrate understanding of IFR instrument requirements as well as instrument flight systems, instrument operations, and instrument errors.
- Demonstrates understanding of basic attitude instrument flight.
- Exhibits knowledge of partial panel instrument flight procedures.

LESSON 303: (2.0 Hours, Ground Instruction)

I. OBJECTIVE:

- Learn the function, use, and limitations of VOR, DME, and ADF radio equipment for navigation.
- Become familiar with other types of instrument navigation including RNAV and GPS.

II. ACADEMIC CONTENT:

CHECK LIST

Instrument Navigation:

VOR Navigation

Internal workings of VOR

Horizontal Situation Indicator

Intercepting a Radial

Tracking

Determining Your Progress

Time and Distance to a Station

Station Passage

VOR Limitations

Distance Measuring Equipment

DME Arcs

ADF Navigation

Internal workings of ADF

Radio Magnetic Indicator

Intercepting a Bearing

Tracking

Time and Distance to a Station

Station Passage

Operational Considerations

Ground Facilities

VOR Checks

Identification

RNAV / GPS / INS

Internal workings of RNAV

Internal workings of GPS

Internal workings of INS

III. COMPLETION STANDARDS:

- Demonstrate understanding of the use and limitations of navigation systems.

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Instrument Pilot Certification Course-ASEL

Ground Training Syllabus

LESSON 304: (2.0 Hours, Ground Instruction)

I. OBJECTIVE:

- Study and become familiar with the airport environment, including collision avoidance, and runway incursion avoidance.
- Gain specific knowledge of the National Airspace System
- Gain a basic understanding of the sources of flight information, particularly the Aeronautical Information Manual and FAA Advisory Circulars dealing with IFR flight.
- Learn the types of services provided by air traffic control systems.
- Become familiar with the various enroute and terminal facilities and their use for flight under IFR.

II. ACADEMIC CONTENT:

CHECK LIST

Airports, Airspace, and Flight Information:

Airports

Runway Markings

Taxiway Markings

Airport Signs

Runway Incursion Avoidance

Land and Hold Short Operations

Approach Light Systems

Approach Light System

Visual Glide Slope Indications

Runway Lighting

Airport Beacon and Obstruction Lights

Airspace

Controlled Airspace

Class A, B, C, D, and E

Special VFR

Class G Airspace

Aircraft Special Limits

Special Use Airspace

Other Airspace Areas

ADIZ

Flight Information

Aeronautical Information Manual

Airport / Facility Directory

Notices to Airman (NOTAMs)

International Flight Information Manual

Advisory Circulars

LESSON 304: (Continued)

Air Traffic Control:

Air Route Traffic Control Center	_____
ARTCC Traffic Separation	_____
Processing the IFR Flight Plan	_____
Weather Information	_____
Safety Alerts	_____
Emergency Assistance	_____
Terminal Facilities	_____
ATIS	_____
Clearance Delivery	_____
Control Tower	_____
Approach and Departure	_____
Radar Services for VFR Aircraft	_____
Flight Service Stations	_____

III. COMPLETION STANDARDS:

- Demonstrate understanding of airport environment and lighting, as well as airspace usage and sources of flight information.
- Demonstrate understanding of enroute and terminal ATC services.

LESSON 305: (2.0 Hours, Ground Instruction)

I. OBJECTIVE:

- Learn the format and symbology used to present information on departure and arrival charts.
- Gain a working knowledge of departure and arrival procedures.

II. ACADEMIC CONTENT:

CHECK LIST

Departures:

- Departure Charts _____
 - Obtaining Charts _____
 - Departure Standards _____
 - Instrument Departure Procedures _____
 - Standard Instr. Departures _____
 - Pilot Nav DP _____
 - Vector DP _____
 - Chart Format and Symbology _____
- Departure Procedures _____
 - Takeoff Minimums _____
 - Departure Options _____
 - Graphic Departure Procedures _____
 - Textual Departure Procedures _____
 - Radar Departures _____
 - VFR Departures _____
 - Selecting a Departure Method _____

Arrivals:

- Arrival Charts _____
 - Standard Terminal Arrival Route _____
 - Interpreting the STAR _____
 - Vertical Navigation Planning _____
- Arrival Procedures _____
 - Preparing for the Arrival _____
 - Reviewing the Approach _____
 - Altitude _____
 - Airspeed _____

III. COMPLETION STANDARDS:

- Demonstrate understanding of instrument departure and arrival procedures and related considerations.

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Instrument Pilot Certification Course-ASEL

Ground Training Syllabus

LESSON 306: (2.0 Hours, Ground Instruction)

I. OBJECTIVE:

- Gain a working knowledge of enroute and area charts.
- Learn the symbology used to present information and the applicable procedures for IFR enroute operations.
- Gain working knowledge of holding patterns including entry, timing, and communication.

II. ACADEMIC CONTENT:

CHECK LIST

Enroute:

Enroute and Area Charts	_____
Enroute Charts	_____
Front Panel	_____
Navigation Aids	_____
Victor Airways	_____
Communication	_____
Airports	_____
Airspace	_____
Area Charts	_____
Enroute Procedures	_____
Enroute Radar Procedures	_____
Communications	_____
Reporting Procedures	_____
Enroute Navigation Using GPS	_____
Special Use Airspace	_____
IFR Cruising Altitude	_____
Descending From the Enroute Segment	_____

Holding:

Holding Procedures	_____
Standard and Nonstandard Patterns	_____
Outbound and Inbound Timing	_____
Crosswind Correction	_____
Maximum Holding Speed	_____
Direct Entry	_____
Teardrop Entry	_____
Parallel Entry	_____
Visualizing Entry Procedures	_____
ATC Holding Instructions	_____

III. COMPLETION STANDARDS:

- Demonstrate understanding of enroute charts as well as enroute navigation and communication procedures.
- Demonstrate understanding of holding entry and procedures.

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Instrument Pilot Certification Course-ASEL

Ground Training Syllabus

LESSON 307: (2.0 Hours, Ground Instruction)

IV. OBJECTIVE:

- Begin to learn how to interpret and use information published on instrument approach charts.
- Learn the procedures used to transition from the enroute segment to the approach segment.
- Increase understanding and knowledge of approach procedures.

V. ACADEMIC CONTENT:

CHECK LIST

Approach Charts:

Approach Segments

Initial Approach Segment

Intermediate Approach Segment

Final Approach Segment

Missed Approach Segment

Chart layout

Heading Section

Briefing Information

Minimum Safe Altitude

Plan View

Profile View

Step Down Fix VDP

Missed Approach Icons

Conversion Table

Landing Minimums

Aircraft Approach Categories

Minimum Descent Requirements

Visibility Requirements

Inoperative Components

Airport Chart

Heading and Communication Sections

Plan View and Additional Runway Info.

Takeoff and Alternate Minimums

LESSON 307: (2.0 Hours, Continued)

Approach Procedures:

- Preparing for the Approach _____
- Approach Chart Review _____
- Approach Clearance _____
- Executing the Approach _____
- Straight-In Approaches _____
- Use of ATC Radar for Approaches _____
- Approaches with a Required Course Reversal _____
- Timed Approaches From Holding Fix _____
- Final Approach _____
- Circling Approaches _____
- Sidestep Maneuver _____
- Missed Approach Procedures _____
- Visual and Contact Approaches _____

VI. COMPLETION STANDARDS:

- Demonstrate understanding of approach operations and procedures.
- Demonstrate understanding of instrument approach charts.

STAGE II

STAGE OBJECTIVE

During this stage, the student will learn the specific elements of VOR, NDB, LOC, ILS and GPS Instrument Approach procedures and IFR Flight Planning. They will also expand their knowledge of meteorology, weather forecasting and weather interpretation.

STAGE COMPLETION STANDARDS

This stage is complete when the student's cumulative lesson evaluations equal a minimum passing score of 70%, and the instructor has reviewed each incorrect response to ensure complete understanding.

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Instrument Pilot Certification Course-ASEL

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LESSON 308: (2.0 Hours, Ground Instruction)

I. OBJECTIVE:

- Learn procedures and methods necessary to perform VOR and NDB approaches.

II. ACADEMIC CONTENT:

CHECK LIST

Approach Procedures

VOR

VOR Approach Procedures

Off-Airport Facilities

On-Airport Facilities

VOR / DME Approach Procedures

NDB

NDB Approach Procedures

Radar Vectors to the Approach

III. COMPLETION STANDARDS:

- Demonstrate understanding of VOR and NDB approach procedure.
- Has working knowledge of approach chart symbology, information and layout.

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Ground Training Syllabus

LESSON 309: (2.0 Hours, Ground Instruction)

I. OBJECTIVE:

- Gain knowledge of ILS and LOC components and approach Procedures.
- Gain knowledge of GPS approaches.

II. ACADEMIC CONTENT:

CHECK LIST

Precision Approaches:

ILS

- ILS Categories and Minimums _____
- ILS Components _____
- Inoperative Components _____
- Flying the ILS _____
- Straight-In (NoPT) ILS Approach _____
- ILS Approach with Course Reversal _____
- ILS/DME Approach _____
- Radar Vectors to ILS Final _____
- ILS Approach to Parallel Runways _____
- Simultaneous Converging Instrument App _____

Non-Precision Approaches:

LOC

- Localizer Approach _____
- Localizer Back Course Approach _____

LDA, SDF, and MLS

- Overview of LDA, SDF, and MLS _____

GPS

- GPS Approach _____

III. COMPLETION STANDARDS:

- Demonstrate understanding of the various methods of conducting and ILS approach.
- Demonstrate understanding of the LOC and GPS approach procedures.

LESSON 310: (2.0 Hours, Ground Instruction)

IV. OBJECTIVE:

- Become familiar with the factors affecting weather patterns and hazards related to flight operations.

V. ACADEMIC CONTENT:

CHECK LIST

Weather Factors:

- The Atmosphere _____
- Atmospheric Circulation _____
- Pressure and Wind Patterns _____
- Moisture, Precipitation, and Stability _____
- Types of Clouds _____
- Airmass _____
- Fronts _____
- High Altitude Weather _____

Weather Hazards:

- Recognition of Critical Weather Situations _____
- Thunderstorms _____
- Thunderstorm Avoidance _____
- Low Level Turbulence _____
- Turbulence _____
- Wake Turbulence _____
- Clear Air Turbulence _____
- Mountain Wave Turbulence _____
- Reporting Turbulence _____
- Wind Shear _____
- Low Visibility _____
- Volcanic Ash _____
- Icing _____
- Hydroplaning _____
- Cold Weather Operations _____

VI. COMPLETION STANDARDS:

- Demonstrate understanding of weather factors and weather hazards.

LESSON 311: (2.0 Hours, Ground Instruction)

VII. OBJECTIVE:

- Learn to retrieve and interpret printed weather reports and forecasts.
- Understand the information displayed on graphic weather products and how to use each product.
- Learn How to access preflight and in-flight sources of weather information.
- Learn How to interpret and use weather information for planning and in-flight purposes.

VIII. ACADEMIC CONTENT:

CHECK LIST

Printed Reports and Forecasts:

Reports

Aviation Routine Weather Reports (METAR) _____

Radar Weather Reports _____

Pilot Weather Reports _____

Forecasts

Terminal Aerodrome Forecast _____

Aviation Area Forecast _____

Winds and Temperatures Aloft Forecast _____

Severe Weather Reports and Forecasts _____

Graphical Weather Products:

Reports

Surface Analysis Charts _____

Weather Depiction Charts _____

Radar Summary Chart _____

Satellite Weather Pictures _____

Composite Moisture Stability Chart _____

Constant Pressure Analysis Chart _____

Observed Wind and Temperature Aloft Chart _____

Forecasts

Low-Level Significant Weather Prog _____

High-Level Significant Weather Prog _____

Convective Outlook Chart _____

Forecast Winds and Temperature Aloft Chart _____

National Convective Weather Forecast _____

Volcanic Ash Forecast Transport and Dispersion Chart _____

TECH AVIATION FLIGHT SCHOOL, INC.

Instrument Pilot Certification Course-ASEL

Ground Training Syllabus

LESSON 311: (2.0 Hours, Continued)

Sources of Weather Information:

Preflight Weather Sources

Flight Service Station _____

Telephone Information Briefing Service _____

Direct User Access Terminal System _____

Private Industry Sources _____

The World Wide Web _____

In-Flight Weather Sources

AIRMET's and SIGMETs _____

Convective SIGMETs _____

Enroute Flight Advisory Service _____

Flight Service Station _____

Center Weather Advisories _____

Hazardous In-Flight Weather Advisory Service _____

Transcribed Weather Observing System _____

Weather Radar Services _____

Automated Surface Observing System _____

Automated Weather Observing System _____

IX. COMPLETION STANDARDS:

- Demonstrate ability to interpret and integrate information presented in graphic weather products.
- Demonstrate understanding of preflight and in-flight weather sources and their uses.

LESSON 312: (2.0 Hours, Ground Instruction)

X. OBJECTIVE:

- Obtain the knowledge necessary to successfully plan an IFR Flight.

XI. ACADEMIC CONTENT:

CHECK LIST

IFR Flight Planing:

Route Selection	_____
Flight Information Publications	_____
Weather Considerations	_____
Altitude Selection	_____
Completing the Navigation Log	_____
Filing the Flight Plan	_____
Closing the IFR Flight Plan	_____

XII. COMPLETION STANDARDS:

- Demonstrate understanding of IFR flight planning and factors affecting IFR flight.

STAGE III

STAGE OBJECTIVE

During this stage, the student will review the elements of IFR flight covered in Stage I and II. They will also gain knowledge in the areas of IFR Emergencies, Decision Making and Federal Aviation Regulations.

STAGE COMPLETION STANDARDS

This stage is complete when the student's cumulative lesson evaluations equal a minimum passing score of 70%, and the instructor has reviewed each incorrect response to ensure complete understanding.

LESSON 313: (2.0 Hours, Ground Instruction)

I. OBJECTIVE:

- Learn to recognize emergency situations and perform the correct emergency procedures.
- Obtain the knowledge necessary to make effective decisions.

II. ACADEMIC CONTENT:

CHECK LIST

IFR Decision Making	
Decision-Making Process	_____
IFR Accidents	_____
Poor Judgment Chain	_____
Assessing Risk	_____
Pilot-In-Command Responsibility	_____
Hazardous Attitudes	_____
Crew Relationships	_____
Communications	_____
Resource Use	_____
Workload Management	_____
Situational Awareness	_____
Controlled Flight Into Terrain	_____
IFR Emergencies	_____
Declaring an Emergency	_____
Minimum Fuel	_____
Gyroscopic Instrument Failure	_____
Communication Failure	_____
Emergency Approach Procedures	_____
Malfunction Reports	_____

III. COMPLETION STANDARDS:

- Demonstrate ability to recognize and respond appropriately to emergency situations.
- Demonstrates understanding of factors affecting the decision making process.

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Ground Training Syllabus

LESSON 314: (2.0 Hours, Ground Instruction)

I. OBJECTIVE:

- Review and become familiar with the Federal Aviation Regulations related to instrument flight.
- Understand the information from NTSB Part 830.

II. ACADEMIC CONTENT:

CHECK LIST

Regulations:

FAR Part 1

FAR Part 61

FAR Part 91

NTSB Part 830

III. COMPLETION STANDARDS:

- Student demonstrates understanding of the resources and regulations related to instrument flight.

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Ground Training Syllabus

LESSON 315: (2.0 Hours, Course Completion Exam)

I. OBJECTIVE:

- To evaluate the students retention of the material covered throughout this course.

II. ACADEMIC CONTENT:

CHECK LIST

Principles of Instrument Flight
The Flight Environment
Meteorology
Departure Charts and Procedures
Enroute Charts and Procedures
Arrival Charts and Procedures
Approach Charts and Procedures
Emergency Operations

III. COMPLETION STANDARDS:

- Demonstrate understanding of all areas that are covered in the FAA Instrument Pilot Written Exam.



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II	16 of 20	Lesson # 328	Orig	1/09/2004
II	17 of 20	Lesson # 329	Orig	1/09/2004
II	18 of 20	Lesson #330 Stage Check	Orig	1/09/2004
II	19 of 20	Lesson #331 End-Of-Course	Orig	1/09/2004
Appendix A	1 of 1	Enrollment / Graduation	Orig	1/09/2004

TECH AVIATION FLIGHT SCHOOL, INC.

**INSTRUMENT PILOT RATING COURSE
AIRPLANE SINGLE-ENGINE LAND (ASEL)
FLIGHT TRAINING SYLLABUS**

PRINT STUDENT NAME:

LAST NAME, FIRST NAME

**_____/_____/_____
DATE (mm/dd/yyyy)**

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INTRODUCTION

The Instrument Rating Course (Airplane) flight-training syllabus is designed to meet or exceeds the requirements of 14 CFR 61.65.

Its design will allow an enrolled appropriately rated Private or Commercial Pilot student to acquire the proficiency and experience needed to meet the certification requirements for adding a U.S. FAA Instrument Rating (Airplane) to an existing Private or Commercial Pilot Certificate (ASEL). The performance criteria specified in the syllabus is based on the current FAA Instrument Pilot (ASEL) Practical Test Standards (PTS). All enrolled students of this course must meet these standards before graduating from this course.

This flight-training syllabus contains two (2) stages and includes thirty-two separate lessons. Each lesson includes an objective and a completion standard. Each completion standard must be met in its entirety before that lesson may be considered complete. The individual lesson and stage times indicated are not mandatory and are included for flight instructor and student guidance only. However, before graduation from the course, a student must meet the following minimum training hours:

Dual Flight Training Instrument
40.0

Additional training requirements that must also be accomplished before graduation are included, as appropriate, in the Flight Training syllabus and the Instrument Pilot Ground Training Syllabus.

Within each stage, lesson sequences may be adjusted as necessary to accommodate training continuity problems. This is permitted as long as training objectives are not compromised.

The flight instructor will assign a grade “S”(Satisfactory), “U”(Unsatisfactory), or “I”(Incomplete) to each element within a lesson and an “S”, “U”, or “I” for the overall lesson grade. Dual lessons should be preceded and followed by pre-flight (pre) and post-flight (post) briefings. Although 14 CFR Part 141 does not specify a minimum number of hours for pre and post briefings, the amount of briefing time accomplished must be sufficient to ensure that the student understands the lesson objectives and completion standards for each lesson.

Every lesson contains an outline and detailed sequence of elements that the student must successfully complete. Normally, a lesson is expected to be satisfactory completed within the recommended time. However, if a student is unable to master the lesson in that time, it will be necessary to repeat those elements graded “I” or “U” until those lesson elements meet the lesson completion standards and are graded “S”.

At the end of each stage of training a stage check has been included to check the student’s progress. Each stage check must be accomplished satisfactorily before the student may continue training in the next stage. The final lesson of the flight-training syllabus is the stage check/end-of-course test. This lesson is designed to ensure that the student has acquired the aeronautical knowledge and flight skills required by the current FAA Commercial Pilot (ASEL) Practical Test Standards (PTS).

TRAINING SYLLABUS

- III. ENROLLMENT PREREQUISITES:** To enroll in the Instrument Rating Course (Airplane), the applicant must hold a current private or commercial pilot certificate with a single-engine land aircraft category and class rating prior to beginning the flight portion of the course.
- IV. GROUND TRAINING REQUIREMENTS:** The applicant must successfully complete all required ground training lessons including the Final Stage Check.
- V. FLIGHT TRAINING REQUIREMENTS:** The applicant must successfully complete all flight training lessons, stage checks, and end of course tests.
- VI. REQUIREMENTS FOR GRADUATION:** To obtain a graduation certificate for the Instrument Pilot Rating Course (ASEL), the applicant must:
- a.** Hold at least a current private pilot certificate with an airplane single-engine land category and class rating;
 - b.** Be able to read, speak, write, and understand the English language;
 - c.** Complete all ground training requirements;
 - d.** Complete all flight training requirements; and
 - e.** Hold a valid FAA medical certificate.

GRADING CRITERIA

FOR THE STUDENT AND INSTRUCTOR:

- III.** The overall performance grade for each lesson completed is based on the knowledge, preparation, skill, attitude, and judgment of the student.
- IV.** The standards to be used in the end of course tests will be at least those listed in the appropriate FAA Instrument Pilot (ASEL) Practical Test Standards.

The student should be evaluated on performance, both in academic ability as well as flying ability. A lesson is not complete until the instructor is satisfied that the student's performance meets the completion standards in all areas, and awards the student a grade of Satisfactory (S) on each element within the lesson, and a grade of 70% or higher or Satisfactory (S) on the entire lesson.

FLIGHT TRAINING WORKSHEETS

#	Date	Aircraft	Total Time	Grade	Dual	X-C Dual	IFR	ATD	Grd	Req. Total
INSTRUMENT STAGE I										
201									1.0	
202					1.0			1.0		1.0
203					1.5			1.5		1.5
204					1.5			1.5		1.5
205					1.2		1.0			1.2
206					1.5			1.5		1.5
207					1.5		1.3			1.5
208									1.0	
209					1.5			1.5		1.5
210					1.5			1.5		1.5
211					1.5		1.3			1.5
212					1.5		1.3			1.5
213v					1.5		1.3		1.0	1.5
STAGE I TOTAL:					15.7		6.2	8.5	3.0	15.7
INSTRUMENT STAGE II										
214									1.0	
215					1.5			1.5		1.5
216					1.5			1.5		1.5
217					1.5		1.3			1.5
218									1.0	
219					1.0			1.0		1.0
220					1.5			1.5		1.5
221					1.5		1.3			1.5
222									1.0	
223					1.5		1.3			1.5
224					1.5		1.3			1.5
225									1.0	
226					1.6	1.6	1.4			1.6
227					1.6	1.6	1.4			1.6
228					3.5	3.5	3.3			3.5
229									1.0	
230					1.1		0.9			1.1
231 v					1.5		1.3		1.5	1.5
232 ♦					1.5		1.3		1.5	1.5
STAGE II TOTAL:					22.3	6.7	14.8	5.5	8.0	22.3
OVERALL TOTAL:					38.0	6.7	21.0	14.0	11.0	38.0

√ Stage Check

♦ Course Completion Check

NOTE: All lessons indicating FTD (Flight Training Device) may also be completed in an appropriate aircraft.

STAGE I

STAGE OBJECTIVE

This stage provides the student with an introduction to attitude instrument flying with special emphasis on learning precise aircraft control and performance, and the fundamental skills of the instrument cross check, interpretation and aircraft control. Basic attitude instrument flight will be conducted with both a fully functioning panel of flight instruments and simulated instrument failure. Basic instrument navigation skills will be presented including the use of VOR, NDB / GPS, and DME navigation aids.

STAGE COMPLETION STANDARDS

At the completion of this stage the student shall demonstrate precise airplane attitude control by instrument reference as listed in the stage check completion standards, as well as a comprehensive understanding of the concept of control and performance. All tracking using navigation aids shall be accurate with the student maintaining position orientation at all times.

TECH AVIATION FLIGHT SCHOOL, INC.

Instrument Pilot Rating Course-ASEL

Flight Training Syllabus

DATE: ___/___/___

GRADE: _____

AIRCRAFT MODEL: _____

N _____

TIME LOG	GROUND LESSON					#201
	Dual	Cross Country	IFR	ATD	Ground	
Required					1.0	
Lesson Total						
Amount Forward						
Total to Date						
Required Total					1.0	

LESSON OBJECTIVE:

During this ground lesson, the student will be introduced to specific operations regarding weather and preflight.

Subject	Grade	Subject	Grade				
<i>Introduce</i>							
Weather Information	<table border="1"> <tr><td> </td></tr> <tr><td> </td></tr> <tr><td> </td></tr> <tr><td> </td></tr> </table>						
Aircraft Systems Related to IFR Operations							
Aircraft Instruments and Navigation Equip.							
Aircraft Preflight (IFR Emphasis)							

COMPLETION STANDARDS:

At the completion of this ground lesson, the student should be familiar with weather and preflight operations for flight in IFR conditions.

REMARKS: _____

 Student Signature

 Instructor Signature

 /
 Print Name

TECH AVIATION FLIGHT SCHOOL, INC.

Instrument Pilot Rating Course-ASEL

Flight Training Syllabus

DATE: ___/___/___

GRADE: _____

AIRCRAFT MODEL: _____

N _____

TIME LOG	FLIGHT LESSON #202					
	Dual	Cross Country	IFR	ATD	Ground	Total Flight
Required	1.0			1.0		1.0
Lesson Total						
Amount Forward						
Total to Date						
Required Total	1.0			1.0	1.0	1.0

LESSON OBJECTIVE:

During this lesson, the student is provided with an introduction to attitude instrument flying with special emphasis on learning precise aircraft control by instrument reference. In addition, the student will be introduced to the concept of primary and supporting instruments, and the fundamental skill of instrument cross check.

LESSON CONTENT			
Subject	Grade	Subject	Grade
Preflight Discussion			
Introduce Maneuvers and Procedures	<input type="checkbox"/>		
Instrument Cockpit Check	<input type="checkbox"/>		
Introduce and Practice			
Straight and Level	<input type="checkbox"/>		
Standard-Rate Turns	<input type="checkbox"/>		
Constant Airspeed Climbs	<input type="checkbox"/>		
Climbing Turns	<input type="checkbox"/>		
Constant Airspeed Descents	<input type="checkbox"/>		
Descending Turns	<input type="checkbox"/>		
Changes of Airspeed	<input type="checkbox"/>		
Rate Climbs	<input type="checkbox"/>		
Rate Descents	<input type="checkbox"/>		
Steep Turns	<input type="checkbox"/>		
Post Flight Discussion			

COMPLETION STANDARDS:

This lesson is complete when the student can, with instructor assistance, demonstrate control through the use of pitch, bank, and power.

REMARKS: _____

 Student Signature

 Instructor Signature

 Print Name

TECH AVIATION FLIGHT SCHOOL, INC.

Instrument Pilot Rating Course-ASEL

Flight Training Syllabus

DATE: ___/___/___

GRADE: _____

AIRCRAFT MODEL: _____

N _____

TIME LOG	FLIGHT LESSON #204					Total Flight
	Dual	Cross Country	IFR	ATD	Ground	
Required	1.5			1.5		1.5
Lesson Total						
Amount Forward						
Total to Date						
Required Total	4.0			4.0	1.0	4.0

LESSON OBJECTIVE:

During this lesson, the student will review the maneuvers listed for full panel instrument to increase proficiency. In addition, the student will be further introduced to partial panel attitude instrument flying.

LESSON CONTENT			
Subject	Grade	Subject	Grade
Preflight Discussion		- Rate Descents	
Review		- Change of Airspeed	
Vertical S, S-1, and S-2		- Standard-Rate Turns	
Pattern A & Pattern B			
Steep Turns			
Recovery from Unusual Flight Attitudes			
Review (Partial Panel)			
Straight and Level			
Standard-Rate Turns			
Introduce			
Partial Panel			
- Constant Airspeed Climbs			
- Constant Airspeed Descents			
- Rate Climbs			
		Post Flight Discussion	

COMPLETION STANDARDS:

The student should understand both the change in instrument reference and the emphasis necessary to maintain control while using partial panel.

REMARKS: _____

Student Signature _____

Instructor Signature _____

/ _____
 Print Name

TECH AVIATION FLIGHT SCHOOL, INC.

Instrument Pilot Rating Course-ASEL

Flight Training Syllabus

DATE: ___/___/___

GRADE: _____

AIRCRAFT MODEL: _____

N _____

TIME LOG	FLIGHT LESSON #205					
	Dual	Cross Country	IFR	ATD	Ground	Total Flight
Required	1.2		1.0			1.2
Lesson Total						
Amount Forward						
Total to Date						
Required Total	5.2		1.0	4.0	1.0	5.2

LESSON OBJECTIVE:

During this lesson, the student will be introduced to aircraft control by reference to instruments during flight with special emphasis on pitch, bank, and power control. This lesson will reinforce the concept of primary and supporting instruments, and the fundamental skills of instrument cross check, instrument interpretation and aircraft control during flight.

LESSON CONTENT			
Subject	Grade	Subject	Grade
<i>Preflight Discussion</i>			
<i>Practice (Full Panel)</i>			
Straight and Level			
Climbs			
Descents			
Change of Airspeed			
Standard-Rate Turns			
Constant Airspeed Climbs			
Constant Airspeed Descents			
Rate Climbs			
Rate Descents			
Recovery from Unusual Flight Attitudes			
Steep Turns			
<i>Post Flight Discussion</i>			

COMPLETION STANDARDS:

This lesson will be complete when the student can, with minimal instructor assistance, control the aircraft through means of pitch, bank, and power. During this flight, the student shall maintain altitude within ± 200 feet and heading within ± 15 degrees during level flight. Climb and descent airspeed shall be maintained within ± 15 knots.

REMARKS: _____

 Student Signature

 Instructor Signature

 Print Name

TECH AVIATION FLIGHT SCHOOL, INC.

Instrument Pilot Rating Course-ASEL

Flight Training Syllabus

DATE: ___/___/___

GRADE: _____

AIRCRAFT MODEL: _____

N _____

TIME LOG	FLIGHT LESSON #206					
	Dual	Cross Country	IFR	ATD	Ground	Total Flight
Required	1.5			1.5		1.5
Lesson Total						
Amount Forward						
Total to Date						
Required Total	6.7		1.0	5.5	1.0	6.7

LESSON OBJECTIVE:

This lesson continues to further develop the student's knowledge and skill in full and partial panel attitude instrument flying.

LESSON CONTENT			
Subject	Grade	Subject	Grade
<i>Preflight Discussion</i>		- Constant Airspeed Descents	
<i>Review</i>		- Rate Climbs	
Full Panel		<i>Introduce</i>	
- Straight and Level		Partial Panel	
- Standard-Rate Turns		- Time Turns to Magnetic Compass Heading	
- Constant Airspeed Climbs		- Recovery from Unusual Flight Attitudes	
- Constant Airspeed Descents			
- Time Turns to Magnetic Compass Heading		<i>Post Flight Discussion</i>	
- Rate Climbs			
- Rate Descents			
- Steep Turns			
- Recovery from Unusual Flight Attitudes			
Partial Panel			
- Straight and Level			
- Standard-Rate Turns			
- Constant Airspeed Climbs			

COMPLETION STANDARDS:

The student should demonstrate increased proficiency in control by reference to the flight instruments through the use of only a partial panel.

REMARKS: _____

 Student Signature

 Instructor Signature

 Print Name

TECH AVIATION FLIGHT SCHOOL, INC.

Instrument Pilot Rating Course-ASEL

Flight Training Syllabus

DATE: ___/___/___

GRADE: _____

AIRCRAFT MODEL: _____

N _____

TIME LOG	FLIGHT LESSON #207					
	Dual	Cross Country	IFR	ATD	Ground	Total Flight
Required	1.5		1.3			1.5
Lesson Total						
Amount Forward						
Total to Date						
Required Total	8.2		2.3	5.5	1.0	8.2

LESSON OBJECTIVE:

During this lesson, the student will develop increased proficiency in aircraft control by reference to flight instruments.

LESSON CONTENT			
Subject	Grade	Subject	Grade
<i>Preflight Discussion</i>			
<i>Review (Full and Partial Panel)</i>			
Straight and Level			
Standard Rate Turns			
Constant Rate Climb			
Constant Airspeed Climb			
Constant Rate Descent Airspeed			
Constant Airspeed Descent			
Rate Climbs			
Rate Descents			
Time Turns to Magnetic Compass Headings			
Steep Turns (full panel only)			
Recovery from Unusual Attitudes			
<i>Post Flight Discussion</i>			

COMPLETION STANDARDS:

The student shall be able to maintain altitude within ± 150 feet, heading within ± 15 degrees, and desired climb or descent rates within ± 150 feet per minute with full panel. The correct procedures shall be used for unusual attitude recovery. At all times during full and partial panel, the aircraft shall remain under control.

REMARKS:

 Student Signature

 Instructor Signature

 Print Name

TECH AVIATION FLIGHT SCHOOL, INC.

Instrument Pilot Rating Course-ASEL

Flight Training Syllabus

DATE: ___/___/___

GRADE: _____

AIRCRAFT MODEL: _____

N _____

TIME LOG	GROUND LESSON					#208
	Dual	Cross Country	IFR	ATD	Ground	
Required					1.0	
Lesson Total						
Amount Forward						
Total to Date						
Required Total	8.2		2.3	5.5	2.0	8.2

LESSON OBJECTIVE:

In this ground lesson, the student will review the procedures for the use of navigation aids in the IFR environment.

LESSON CONTENT																
Subject	Grade	Subject	Grade													
<i>Preflight Discussion</i>		Time / Distance Checks														
<i>Introduce</i>		<i>Post Flight Discussion</i>														
Navigation Aids	<table border="1"> <tr><td> </td></tr> <tr><td> </td></tr> <tr><td> </td></tr> <tr><td> </td></tr> <tr><td> </td></tr> <tr><td> </td></tr> <tr><td> </td></tr> <tr><td> </td></tr> <tr><td> </td></tr> <tr><td> </td></tr> <tr><td> </td></tr> <tr><td> </td></tr> <tr><td> </td></tr> </table>															
VOR																
- Intercepting																
- Tracking																
DME-Arc																
- Intercepting																
- Tracking																
Localizer (front and back-course)																
- Intercepting																
- Tracking																
NDB																
- Intercepting																
- Tracking																
- Bracketing																

COMPLETION STANDARDS:

Through oral quizzing, the student should demonstrate a basic understanding of each of the navigation concepts and aids.

REMARKS: _____

 Student Signature

 Instructor Signature

 /
 Print Name

TECH AVIATION FLIGHT SCHOOL, INC.

Instrument Pilot Rating Course-ASEL

Flight Training Syllabus

DATE: ___/___/___

GRADE: _____

AIRCRAFT MODEL: _____

N _____

TIME LOG	FLIGHT LESSON #209					
	Dual	Cross Country	IFR	ATD	Ground	Total Flight
Required	1.5			1.5		1.5
Lesson Total						
Amount Forward						
Total to Date						
Required Total	9.7		2.3	7.0	2.0	9.7

LESSON OBJECTIVE:

This lesson introduces orientation in relation to a VOR station. VOR radial interception and tracking procedures will be introduced. VOR time, speed, and distance computations, and the interception and tracking of DME arcs are introduced.

LESSON CONTENT			
Subject	Grade	Subject	Grade
<i>Preflight Discussion</i>			
Review Previous Ground Lesson	<input type="checkbox"/>		
- VOR Time, Speed, and Distance	<input type="checkbox"/>		
- VOR Intercepts and Tracking	<input type="checkbox"/>		
<i>Introduce and Practice (Full Panel)</i>			
VOR	<input type="checkbox"/>		
- Check (Ground and Airborne)	<input type="checkbox"/>		
- Orientation	<input type="checkbox"/>		
- Radial Interception	<input type="checkbox"/>		
- Tracking	<input type="checkbox"/>		
- Time, Speed, and Distance Check	<input type="checkbox"/>		
DME Arc Intercepting and Tracking	<input type="checkbox"/>		
<i>Post Flight Discussion</i>			

COMPLETION STANDARDS:

The student should demonstrate an understanding of the procedures used to perform VOR intercepting and tracking; time, speed, and distance computations; and the interception and tracking of DME arcs.

REMARKS: _____

 Student Signature

 Instructor Signature

 Print Name

TECH AVIATION FLIGHT SCHOOL, INC.

Instrument Pilot Rating Course-ASEL

Flight Training Syllabus

DATE: ___/___/___

GRADE: _____

AIRCRAFT MODEL: _____

N _____

TIME LOG	FLIGHT LESSON #210					
	Dual	Cross Country	IFR	ATD	Ground	Total Flight
Required	1.5			1.5		1.5
Lesson Total						
Amount Forward						
Total to Date						
Required Total	11.2		2.3	8.5	2.0	11.2

LESSON OBJECTIVE:

During this lesson, the student will develop increased proficiency in VOR and DME arc navigation by reviewing maneuvers presented in previous lessons. NDB / GPS orientation, tracking, and time, speed and distance calculations will be introduced.

LESSON CONTENT			
Subject	Grade	Subject	Grade
<i>Preflight Discussion</i>		<i>Introduce and Practice (Full Panel)</i>	
NDB	<input type="text"/>	NDB Orientation	<input type="text"/>
- Intercepting	<input type="text"/>	- Bearing Interception	<input type="text"/>
- Tracking	<input type="text"/>	- Bearing Tracking	<input type="text"/>
- Bracketing	<input type="text"/>	- Time, Speed, and Distance Check	<input type="text"/>
<i>Review</i>		<i>Post Flight Discussion</i>	
Full Panel Instrument	<input type="text"/>		
VOR Orientation	<input type="text"/>		
- Intercepting	<input type="text"/>		
- Tracking	<input type="text"/>		
- Time, Speed, and Distance	<input type="text"/>		
DME Arc Intercepting and Tracking	<input type="text"/>		

COMPLETION STANDARDS:

The student shall demonstrate increased proficiency in all VOR procedures. The student should understand NDB / GPS orientation, intercepting and tracking; including time, speed and distance checks.

REMARKS: _____

 Student Signature

 Instructor Signature

/ _____
 Print Name

TECH AVIATION FLIGHT SCHOOL, INC.

Instrument Pilot Rating Course-ASEL

Flight Training Syllabus

DATE: ___/___/___

GRADE: _____

AIRCRAFT MODEL: _____

N _____

TIME LOG	FLIGHT LESSON #211					
	Dual	Cross Country	IFR	ATD	Ground	Total Flight
Required	1.5		1.3			1.5
Lesson Total						
Amount Forward						
Total to Date						
Required Total	12.7		3.6	8.5	2.0	12.7

LESSON OBJECTIVE:

During this lesson, the student continues to develop knowledge and skill in the use of full panel VOR and NDB / GPS navigation equipment.

LESSON CONTENT																		
Subject	Grade	Subject	Grade															
<i>Preflight Discussion</i>		<i>Post Flight Discussion</i>																
<i>Review (Full Panel)</i>																		
Change of Airspeed	<table border="1" style="width: 100px; height: 100px;"> <tr><td> </td></tr> <tr><td> </td></tr> <tr><td> </td></tr> <tr><td> </td></tr> <tr><td> </td></tr> <tr><td> </td></tr> <tr><td> </td></tr> <tr><td> </td></tr> <tr><td> </td></tr> <tr><td> </td></tr> <tr><td> </td></tr> <tr><td> </td></tr> <tr><td> </td></tr> <tr><td> </td></tr> <tr><td> </td></tr> </table>																	
Straight and Level																		
- Constant Rate Climbs																		
- Constant Airspeed Climbs																		
Constant																		
- Rate Descents																		
- Airspeed Descents																		
Recovery from Unusual Flight Attitudes																		
VOR																		
- Orientation																		
- Radial Interception and Tracking																		
NDB Homing																		
- Bearing Interception																		
- Bearing Tracking																		

COMPLETION STANDARDS:

Student shall demonstrate increased proficiency in VOR and NDB / GPS navigation.

REMARKS: _____

Student Signature

Instructor Signature

Print Name

TECH AVIATION FLIGHT SCHOOL, INC.

Instrument Pilot Rating Course-ASEL

Flight Training Syllabus

DATE: ___/___/___

GRADE: _____

AIRCRAFT MODEL: _____

N _____

TIME LOG	FLIGHT LESSON #212					
	Dual	Cross Country	IFR	ATD	Ground	Total Flight
Required	1.5		1.3			1.5
Lesson Total						
Amount Forward						
Total to Date						
Required Total	14.2		4.9	8.5	2.0	14.2

LESSON OBJECTIVE:

During this lesson, the student will review and practice basic attitude instrument flight and navigation to increase proficiency in preparation for the first stage check.

LESSON CONTENT			
Subject	Grade	Subject	Grade
<i>Preflight Discussion</i>			
Preparation for Stage Check Oral	<input type="checkbox"/>		
<i>Review and Practice (Full and Partial Panel)</i>			
Straight-and-Level Flight	<input type="checkbox"/>		
Change of Airspeed Climbs and Descents	<input type="checkbox"/>		
Rate Climbs and Descents	<input type="checkbox"/>		
Timed Turns to Magnetic Compass Heading	<input type="checkbox"/>		
Steep Turns (Full Panel Only)	<input type="checkbox"/>		
Recovery from Unusual Flight Attitudes	<input type="checkbox"/>		
Navigation	<input type="checkbox"/>		
- VOR Orientation, Intercepts, Tracking	<input type="checkbox"/>		
- NDB Orientation, Intercepts, Tracking	<input type="checkbox"/>		
<i>Post Flight Discussion</i>			

COMPLETION STANDARDS:

The student shall be able to maintain altitude within ± 100 feet, heading within ± 10 degrees, and desired climb or descent rates within ± 100 feet per minute. The student shall demonstrate accurate VOR and NDB / GPS orientation and tracking.

REMARKS:

Student Signature

Instructor Signature

Print Name

TECH AVIATION FLIGHT SCHOOL, INC.

Instrument Pilot Rating Course-ASEL

Flight Training Syllabus

DATE: ___/___/___

GRADE: _____

AIRCRAFT MODEL: _____

N _____

TIME LOG	STAGE I CHECK				FLIGHT LESSON #213	
	Dual	Cross Country	IFR	ATD	Ground	Total Flight
Required	1.5		1.3		1.0	1.5
Lesson Total						
Amount Forward						
Total to Date						
Required Total	15.7		6.2	8.5	3.0	15.7

LESSON OBJECTIVE:

During this lesson, the Chief Instructor or Assistant Chief Instructor will evaluate the student's proficiency in attitude instrument flight and navigation to ensure the student is prepared for more complex procedures.

LESSON CONTENT			
Subject	Grade	Subject	Grade
Oral Examination			
Aircraft Instruments and Related Systems		Steep Turns	
Weather Information		Recovery from Unusual Attitudes	
National Airspace System		VOR Tracking and Intercepts	
Aircraft Performance and Limitations		NDB Tracking and Intercepts	
		DME Arc Intercepting and Tracking	
Partial Panel			
Flight Test			
Full Panel			
Straight and Level Flight		Straight and Level Flight	
Standard-Rate Turns		Standard-Rate Turns	
Constant Airspeed		Constant Airspeed	
- Climbs		- Climbs	
- Descents		- Descents	
Constant Rate		Constant Rate	
- Climbs		- Climbs	
- Descents		- Descents	
Timed Turns to Magnetic Compass Heading		Timed Turns to Magnetic Compass Heading	
		Recovery from Unusual Attitudes	
Post Flight Discussion			

COMPLETION STANDARDS:

The student shall be able to maintain altitude within ± 100 feet, heading within ± 10 degrees, and desired climb or descent rates within ± 100 feet per minute. The student shall demonstrate accurate VOR and NDB / GPS orientation and tracking.

REMARKS:

Student Signature

Instructor Signature

Print Name

STAGE II

STAGE OBJECTIVE

This stage builds upon the skills developed in the first stage. Instrument approaches and IFR cross-country procedures are introduced and practiced.

STAGE COMPLETION STANDARDS

This stage is complete upon satisfactory performance in all Areas of Operation and Tasks listed in the current FAA Instrument Rating Practical Test Standards.

TECH AVIATION FLIGHT SCHOOL, INC.

Instrument Pilot Rating Course-ASEL

Flight Training Syllabus

DATE: ___/___/___

GRADE: _____

AIRCRAFT MODEL: _____

N _____

TIME LOG	GROUND LESSON					#214
	Dual	Cross Country	IFR	ATD	Ground	
Required					1.0	
Lesson Total						
Amount Forward						
Total to Date						
Required Total	15.7		6.2	8.5	4.0	15.7

LESSON OBJECTIVE:

During this ground lesson, the student will be introduced to VOR/VORTAC, DME, intersection, NDB / GPS and Localizer holding procedures. Localizer navigation will be presented.

LESSON CONTENT																		
Subject	Grade	Subject	Grade															
<i>Introduce</i>																		
Navigation Aids	<table border="1" style="width: 100px; height: 100px;"> <tr><td> </td></tr> <tr><td> </td></tr> <tr><td> </td></tr> <tr><td> </td></tr> <tr><td> </td></tr> <tr><td> </td></tr> <tr><td> </td></tr> <tr><td> </td></tr> <tr><td> </td></tr> <tr><td> </td></tr> <tr><td> </td></tr> <tr><td> </td></tr> <tr><td> </td></tr> <tr><td> </td></tr> <tr><td> </td></tr> </table>																	
- Localizer																		
Holding Patterns																		
- ATC Clearances																		
- Loss of Communications																		
- Drawing of Holding Pattern																		
- Holding Pattern Entries																		
- Maintaining Proper Ground Track																		
- Leaving																		
VOR/VORTAC Holding Patterns																		
VOR/DME Holding Patterns																		
Intersection Holding Patterns																		
Localizer Holding Patterns																		
NDB Holding Patterns																		

COMPLETION STANDARDS:

This lesson is complete when through oral quizzing and discussion, the student displays a basic understanding of holding procedures and localizer navigation.

REMARKS: _____

 Student Signature

 Instructor Signature

 /
 Print Name

TECH AVIATION FLIGHT SCHOOL, INC.

Instrument Pilot Rating Course-ASEL

Flight Training Syllabus

DATE: ___/___/___

GRADE: _____

AIRCRAFT MODEL: _____

N _____

TIME LOG	FLIGHT LESSON #215					
	Dual	Cross Country	IFR	ATD	Ground	Total Flight
Required	1.5			1.5		1.5
Lesson Total						
Amount Forward						
Total to Date						
Required Total	17.2		6.2	10.0	4.0	17.2

LESSON OBJECTIVE:

During this lesson, VOR/VORTAC and localizer holding patterns will be introduced.

LESSON CONTENT													
Subject	Grade	Subject	Grade										
<i>Preflight Discussion</i>													
<i>Introduce and Practice</i>													
Holding Patterns	<table border="1" style="width: 100px; height: 100px;"> <tr><td> </td></tr> <tr><td> </td></tr> <tr><td> </td></tr> <tr><td> </td></tr> <tr><td> </td></tr> <tr><td> </td></tr> <tr><td> </td></tr> <tr><td> </td></tr> <tr><td> </td></tr> <tr><td> </td></tr> </table>												
- ATC Clearance													
Holding Pattern Entries													
VOR Holding Patterns													
- Standard													
- Non-Standard													
Localizer Holding													
- Standard													
- Non-Standard													
<i>Post Flight Discussion</i>													

COMPLETION STANDARDS:

Using VOR/VORTAC and Localizer, the student should demonstrate the correct procedures to execute holding patterns.

REMARKS: _____

Student Signature

Instructor Signature

Print Name

TECH AVIATION FLIGHT SCHOOL, INC.

Instrument Pilot Rating Course-ASEL

Flight Training Syllabus

DATE: ___/___/___

GRADE: _____

AIRCRAFT MODEL: _____

N _____

TIME LOG	FLIGHT LESSON #216					
	Dual	Cross Country	IFR	ATD	Ground	Total Flight
Required	1.5			1.5		1.5
Lesson Total						
Amount Forward						
Total to Date						
Required Total	18.7		6.2	11.5	4.0	18.7

LESSON OBJECTIVE:

During this lesson, intersection and NDB / GPS holding patterns will be introduced.

LESSON CONTENT			
Subject	Grade	Subject	Grade
<i>Preflight Discussion</i>			
<i>Introduce and Practice</i>			
Intersection Holding			
- Radial Intersection			
- DME Fix			
NDB Holding			
- Standard			
- Non-Standard			
<i>Post Flight Discussion</i>			

COMPLETION STANDARDS:

Using intersections and NDB / GPSs, the student should demonstrate the correct procedures to execute holding patterns.

REMARKS: _____

Student Signature

Instructor Signature

Print Name

TECH AVIATION FLIGHT SCHOOL, INC.

Instrument Pilot Rating Course-ASEL

Flight Training Syllabus

DATE: ___/___/___

GRADE: _____

AIRCRAFT MODEL: _____

N _____

TIME LOG	FLIGHT LESSON #217					Total Flight
	Dual	Cross Country	IFR	ATD	Ground	
Required	1.5		1.3			1.5
Lesson Total						
Amount Forward						
Total to Date						
Required Total	20.2		7.5	11.5	4.0	20.2

LESSON OBJECTIVE:

During this lesson, the student will increase proficiency by practicing VOR/VORTAC and NDB / GPS holding procedures.

LESSON CONTENT									
Subject	Grade	Subject	Grade						
<i>Preflight Discussion</i>									
<i>Practice</i>									
VOR/VORTAC Holding	<table border="1" style="width: 50px; height: 100px;"> <tr><td> </td></tr> <tr><td> </td></tr> <tr><td> </td></tr> <tr><td> </td></tr> <tr><td> </td></tr> <tr><td> </td></tr> </table>								
- Standard									
- Nonstandard									
NDB Holding									
- Standard									
- Non-Standard									
<i>Post Flight Discussion</i>									

COMPLETION STANDARDS:

At the completion of this lesson, the student shall have the necessary skill and knowledge to determine the correct holding pattern entries and entry headings for VOR/VORTAC and NDB / GPS holding patterns – standard and non-standard. During holding pattern practice, the student shall maintain the desired altitude within ± 200 feet and airspeed within ± 10 knots of that assigned.

REMARKS: _____

 Student Signature

 Instructor Signature

 /
 Print Name

TECH AVIATION FLIGHT SCHOOL, INC.

Instrument Pilot Rating Course-ASEL

Flight Training Syllabus

DATE: ___/___/___

GRADE: _____

AIRCRAFT MODEL: _____

N _____

TIME LOG	GROUND LESSON					#218
	Dual	Cross Country	IFR	ATD	Ground	
Required					1.0	
Lesson Total						
Amount Forward						
Total to Date						
Required Total	20.2		7.5	11.5	5.0	20.2

LESSON OBJECTIVE:

During this ground lesson, the student will be introduced to interpretation and use of the information published on instrument approach charts. Other flight publications include the Aeronautical Information Manual will be introduced. IFR clearances will be presented.

LESSON CONTENT			
Subject	Grade	Subject	Grade
<i>Introduce</i>		- Circling	
Flight Publications		- Missed	
Approach Chart		Clearances	
- Nav View, Profile View & Airport Diagram		- When a clearance is required	
- Step-Down Fix and VDP		- Where to get one	
- Landing Minimums		- Clearance Void Time	
- Aircraft Categories		- Elements of an IFR Clearance	
- Visibility Requirements		- Cruise Clearance	
- Minimum Altitude Requirements		- Approach Clearance	
- Inoperative Components		Cockpit Management	
- Takeoff and Alternate Minimums		- Navigation Equipment	
Approaches		- Charts	
- Non-Precision Approaches		- Lights	
- Precision Approaches		Aeronautical Information Manual	
- Contact Approach		SIDs and STARs	
- Visual Approach		Emergency Procedures	
- No-Gyro		<i>Post Flight Discussion</i>	

COMPLETION STANDARDS:

This lesson shall be complete when through oral quizzing and discussion, the student displays a basic understanding of approach charts, non-precision/precision approaches & ATC clearances.

REMARKS:

Student Signature

Instructor Signature

Print Name

TECH AVIATION FLIGHT SCHOOL, INC.

Instrument Pilot Rating Course-ASEL

Flight Training Syllabus

DATE: ___/___/___

GRADE: _____

AIRCRAFT MODEL: _____

N _____

TIME LOG	FLIGHT LESSON #219					
	Dual	Cross Country	IFR	ATD	Ground	Total Flight
Required	1.0			1.0		1.0
Lesson Total						
Amount Forward						
Total to Date						
Required Total	21.2		7.5	12.5	5.0	21.2

LESSON OBJECTIVE:

During this lesson, the student will review holding patterns. The student will also be introduced to VOR/VORTAC, front course localizer, and ILS approaches.

LESSON CONTENT			
Subject	Grade	Subject	Grade
<i>Preflight Discussion</i>		<i>Post Flight Discussion</i>	
<i>Review and Practice</i>			
Holding			
- VOR/VORTAC			
- NDB			
<i>Introduce and Practice</i>			
Instrument Approach Procedures			
- VOR/VORTAC			
- Localizer Front Course			
- ILS			
- Missed Approach			

COMPLETION STANDARDS:

At the completion of this lesson, the student should be able to do the following with minimal instructor assistance:

- 1) Explain and use the information displayed on the approach charts,
- 2) Execute several initial and intermediate approach segments to arrive at the Final App Fix
- 3) Complete the final approach and letdown to the missed approach point, and
- 4) Demonstrate the missed approach procedures, as published on the appropriate chart.

REMARKS: _____

 Student Signature

 Instructor Signature

 /
 Print Name

TECH AVIATION FLIGHT SCHOOL, INC.

Instrument Pilot Rating Course-ASEL

Flight Training Syllabus

DATE: ___/___/___

GRADE: _____

AIRCRAFT MODEL: _____

N _____

TIME LOG	FLIGHT LESSON #220					Total Flight
	Dual	Cross Country	IFR	ATD	Ground	
Required	1.5			1.5		1.5
Lesson Total						
Amount Forward						
Total to Date						
Required Total	22.7		7.5	14.0	5.0	22.7

LESSON OBJECTIVE:

During this lesson, the student will improve proficiency in flying VOR/VORTAC, localizer front course and ILS approaches. The student will also be introduced to approaches utilizing VOR/DME arcs, localizer back course, and NDB / GPS.

LESSON CONTENT			
Subject	Grade	Subject	Grade
<i>Preflight Discussion</i>		<i>Post Flight Discussion</i>	
<i>Review</i>			
Instrument Approach Procedures			
- VOR/VORTAC			
- Localizer Front Course			
- ILS			
- Missed Approach			
<i>Introduce and Practice</i>			
Instrument Approaches			
- VOR/DME Arc			
- Localizer Back Course			
- NDB			

COMPLETION STANDARDS:

At the conclusion of this lesson, the student should have a basic understanding of the following approaches: 1) VOR/DME arc, 2) Localizer Back Course, and 3) NDB / GPS. The student should be able to maintain specific descent rates, altitudes, and navigation tracking during each approach. During the ILS instrument approach procedures, the student shall demonstrate glide slope tracking, using power and attitude changes to control airspeed and descent rates.

REMARKS:

 Student Signature

 Instructor Signature

 Print Name

TECH AVIATION FLIGHT SCHOOL, INC.

Instrument Pilot Rating Course-ASEL

Flight Training Syllabus

DATE: ___/___/___

GRADE: _____

AIRCRAFT MODEL: _____

N _____

TIME LOG	FLIGHT LESSON #221					
	Dual	Cross Country	IFR	ATD	Ground	Total Flight
Required	1.5		1.3			1.5
Lesson Total						
Amount Forward						
Total to Date						
Required Total	24.2		8.8	14.0	5.0	24.2

LESSON OBJECTIVE:

During this lesson, the student will increase proficiency in precision and non-precision instrument approach procedures.

LESSON CONTENT							
Subject	Grade	Subject	Grade				
<i>Preflight Discussion</i>							
<i>Review</i>							
Instrument Approach Procedures	<table border="1"> <tr><td> </td></tr> <tr><td> </td></tr> <tr><td> </td></tr> <tr><td> </td></tr> </table>						
- ILS							
- NDB							
- Missed Approach							
<i>Post Flight Discussion</i>							

COMPLETION STANDARDS:

The student shall demonstrate complete understanding of all appropriate precision and non-precision approach procedures.

REMARKS: _____

 Student Signature

 Instructor Signature

/ _____
 Print Name

TECH AVIATION FLIGHT SCHOOL, INC.

Instrument Pilot Rating Course-ASEL

Flight Training Syllabus

DATE: ___/___/___

GRADE: _____

AIRCRAFT MODEL: _____

N _____

TIME LOG	GROUND LESSON					#222
	Dual	Cross Country	IFR	ATD	Ground	
Required					1.0	
Lesson Total						
Amount Forward						
Total to Date						
Required Total	24.2		8.8	14.0	6.0	24.2

LESSON OBJECTIVE:

During this ground lesson the student will be introduced to loss of communication and equipment failure procedures.

LESSON CONTENT			
Subject	Grade	Subject	Grade
Introduce			
Loss of Communication			
- During Climbout			
- Enroute			
- Holding			
- Approach			
- Minimum Altitudes			
- Transponder Codes			
Equipment Failure			
- Attitude Indicator			
- Heading Indicator			
- Attitude Indicator and Heading Indicator			
- Turn Coordinator			
- Use of Magnetic Compass			

COMPLETION STANDARDS:

This lesson shall be complete when through oral quizzing and discussion, the student displays a basic understanding of loss of communication, and equipment failure procedures.

REMARKS: _____

 Student Signature

 Instructor Signature

/_____
 Print Name

TECH AVIATION FLIGHT SCHOOL, INC.

Instrument Pilot Rating Course-ASEL

Flight Training Syllabus

DATE: ___/___/___

GRADE: _____

AIRCRAFT MODEL: _____

N _____

TIME LOG	FLIGHT LESSON #223					
	Dual	Cross Country	IFR	ATD	Ground	Total Flight
Required	1.5		1.3			1.5
Lesson Total						
Amount Forward						
Total to Date						
Required Total	25.7		10.1	14.0	6.0	25.7

LESSON OBJECTIVE:

During this lesson, the student will increase proficiency in instrument flight by review and practice of those procedures listed. In addition, the student will practice emergency and loss of communication procedures.

LESSON CONTENT			
Subject	Grade	Subject	Grade
<i>Preflight Discussion</i>		<i>Post Flight Discussion</i>	
<i>Review</i>			
Instrument Approach Procedures			
- Localizer			
- ILS			
- VOR			
- NDB			
- Missed			
<i>Introduce and Practice</i>			
Emergency Operations			
Loss of Communication			
Loss of Attitude and/or Heading Indicator			
Circling Approach			

COMPLETION STANDARDS:

During the ILS instrument approach procedures, the student should demonstrate accurate localizer interception and tracking and make a transition to the glide slope at the correct point. The glide slope and localizer should be maintained with less than full-scale needle deflection. During the non-precision approaches, the student should maintain an altitude within ± 100 feet on the initial and intermediate approach segments. On the final approach segment, the student should maintain an altitude that is no more than 100 feet above the MDA.

REMARKS: _____

 Student Signature

 Instructor Signature

 Print Name

TECH AVIATION FLIGHT SCHOOL, INC.

Instrument Pilot Rating Course-ASEL

Flight Training Syllabus

DATE: ___/___/___

GRADE: _____

AIRCRAFT MODEL: _____

N _____

TIME LOG	FLIGHT LESSON #224					
	Dual	Cross Country	IFR	ATD	Ground	Total Flight
Required	1.5		1.3			1.5
Lesson Total						
Amount Forward						
Total to Date						
Required Total	27.2		11.4	14.0	6.0	27.2

LESSON OBJECTIVE:

During this lesson, the student will be introduced to no-gyro radar vectoring approach procedures. With this introduction and review of attitude instrument flying, the student will obtain the necessary knowledge and skill for the introduction of enroute procedures and holding patterns.

LESSON CONTENT			
Subject	Grade	Subject	Grade
<i>Preflight Discussion</i>		<i>Post Flight Discussion</i>	
<i>Review</i>			
ILS Instrument Approach Procedures			
Localizer Approaches			
NDB Instrument Approach Procedures			
Intercepting and Tracking DME Arcs			
Loss of Attitude and/or Heading Indicators			
Circling Approach			
<i>Introduce and Practice</i>			
Partial Panel			
- Approach Procedures			
- Missed Approach			
- No-gyro Radar Vectors			

COMPLETION STANDARDS:

The student should have a basic understanding of the procedures used to perform no-gyro radar vectoring and approaches, and demonstrate proficiency in copying and complying with ATC clearances that pertain to the approach.

REMARKS: _____

 Student Signature

 Instructor Signature

 Print Name

TECH AVIATION FLIGHT SCHOOL, INC.

Instrument Pilot Rating Course-ASEL

Flight Training Syllabus

DATE: ___/___/___

GRADE: _____

AIRCRAFT MODEL: _____

N _____

TIME LOG	GROUND LESSON					#225
	Dual	Cross Country	IFR	ATD	Ground	
Required					1.0	
Lesson Total						
Amount Forward						
Total to Date						
Required Total	27.2		11.4	14.0	7.0	27.2

LESSON OBJECTIVE:

During this ground lesson, the student's knowledge of weather, aircraft systems, and flight instruments will be reviewed. This lesson introduces the student to IFR cross-country planning.

LESSON CONTENT			
Subject	Grade	Subject	Grade
Review			
Aircraft Systems related to IFR Operations	<input type="checkbox"/>	- Table and Conversion Graph	<input type="checkbox"/>
Aircraft Flight Instruments and Nav Equip	<input type="checkbox"/>	- Constant Pressure Prognostic Charts	<input type="checkbox"/>
Cockpit Management	<input type="checkbox"/>	- SIGMETs and AIRMETS	<input type="checkbox"/>
		- ATIS Reports	<input type="checkbox"/>
		- AWOS and ASOS	<input type="checkbox"/>
Introduce			
Obtaining Weather Information	<input type="checkbox"/>	IFR Cross-Country Flight Planning	<input type="checkbox"/>
- Weather Reports and Forcasts	<input type="checkbox"/>	- Filing a Flight Plan	<input type="checkbox"/>
- Pilot and Radar Reports	<input type="checkbox"/>	- SID	<input type="checkbox"/>
- Surface Analysis Chart	<input type="checkbox"/>	- STAR	<input type="checkbox"/>
- Radar Summary Chart	<input type="checkbox"/>	- Low Enroute Chart	<input type="checkbox"/>
- Significant Weather Prognostic Charts	<input type="checkbox"/>	- Preferred Route	<input type="checkbox"/>
- Wind and Temperature Aloft Charts	<input type="checkbox"/>	- Fuel Management	<input type="checkbox"/>
- Freezing Level Charts	<input type="checkbox"/>	- Low Altitude Enroute Chart	<input type="checkbox"/>
- Stability Charts	<input type="checkbox"/>	- Preferred Routes	<input type="checkbox"/>
- Severe Weather Outlook Chart	<input type="checkbox"/>	- Fuel Management	<input type="checkbox"/>
- Constant Pressure Chart	<input type="checkbox"/>		<input type="checkbox"/>

COMPLETION STANDARDS:

This lesson will be complete when through oral quizzing and discussion, the student displays a complete understanding of weather, aircraft systems, and flight instruments. The student should also have a basic understanding of IFR cross-country planning.

REMARKS: _____

 Student Signature

 Instructor Signature

 Print Name

TECH AVIATION FLIGHT SCHOOL, INC.

Instrument Pilot Rating Course-ASEL

Flight Training Syllabus

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GRADE: _____

AIRCRAFT MODEL: _____

N _____

TIME LOG	FLIGHT LESSON #226					
	Dual	Cross Country	IFR	ATD	Ground	Total Flight
Required	1.6	1.6	1.4			1.6
Lesson Total						
Amount Forward						
Total to Date						
Required Total	28.8	1.6	12.8	14.0	7.0	28.8

LESSON OBJECTIVE:

During this lesson, the student is introduced to IFR cross-country procedures with the major emphasis on planning and departure procedures. Emergency procedures during cross-country flight are introduced.

LESSON CONTENT			
Subject	Grade	Subject	Grade
Preflight Discussion		IFR Cross-Country, > 50NM (Enter Below):	
Cross-Country Planning		Route:	
Introduce and Practice			
Clearance Copying and Clearance Readback		Landings at:	
IFR Departure			
- Use of SID			
- Use of Radar		Secondary Route:	
Air Traffic Control Clearances (General)			
Opening and Closing an IFR Flight Plan		Landings at:	
Emergency Operations			
- Loss of Communications			
- Loss of Attitude and/or Heading Indicator		Type Approaches and Location:	
IFR Approaches			
- ILS Approach Procedures			
- NDB Approach Procedures			
Post Flight Discussion			

COMPLETION STANDARDS:

The student should display an understanding of the procedures involved in cross-country planning, filing IFR flight plan, and obtaining IFR clearances. The student will demonstrate a sound understanding of the procedures used in the various emergency situations. The lesson must include a landing at an airport with an instrument approach more than 50NM from departure.

REMARKS: _____

 Student Signature

 Instructor Signature

 Print Name

TECH AVIATION FLIGHT SCHOOL, INC.

Instrument Pilot Rating Course-ASEL

Flight Training Syllabus

DATE: ___/___/___

GRADE: _____

AIRCRAFT MODEL: _____

N _____

TIME LOG	FLIGHT LESSON #227					
	Dual	Cross Country	IFR	ATD	Ground	Total Flight
Required	1.6	1.6	1.4			1.6
Lesson Total						
Amount Forward						
Total to Date						
Required Total	30.4	3.2	14.2	14.0	7.0	30.4

LESSON OBJECTIVE:

During this lesson, the student will plan and conduct a short cross-country flight. During the flight, the student will become familiar with IFR Departure and Arrival Procedure.

LESSON CONTENT			
Subject	Grade	Subject	Grade
Preflight Discussion		IFR Cross-Country, > 50NM (Enter Below):	
Cross-Country Planning		Route:	
Introduce and Practice		Landings at:	
Calculating ETEs and ETAs			
Enroute Course Changes			
Use of SIDs and STARs			
Precision and/or Non-Precision Approaches		Secondary Route:	
Completing Cross-Country Log			
		Landings at:	
		Type Approaches and Location:	
Post Flight Discussion			

COMPLETION STANDARDS:

At the completion of this flight, the student shall be able to explain the departure and arrival procedures that may be encountered on an IFR flight. Additionally, the student will know the methods used to calculate ETAs and comply with course changes that may be issued by ATC or necessitated by enroute weather.

REMARKS: _____

Student Signature _____

Instructor Signature _____

/ _____
 Print Name

TECH AVIATION FLIGHT SCHOOL, INC.

Instrument Pilot Rating Course-ASEL

Flight Training Syllabus

DATE: ___/___/___

GRADE: _____

AIRCRAFT MODEL: _____

N _____

TIME LOG	FLIGHT LESSON #228					
	Dual	Cross Country	IFR	ATD	Ground	Total Flight
Required	3.5	3.5	3.3			3.5
Lesson Total						
Amount Forward						
Total to Date						
Required Total	33.9	6.7	17.5	14.0	7.0	33.9

LESSON OBJECTIVE:

During this lesson, the student will become more familiar with IFR departures, enroute, and arrival procedures. The cross-country must be at least 250 nautical miles on Federal Airways or as routed by ATC. The student must fly an ILS, VOR/VORTAC and NDB / GPS instrument approach at different airports.

LESSON CONTENT			
Subject	Grade	Subject	Grade
Preflight Discussion		IFR Cross-Country (250NM)	
Cross-Country Planning		Route:	
Review		From:	
Departure Procedures and Clearances		Via:	
- Use of SIDs and/or radar		Via:	
Enroute Procedures and Clearances		To:	
- VOR/VORTAC Navigation and/or NDB			
- Holding		Type Approaches: & Location	
Arrival Procedures and Clearances		ILS	
- Use of STARs and/or Radar		VOR	
- VOR/VORTAC Instrument Approach Proc		NDB	
- NDB Instrument Approach Procedures			
- ILS Instrument Approach Procedures			
- Circling Approach Procedures			
- Missed Approach Procedures			
		Post Flight Discussion	

COMPLETION STANDARDS:

At the completion of this flight, the student shall have a thorough understanding of cross-country and emergency operations. The student must have flown an ILS, VOR/VORTAC and NDB / GPS instrument approach at different airports or otherwise comply with 14 CFR Part 61.

REMARKS: _____

 Student Signature

 Instructor Signature

 Print Name

TECH AVIATION FLIGHT SCHOOL, INC.

Instrument Pilot Rating Course-ASEL

Flight Training Syllabus

DATE: ___/___/___

GRADE: _____

AIRCRAFT MODEL: _____

N _____

TIME LOG	GROUND LESSON					#229
	Dual	Cross Country	IFR	ATD	Ground	
Required					1.0	
Lesson Total						
Amount Forward						
Total to Date						
Required Total	33.9	6.7	17.5	14.0	8.0	33.9

LESSON OBJECTIVE:

This lesson is the final preparation for the oral portion of the practical test (instrument rating).

LESSON CONTENT			
Subject	Grade	Subject	Grade
Review Practical Test Standards			
Preflight Preparation			
- Weather Information			
- Cross-Country Flight Planning			
Preflight Procedures			
- Aircraft Systems Related to IFR Ops.			
- Aircraft Flight Instruments and Navigation			
- Instrument Cockpit Check			
Air Traffic Control Clearances and Procedures			
- Air Traffic Control Clearances			
- Compliance w/ Departure, Enroute, Arrival Procedures and Clearances			
- Holding Procedures			

COMPLETION STANDARDS:

This lesson will be complete when through oral quizzing and discussion, the student displays a complete understanding of all aspects of instrument flight listed in the current FAA Instrument Rating (Airplane) Practical Test Standards. All necessary preparation regarding paperwork for the course completion check shall be completed.

REMARKS: _____

 Student Signature

 Instructor Signature

/ _____
 Print Name

TECH AVIATION FLIGHT SCHOOL, INC.

Instrument Pilot Rating Course-ASEL

Flight Training Syllabus

DATE: ___/___/___

GRADE: _____

AIRCRAFT MODEL: _____

N _____

TIME LOG	FLIGHT LESSON #230					
	Dual	Cross Country	IFR	ATD	Ground	Total Flight
Required	1.1		0.9			1.1
Lesson Total						
Amount Forward						
Total to Date						
Required Total	35.0	6.7	18.4	14.0	8.0	35.0

LESSON OBJECTIVE:

This lesson reviews previous maneuvers in preparation for the end of course stage checks.

LESSON CONTENT			
Subject	Grade	Subject	Grade
<i>Preflight Discussion</i>		<i>Post Flight Discussion</i>	
ATC Communication Procedures	<input type="checkbox"/>		
Holding (choose two)	<input type="checkbox"/>		
- VOR/VORTAC Holding	<input type="checkbox"/>		
- NDB Holding	<input type="checkbox"/>		
- Localizer Holding	<input type="checkbox"/>		
- Intersection Holding	<input type="checkbox"/>		
- Radial Intersection	<input type="checkbox"/>		
- DME Fix	<input type="checkbox"/>		
VOR/VORTAC Approach Procedures	<input type="checkbox"/>		
NDB Approach Procedures	<input type="checkbox"/>		
ILS and Localizer Approach Procedures	<input type="checkbox"/>		
VOR/DME Arc Approach Procedures	<input type="checkbox"/>		
Missed Approach Procedures	<input type="checkbox"/>		
Partial Panel Approach Procedures	<input type="checkbox"/>		

COMPLETION STANDARDS:

This lesson will be complete when the student can perform any instrument task without assistance from the instructor. The performance of each task must meet the current FAA Instrument Rating Practical Test Standards.

REMARKS: _____

Student Signature

Instructor Signature

/ Print Name

TECH AVIATION FLIGHT SCHOOL, INC.

Instrument Pilot Rating Course-ASEL

Flight Training Syllabus

DATE: ___/___/___

GRADE: _____

AIRCRAFT MODEL: _____

N _____

TIME LOG	STAGE II CHECK				FLIGHT LESSON #231	
	Dual	Cross Country	IFR	ATD	Ground	Total Flight
Required	1.5		1.3		1.5	1.5
Lesson Total						
Amount Forward						
Total to Date						
Required Total	36.5	6.7	19.7	14.0	9.5	36.5

LESSON OBJECTIVE:

The objective of this lesson is to evaluate the student's IFR skills in preparation for the end-of-course test.

LESSON CONTENT			
Subject	Grade	Subject	Grade
Preflight Preparation		- Steep Turns	
- Weather Information		- Recovery from Unusual Flight Attitudes	
- Cross-country flight planning		Navigation Aids	
Preflight Procedures		- Intercept / Track VOR/VORTAC and DME	
- Aircraft System Relating to IFR Operations		- Intercept and Track NDB Bearings	
- Aircraft Flight Instrument & Navigation Equip		Instrument Approach Procedures	
- Instrument Cockpit Check		- VOR/VORTAC Instr. App Procedures	
Air Traffic Control Clearances and Procedures		- NDB Instrument Approach Procedures	
- Air Traffic Control Clearances		- ILS Instrument Approach Procedures	
- Compliance with DPs, Enroute, Arrival Clearances and Procedures		- Missed Approach Procedures	
- Holding Procedures		- Circling Approach Procedures	
Flight by Reference to Instruments		- Landing from a Straigh-In or Circling App.	
- Straight-and-Level		Emergency Operations	
- Change of Airspeed		- Loss of Communications	
- Constant Airspeed Climbs and Descents		- Loss of Gyro Attitude or Heading Indicator	
- Timed Turns to Magnetic Compass Heading		Post Flight Procedures	
		- Checking Instruments and Equipment	

COMPLETION STANDARDS:

At the completion of this lesson, the student shall display a complete understanding of IFR procedures. The student shall demonstrate the necessary knowledge and skill to operate safely as pilot in command and will perform all IFR procedures at or above the proficiency level listed in the current FAA Instrument Rating (Airplane) Practical Test Standards.

REMARKS:

Student Signature

Instructor Signature

Print Name

TECH AVIATION FLIGHT SCHOOL, INC.

Instrument Pilot Certification Course- ASEL

Training Syllabus

DATE: ___/___/___

GRADE: _____

AIRCRAFT MODEL: _____

N _____

TIME LOG	END-OF-COURSE CHECK				FLIGHT LESSON #232	
	Dual	Cross Country	IFR	ATD	Ground	Total Flight
Required	1.5		1.3		1.5	1.5
Lesson Total						
Amount Forward						
Total to Date						
Required Total	38.0	6.7	21.0	14.0	11.0	38.0

LESSON OBJECTIVE:

This stage check/end-of-course test will be conducted by the Chief or Assistant Chief Flight Instructor. The student's instrument flight proficiency will be evaluated, as well as the ability to act safely, and competently as pilot in command. The student will be evaluated on the ability to control the aircraft accurately and smoothly while exercising sound judgment in decision-making.

LESSON CONTENT			
Subject	Grade	Subject	Grade
Preflight Preparation		- Steep Turns	
- Weather Information		- Recovery from Unusual Flight Attitudes	
- Cross-country flight planning		Navigation Aids	
Preflight Procedures		- Intercept / Track VOR/VORTAC and DME	
- Aircraft System Relating to IFR Operations		- Intercept and Track NDB Bearings	
- Aircraft Flight Instrument & Navigation Equip		Instrument Approach Procedures	
- Instrument Cockpit Check		- VOR/VORTAC Instr. App Procedures	
Air Traffic Control Clearances and Procedures		- NDB Instrument Approach Procedures	
- Air Traffic Control Clearances		- ILS Instrument Approach Procedures	
- Compliance with DPs, Enroute, Arrival Clearances and Procedures		- Missed Approach Procedures	
- Holding Procedures		- Circling Approach Procedures	
Flight by Reference to Instruments		- Landing from a Straight-In or Circling App.	
- Straight-and-Level		Emergency Operations	
- Change of Airspeed		- Loss of Communications	
- Constant Airspeed Climbs and Descents		- Loss of Gyro Attitude or Heading Indicator	
- Timed Turns to Magnetic Compass Heading		Post Flight Procedures	
		- Checking Instruments and Equipment	

COMPLETION STANDARDS:

At the completion of this lesson, will meet or exceed the standards outlined in the FAA Instrument Rating (Airplane) Practical Test Standards.

REMARKS:

Student Signature

Instructor Signature

Print Name