



Private Pilot 2020 TEST PREP

5 FREE ONLINE
PRACTICE TESTS
ACTIVATION CODE
INCLUDED

Study & Prepare

Pass your test and know what is essential to become a safe, competent pilot—from the most trusted source in aviation training

Private Pilot 2020 TEST PREP

Study & Prepare

**Pass your test and know what is essential to become a safe,
competent pilot—from the most trusted source in aviation training**

READER TIP

The FAA Knowledge Exam Questions can change throughout the year.
Stay current with test changes; sign up for ASA's free email update service
at asa2fly.com/testupdate



AVIATION SUPPLIES & ACADEMICS
NEWCASTLE, WASHINGTON

Private Pilot Test Prep
2020 Edition

Aviation Supplies & Academics, Inc.
7005 132nd Place SE
Newcastle, Washington 98059-3153
425.235.1500 | asa2fly.com

© 2019 Aviation Supplies & Academics, Inc.

FAA Questions herein are from United States government sources and contain current information as of: June 2019

None of the material in this publication supersedes any documents, procedures or regulations issued by the Federal Aviation Administration.

ASA assumes no responsibility for any errors or omissions. Neither is any liability assumed for damages resulting from the use of the information contained herein.

Important: This Test Prep should be sold with and used in conjunction with *Airman Knowledge Testing Supplement for Sport Pilot, Recreational Pilot, and Private Pilot* (FAA-CT-8080-2H). ASA reprints the FAA test figures and legends contained within this government document, and it is also sold separately and available from aviation retailers nationwide. Order #ASA-CT-8080-2H.

Cover photo: Aviation History Collection/Alamy Stock Photo

ASA-TP-PVT-20-PD

PDF eBook ISBN 978-1-61954-781-0
Print Book ISBN 978-1-61954-780-3

About the Contributor

Jackie Spanitz

General Manager
Aviation Supplies & Academics, Inc.

As General Manager of Aviation Supplies & Academics, Jackie Spanitz oversees maintenance and development of more than 1,000 titles and pilot supplies in the ASA product line. Ms. Spanitz has worked with airman training and testing for more than 25 years, including participation in the ACS development committees. Jackie holds a Bachelor of Science degree in aviation technology from Western Michigan University, a Masters degree from Embry Riddle Aeronautical University, and Instructor and Commercial Pilot certificates. She is the author of *Guide to the Flight Review*, and the technical editor for ASA's *Test Prep* and *FAR/AIM* series.

About ASA: Aviation Supplies & Academics, Inc. (ASA) is an industry leader in the development and sale of aviation supplies and publications for pilots, flight instructors, flight engineers, air traffic controllers, flight attendants, aviation maintenance technicians, and drone operators. We manufacture and publish more than 1,000 products, and have been providing trusted and reliable training materials to the aviation industry for 80 years. Visit asa2fly.com for a free catalog.

Stay informed of aviation
industry happenings

Website asa2fly.com

Updates asa2fly.com/testupdate

Twitter twitter.com/asa2fly

Facebook facebook.com/asa2fly

Blog learntoflyblog.com

Contents

Instructions

| | |
|--|-------|
| Preface | vii |
| Updates and Practice Tests | ix |
| Description of the Tests | x |
| <i>Knowledge Test Eligibility Requirements</i> | xi |
| <i>Process for Taking a Knowledge Test</i> | xi |
| <i>Use of Test Aids and Materials</i> | xv |
| <i>Retesting Procedures</i> | xvi |
| <i>Cheating or Other Unauthorized Conduct</i> | xvi |
| Eligibility Requirements | xvii |
| <i>Eligibility for the Private Pilot Certificate</i> | xvii |
| <i>Eligibility for the Sport Pilot Certificate</i> | xix |
| Knowledge Exam References | xxi |
| ASA Test Prep Layout | xxii |
| Opportunity Knocking: Become a Flight Instructor! | xxiii |

Chapter 1 Basic Aerodynamics

| | |
|--------------------------------------|------|
| Aerodynamic Terms | 1–3 |
| Axes of Rotation and the Four Forces | |
| Acting in Flight | 1–6 |
| <i>Lift</i> | 1–7 |
| <i>Weight</i> | 1–7 |
| <i>Thrust</i> | 1–7 |
| <i>Drag</i> | 1–8 |
| Stability | 1–10 |
| Turns, Loads, and Load Factors | 1–12 |
| Maneuvers | 1–16 |
| <i>Rectangular Course</i> | 1–16 |
| <i>Turns Around a Point</i> | 1–16 |
| <i>S-Turns</i> | 1–17 |
| Stalls and Spins | 1–19 |
| Flaps | 1–20 |
| Ground Effect | 1–21 |
| Wake Turbulence | 1–23 |

Chapter 2 Aircraft Systems

| | |
|--|------|
| Reciprocating Engines | 2–3 |
| Ignition and Electrical Systems | 2–4 |
| Fuel Induction Systems | 2–6 |
| Carburetor Ice | 2–7 |
| Aviation Fuel | 2–10 |
| Engine Temperatures | 2–12 |
| Propellers | 2–15 |
| Torque | 2–16 |
| Preflight Inspection Procedures | 2–18 |
| Helicopter Systems | 2–19 |
| Glider Operations | 2–25 |
| Lighter-Than-Air Operations | 2–33 |
| Powered Parachute and Weight-Shift Control Operations | 2–41 |
| Gyroplane | 2–48 |

Chapter 3 Flight Instruments

| | |
|--|------|
| Pitot-Static Instruments | 3–3 |
| Airspeeds and the Airspeed Indicator | 3–4 |
| The Altimeter and Altitudes | 3–8 |
| Gyroscopic Instruments | 3–13 |
| <i>Attitude Indicator</i> | 3–13 |
| <i>Turn Coordinator</i> | 3–13 |
| <i>Heading Indicator</i> | 3–13 |
| Magnetic Compass (Northern Hemisphere) | 3–15 |

Chapter 4 Regulations

| | |
|--|------|
| Introduction | 4–3 |
| Pilot Certificate Privileges and Limitations | 4–3 |
| Pilot Ratings | 4–9 |
| Medical Certificates | 4–10 |
| Required Certificates | 4–13 |
| Recent Flight Experience | 4–14 |
| High-Performance Airplanes | 4–16 |

Continued

| | |
|---|------|
| Glider Towing | 4-17 |
| Change of Address | 4-18 |
| Responsibility and Authority of the Pilot-in-Command | 4-18 |
| Preflight Action | 4-20 |
| Seatbelts | 4-22 |
| Alcohol and Drugs | 4-23 |
| Right-of-Way Rules | 4-25 |
| Parachutes | 4-27 |
| Deviation from Air Traffic Control Instructions | 4-28 |
| Minimum Safe Altitudes | 4-29 |
| Basic VFR Weather Minimums | 4-30 |
| Special VFR Weather Minimums | 4-34 |
| VFR Cruising Altitudes | 4-35 |
| Categories of Aircraft | 4-37 |
| Formation Flight and Dropping Objects | 4-38 |
| VFR Flight Plans | 4-38 |
| Speed Limits | 4-39 |
| Airworthiness | 4-40 |
| Maintenance and Inspections | 4-42 |
| <i>Light-Sport Repairman Certificates</i> | 4-43 |
| ADs, ACs, and NOTAMs | 4-47 |
| Accident Reporting Requirements | 4-50 |

Chapter 5 **Procedures and Airport Operations**

| | |
|--|------|
| Uncontrolled and Tower-Controlled Airports | 5-3 |
| Airport Markings and Signs | 5-6 |
| Airport Lighting | 5-14 |
| Visual Approach Slope Indicator (VASI) | 5-15 |
| Surface Operations | 5-18 |
| Chart Supplements U.S. | 5-21 |
| Fitness for Flight | 5-23 |
| Aeronautical Decision Making | 5-27 |
| Collision Avoidance | 5-34 |
| Aircraft Lighting | 5-37 |

Chapter 6 **Weather**

| | |
|-----------------------------------|------|
| The Heating of the Earth | 6-3 |
| Circulation and Wind | 6-4 |
| Temperature | 6-5 |
| Moisture | 6-6 |
| Air Masses and Fronts | 6-8 |
| Stability of the Atmosphere | 6-9 |
| Clouds | 6-10 |
| Turbulence | 6-14 |
| Thunderstorms | 6-15 |
| Wind Shear | 6-18 |
| Icing | 6-19 |
| Fog | 6-21 |
| Frost | 6-22 |

Chapter 7 **Weather Services**

| | |
|--|------|
| Aviation Routine Weather Report (METAR) | 7-3 |
| Pilot Weather Reports (PIREPs) (UA) | 7-5 |
| Terminal Aerodrome Forecast (TAF) | 7-7 |
| Graphical Forecasts for Aviation (GFA) | 7-8 |
| Winds and Temperatures Aloft Forecast (FB) | 7-9 |
| Inflight Weather Advisories (WA, WS, WST) | 7-10 |
| Obtaining a Telephone Weather Briefing | 7-12 |

Chapter 8 **Aircraft Performance**

| | |
|--|------|
| Weight and Balance | 8-3 |
| <i>Airplane</i> | 8-4 |
| <i>Weight-Shift Control</i> | 8-4 |
| <i>Powered Parachute</i> | 8-4 |
| Computing Weight and Balance Problems Using a Table | 8-6 |
| Computing Weight and Balance Problems Using a Graph | 8-12 |
| Density Altitude and Aircraft Performance | 8-24 |
| Takeoff Distance | 8-30 |
| Cruise Power Setting Table | 8-34 |
| Landing Distance Graphs and Tables | 8-36 |
| Headwind and Crosswind Component Graph | 8-42 |
| Maximum Range Performance | 8-44 |

Chapter 9 **Enroute Flight**

| | |
|---|------|
| Pilotage..... | 9-3 |
| Time..... | 9-5 |
| Topography..... | 9-8 |
| Dead Reckoning..... | 9-11 |
| <i>Plotting Courses</i> | 9-11 |
| <i>Magnetic Variation</i> | 9-12 |
| <i>Magnetic Deviation</i> | 9-14 |
| Wind and Its Effects..... | 9-14 |
| The Wind Triangle..... | 9-17 |
| The Flight Computer (E6-B)..... | 9-18 |
| <i>Finding Wind Correction Angle (WCA) and</i> <i>Ground Speed</i> | 9-18 |
| <i>Flight Computer Calculator Face</i> | 9-20 |
| <i>Finding Time, Rate, and Distance</i> | 9-21 |
| <i>Calculating Fuel Consumption</i> | 9-23 |
| <i>Finding True Airspeed and Density Altitude</i> | 9-24 |
| Airspace..... | 9-32 |

Chapter 10 **Navigation**

| | |
|--------------------------------------|-------|
| VHF Omnidirectional Range (VOR)..... | 10-3 |
| VOR Orientation..... | 10-3 |
| Course Determination..... | 10-6 |
| VOR Airways..... | 10-8 |
| VOR Receiver Check Points..... | 10-9 |
| Global Positioning System (GPS)..... | 10-10 |

Chapter 11 **Communication Procedures**

| | |
|---|-------|
| Phraseology, Techniques, and Procedures..... | 11-3 |
| Airport Traffic Area Communications and Light Signals..... | 11-8 |
| Flight Plans..... | 11-10 |
| Radar Assistance to VFR Aircraft..... | 11-11 |
| Transponder..... | 11-13 |
| Emergency Locator Transmitter (ELT)..... | 11-15 |

Cross References

| | |
|---|-----|
| A: Question Number and Page Number..... | A-1 |
| B: Learning Statement Code and Question Number..... | B-1 |

Preface

Welcome to ASA's Test Prep Series. ASA's test books have been helping pilots prepare for the FAA Knowledge Tests for more than 60 years with great success. We are confident that with proper use of this book, you will score very well on any of the private, sport, and recreational pilot certificate tests.

Begin your studies with a classroom or home-study ground school course, which will involve reading a comprehensive Private Pilot textbook. Conclude your studies with this Test Prep or comparable software. Read the question, select your choice for the correct answer, then read the explanation. Use the Learning Statement Codes and references that conclude each explanation to identify additional resources if you need further study of a subject. Upon completion of your studies, take practice tests at www.prepware.com (see inside front cover for your free account).

The FAA Private, Sport, and Recreational Pilot questions have been arranged into chapters based on subject matter. Topical study, in which similar material is covered under a common subject heading, promotes better understanding, aids recall, and thus provides a more efficient study guide. Study and place emphasis on those questions most likely to be included in your test (identified by the aircraft category above each question). For example, a pilot preparing for the Private Airplane test would focus on the questions marked "ALL" and "AIR," and a pilot preparing for the Private Helicopter test would focus on the questions marked "ALL" and "RTC."

It is important to answer every question assigned on your FAA Knowledge Test. If in their ongoing review, the FAA authors decide a question has no correct answer, is no longer applicable, or is otherwise defective, your answer will be marked correct no matter which one you chose. However, you will not be given the automatic credit unless you have marked an answer. Unlike some other exams you may have taken, there is no penalty for "guessing" in this instance.

The FAA exams are "closed tests" which means the exact database of questions is not available to the public. The question and answer choices in this book are based on our extensive history and experience with the FAA testing process. You might see similar although not exactly the same questions on your official FAA exam. Answer stems may be rearranged from the A, B, C order you see in this book. Therefore, be careful to fully understand the intent of each question and corresponding answer while studying, rather than memorize the A, B, C answer. You may be asked a question that has unfamiliar wording; studying and understanding the information in this book and the associated references will give you the tools to answer question variations with confidence.

If your study leads you to question an answer choice, we recommend you seek the assistance of a local instructor. We welcome your questions, recommendations or concerns:

Aviation Supplies & Academics, Inc.

7005 132nd Place SE
Newcastle, WA 98059-3153
Voice: 425.235.1500 Fax: 425.235.0128
Email: cfi@asa2fly.com Website: www.asa2fly.com

The FAA appreciates testing experience feedback. You can contact the branch responsible for the FAA Knowledge Exams at:

Federal Aviation Administration

AFS-630, Airman Testing Standards Branch
PO Box 25082
Oklahoma City, OK 73125
Email: afs630comments@faa.gov

Updates and Practice Tests

Free Test Updates for the One-Year Life Cycle of Test Prep Books

The FAA rolls out new tests as needed throughout the year. The FAA exams are “closed tests” which means the exact database of questions is not available to the public. ASA combines more than 60 years of experience with expertise in airman training and certification tests to prepare the most effective test preparation materials available in the industry.

You can feel confident you will be prepared for your FAA Knowledge Exam by using the ASA Test Preps. ASA publishes test books each June and keeps abreast of changes to the tests. These changes are then posted on the ASA website as a Test Update.

Visit the ASA website before taking your test to be certain you have the most current information. While there, sign up for ASA’s free email Update service. We will then send you an email notification if there is a change to the test you are preparing for so you can review the Update for revised and/or new test information.

www.asa2fly.com/testupdate

We invite your feedback. After you take your official FAA exam, let us know how you did. Were you prepared? Did the ASA products meet your needs and exceed your expectations? We want to continue to improve these products to ensure applicants are prepared, and become safe aviators. Send feedback to: cfi@asa2fly.com

www.prepware.com

See inside front cover for FREE account!

Helping you practice for written exams.

As the experts in FAA Knowledge Exam preparation, we want you to have the confidence needed before heading to the testing center, and help eliminate the hassle and expense of retaking exams.

> Realistic Test Simulation

Test questions and time allowed replicate the official FAA exam

> Performance Graphs

Review how you did, track your performance and review explanations for the questions you missed

> Gain Confidence

Go into your exam fully prepared after practicing up to 5 simulated tests

> Succeed

Pass your exam, achieve your goals, and set new ones



Remote Pilot • Sport Pilot • Private Pilot • Instrument Rating • Commercial Pilot • Flight Instructor • Ground Instructor
Fundamentals of Instructing • Flight Engineer • Airline Transport Pilot • AMT General • Airframe • Powerplant

Practice tests are also available as an app! www.asa2fly.com/apps

Knowledge Exam References

The FAA references the following documents to write the FAA Knowledge Exam questions. You should be familiar with all of these as part of your ground school studies, which you should complete before starting test preparation:

FAA-H-8083-25 *Pilot's Handbook of Aeronautical Knowledge*

Sectional Aeronautical Chart (SAC)

FAA-H-8083-3 *Airplane Flying Handbook*

FAA-H-8083-13 *Glider Flying Handbook*

FAA-H-8083-21 *Helicopter Flying Handbook*

FAA-H-8083-11 *Balloon Flying Handbook*

FAA-H-8083-29 *Powered Parachute Flying Handbook*

FAA-H-8083-5 *Weight-Shift Control Aircraft Flying Handbook*

FAA-H-8083-1 *Aircraft Weight and Balance Handbook*

FAA-H-8083-2 *Risk Management Handbook*

FAA-S-ACS-6 Private Pilot Airplane Airman Certification Standards

FAA-S-8081-3 Recreational Pilot Practical Test Standards

FAA-S-8081-15 Private Pilot Helicopter Practical Test Standards

FAA-S-8081-29, FAA-S-8081-31 Sport Pilot Practical Test Standards

Chart Supplements U.S. (formerly *Airport/Facility Directory* or *A/FD*)

AC 00-6 *Aviation Weather*

AC 00-45 *Aviation Weather Services*

AC 68-1 *BasicMed*

Aeronautical Information Manual (AIM)

14 CFR Parts 1, 43, 61, 68, 71, 91

49 CFR Part 830 (NTSB)

Visit the ASA website for these and many more titles and pilot supplies for your aviation endeavors:
www.asa2fly.com

ASA Test Prep Layout

The sample FAA questions have been sorted into chapters according to subject matter. Within each chapter, the questions have been further classified and all similar questions grouped together with a concise discussion of the material covered in each group. This discussion material of “Chapter text” is printed in a larger font and spans the entire width of the page. Immediately following the sample FAA Question is ASA’s Explanation in *italics*. The last line of the Explanation contains the Learning Statement Code and further reference (if applicable). See the EXAMPLE below.

Figures referenced by the Chapter text only are numbered with the appropriate chapter number, i.e., “Figure 1-1” is Chapter 1’s first chapter-text figure.

Some Questions refer to Figures or Legends immediately following the question number, i.e., “3201. (Refer to Figure 14.)” These are FAA Figures and Legends which can be found in the separate booklet: *Airman Knowledge Testing Supplement (CT-8080-XX)*. This supplement is bundled with the Test Prep and is the exact material you will have access to when you take your computerized test. We provide it separately, so you will become accustomed to referring to the FAA Figures and Legends as you would during the test.

Figures referenced by the Explanation and pertinent to the understanding of that particular question are labeled by their corresponding Question number. For example: the caption “Questions 3245 and 3248” means the figure accompanies the Explanations for both Question 3245 and 3248.

Answers to each question are found at the bottom of each page.

EXAMPLE:

Chapter text

Four aerodynamic forces are considered to be basic because they act upon an aircraft during all flight maneuvers. There is the downward-acting force called WEIGHT which must be overcome by the upward-acting force called LIFT, and there is the rearward-acting force called DRAG, which must be overcome by the forward-acting force called THRUST.

Category rating. This question may be found on tests for these ratings.*

ALL, SPO ←

3201. (Refer to Figure 14.) The four forces acting on an airplane in flight are ↑

A— lift, weight, thrust, and drag.
B— lift, weight, gravity, and thrust. ←
C— lift, gravity, power, and friction.

See separate book: *Airman Knowledge Testing Supplement (CT-8080-XX)*

Question and answer choices

Explanation

Lift, weight, thrust, and drag are the four basic aerodynamic forces acting on an aircraft in flight. (PLT235) — FAA-H-8083-25 ←

Answer (B) is incorrect because the force of gravity is always the same number and reacts with the airplane’s mass to produce a different weight for almost every airplane. Answer (C) is incorrect because weight is the final product of gravity, thrust is the final product of power, and drag is the final product of friction. Power, gravity, and friction are only parts of the aerodynamic forces of flight. ←

Code line. FAA Learning Statement Code in parentheses, followed by references for further study.

Incorrect answer explanation. Reasons why answer choices are incorrect explained here.

* **Note:** The FAA does not identify which questions are on the different ratings’ tests. Unless the wording of a question is pertinent to only one rating category, it may be found on any of the tests.

ALL = All aircraft
AIR = Airplane
GLI = Glider
LTA = Lighter-Than-Air (applies to hot air balloon, gas balloon and airship)
REC = Recreational
RTC = Rotorcraft (applies to both helicopter and gyroplane)
PPC = Powered Parachute
WSC = Weight-Shift Control

SPO = Sport Pilot (all aircraft categories)
LSA = Sport Pilot Airplane
LSG = Sport Pilot Glider
LSL = Sport Pilot Lighter-Than-Air
LSP = Sport Pilot Powered Parachute
LSR = Sport Pilot Rotorcraft
LSW = Sport Pilot Weight-Shift-control

Chapter 4

Regulations

| | |
|--|------|
| Introduction | 4-3 |
| Pilot Certificate Privileges and Limitations | 4-3 |
| Pilot Ratings | 4-9 |
| Medical Certificates | 4-10 |
| Required Certificates | 4-13 |
| Recent Flight Experience | 4-14 |
| High-Performance Airplanes | 4-16 |
| Glider Towing | 4-17 |
| Change of Address | 4-18 |
| Responsibility and Authority of the Pilot-in-Command | 4-18 |
| Preflight Action | 4-20 |
| Seatbelts | 4-22 |
| Alcohol and Drugs | 4-23 |
| Right-of-Way Rules | 4-25 |
| Parachutes | 4-27 |
| Deviation from Air Traffic Control Instructions | 4-28 |
| Minimum Safe Altitudes | 4-29 |
| Basic VFR Weather Minimums | 4-30 |
| Special VFR Weather Minimums | 4-34 |
| VFR Cruising Altitudes | 4-35 |
| Categories of Aircraft | 4-37 |
| Formation Flight and Dropping Objects | 4-38 |
| VFR Flight Plans | 4-38 |
| Speed Limits | 4-39 |
| Airworthiness | 4-40 |
| Maintenance and Inspections | 4-42 |
| <i>Light-Sport Repairman Certificates</i> | 4-43 |
| ADs, ACs, and NOTAMs | 4-47 |
| Accident Reporting Requirements | 4-51 |

Introduction

Although “FAR” is used as the acronym for “Federal Aviation Regulations,” and found throughout the regulations themselves and hundreds of other publications, the FAA is now actively discouraging its use. “FAR” also means “Federal Acquisition Regulations.” To eliminate any possible confusion, the FAA cites the federal aviation regulations with reference to Title 14 of the Code of Federal Regulations. For example, “FAR Part 91.3” is referenced as “14 CFR Part 91 Section 3.”

While **Federal Aviation Regulations** are many and varied, some are of particular interest to all pilots.

14 CFR Part 1 contains definitions and abbreviations of many terms commonly used in aviation. For example, the term “night” means “the time between the end of evening civil twilight and the beginning of morning civil twilight, as published in the American Air Almanac, converted to local time” and is used for logging night time.

14 CFR Part 61, entitled “Certification: Pilots, Flight Instructors and Ground Instructors,” prescribes the requirements for issuing pilot and flight instructor certificates and ratings, the conditions of issue, and the privileges and limitations of those certificates and ratings.

14 CFR Part 91, entitled “General Operating and Flight Rules,” describes rules governing the operation of aircraft (with certain exceptions) within the United States.

The **National Transportation Safety Board (NTSB)** has established rules and requirements for notification and reporting of aircraft accidents and incidents. These are contained in **NTSB Part 830**.

ALL, SPO

3005. The definition of nighttime is

A— sunset to sunrise.

B— 1 hour after sunset to 1 hour before sunrise.

C— the time between the end of evening civil twilight and the beginning of morning civil twilight.

Night is the time between the end of evening civil twilight and the beginning of morning civil twilight converted to local time, as published in the American Air Almanac. (PLT395) — 14 CFR §1.1

Answer (A) is incorrect because it refers to the time when lighted position lights are required. Answer (B) is incorrect because it refers to the currency requirement to carry passengers.

Pilot Certificate Privileges and Limitations

The types of pilot certificates and the attendant privileges are contained in 14 CFR Part 61 and are briefly stated as follows:

- The holder of a student pilot certificate is limited to solo flights or flights with an instructor.
- Recreational pilots may not carry more than one passenger, pay less than the pro rata share of the operating expenses of a flight with a passenger (provided the expenses involve only fuel, oil, airport expenses, or aircraft rental fees), fly an aircraft with more than 4 seats or high-performance characteristics, demonstrate an aircraft to a prospective buyer, fly between sunset and sunrise, or fly in airspace in which communication with air traffic control is required. Recreational pilots may fly beyond 50 NM from the departure airport with additional training and endorsements from an authorized instructor.
- A sport pilot may act as pilot-in-command of a light-sport aircraft, carry up to 1 passenger, during daylight hours, outside Class A, B, C, or D airspace (unless the sport pilot obtains further training and an endorsement), when visibilities are greater than 3 SM. Additional requirements are defined in 14 CFR §61.315

Continued

Answers

3005 [C]

- A private pilot has unlimited solo privileges, and may carry passengers or cargo as long as the flying is for the pilots' pleasure or personal business and is not done for hire. A private pilot may fly in conjunction with his/her job as long as that flying is incidental to his/her employment.
- A private pilot may not pay less than the pro rata share of the operating expenses of a flight with passengers, provided the expenses involve only fuel, oil, airport expenditures, or rental fees. The only time passengers may pay for the entire flight is if a donation is made by the passengers to the charitable organization which is sponsoring the flight.
- Commercial pilots may fly for compensation or hire.
- An Airline Transport Pilot may act as pilot-in-command (PIC) of airline and scheduled commuter operations.
- All pilot certificates (except student pilot) are valid indefinitely unless surrendered, superseded or revoked.

ALL

3064. In regard to privileges and limitations, a private pilot may

- A— not pay less than the pro rata share of the operating expenses of a flight with passengers provided the expenses involve only fuel, oil, airport expenditures, or rental fees.
- B— act as pilot in command of an aircraft carrying a passenger for compensation if the flight is in connection with a business or employment.
- C— not be paid in any manner for the operating expenses of a flight.

A private pilot may not pay less than the pro rata share of the operating expenses of a flight with passengers, provided the expenses involve only fuel, oil, airport expenditures, or rental fees. (PLT448) — 14 CFR §61.113

ALL

3065. According to regulations pertaining to privileges and limitations, a private pilot may

- A— be paid for the operating expenses of a flight if at least three takeoffs and three landings were made by the pilot within the preceding 90 days.
- B— not be paid in any manner for the operating expenses of a flight.
- C— not pay less than the pro rata share of the operating expenses of a flight with passengers provided the expenses involve only fuel, oil, airport expenditures, or rental fees.

A private pilot may not pay less than the pro rata share of the operating expenses of a flight with passengers, provided the expenses involve only fuel, oil, airport expenditures, or rental fees. (PLT448) — 14 CFR §61.113

ALL

3066. What exception, if any, permits a private pilot to act as pilot in command of an aircraft carrying passengers who pay for the flight?

- A— If the passengers pay all the operating expenses.
- B— If a donation is made to a charitable organization for the flight.
- C— There is no exception.

A private pilot may act as pilot-in-command of an aircraft used in a passenger-carrying airlift sponsored by a charitable organization, and for which the passengers make a donation to the organization. This can be done if the sponsor of the airlift notifies the FAA General Aviation District Office having jurisdiction over the area concerned, at least 7 days before the flight, and furnishes any essential information that the office requests. (PLT448) — 14 CFR §61.113

ALL

3067. (Refer to Figure 74.) What minimum pilot certificate is required for a flight departing out of Hayward Executive (area 6)?

- A— Student Pilot Certificate.
- B— Private Pilot Certificate.
- C— Sport Pilot Certificate.

Hayward Executive is located in Class D airspace up to but not including 1,500 feet MSL as depicted by the blue segmented line surrounding it. No specific pilot certification is required for flight within Class D airspace. A student pilot may operate within Class D airspace with appropriate solo endorsements. (PLT448) — AIM ¶3-2-5
Answer (B) and (C) are incorrect because no minimum pilot certificate is specified for operations in Class D airspace.

Answers

3064 [A]

3065 [C]

3066 [B]

3067 [A]

REC

3044. According to regulations pertaining to privileges and limitations, a recreational pilot may

- A— be paid for the operating expenses of a flight.
- B— not pay less than the pro rata share of the operating expenses of a flight with a passenger.
- C— not be paid in any manner for the operating expenses of a flight.

A recreational pilot may not pay less than the pro rata share of the operating expenses of a flight with a passenger, provided the expenses involve only fuel, oil, airport expenditures, or rental fees. (PLT448) — 14 CFR §61.101

REC

3045. In regard to privileges and limitations, a recreational pilot may

- A— fly for compensation or hire within 50 nautical miles from the departure airport with a logbook endorsement.
- B— not be paid in any manner for the operating expenses of a flight from a passenger.
- C— not pay less than the pro rata share of the operating expenses of a flight with a passenger.

A recreational pilot may not pay less than the pro rata share of the operating expenses of a flight with a passenger, provided the expenses involve only fuel, oil, airport expenditures, or rental fees. (PLT448) — 14 CFR §61.101

REC

3046. When may a recreational pilot act as pilot in command on a cross-country flight that exceeds 50 nautical miles from the departure airport?

- A— After receiving ground and flight instructions on cross-country training and a logbook endorsement.
- B— 12 calendar months after receiving his or her recreational pilot certificate and a logbook endorsement.
- C— After attaining 100 hours of pilot-in-command time and a logbook endorsement.

A person who holds a recreational pilot certificate may act as pilot-in-command of an aircraft on a flight that exceeds 50 nautical miles from the departure airport, provided that person has received ground and flight training from an authorized instructor, been found proficient

in cross-country flying, and received an endorsement, which is carried in the person's possession in the aircraft. (PLT448) — 14 CFR §61.101

REC

3047. A recreational pilot may act as pilot in command of an aircraft that is certificated for a maximum of how many occupants?

- A— Two.
- B— Three.
- C— Four.

A recreational pilot may not act as pilot-in-command of an aircraft that is certificated for more than four occupants. (PLT448) — 14 CFR §61.101

REC

3048. A recreational pilot may act as pilot in command of an aircraft with a maximum engine horsepower of

- A— 160.
- B— 180.
- C— 200.

A recreational pilot may not act as pilot-in-command of an aircraft that is certificated with a powerplant of more than 180 horsepower. (PLT448) — 14 CFR §61.101

REC

3049. What exception, if any, permits a recreational pilot to act as pilot in command of an aircraft carrying a passenger for hire?

- A— If the passenger pays no more than the operating expenses.
- B— If a donation is made to a charitable organization for the flight.
- C— There is no exception.

A recreational pilot may not act as pilot-in-command of an aircraft that is carrying a passenger or property for compensation or hire, in furtherance of a business, or for a charitable organization. (PLT448) — 14 CFR §61.101

Answer (A) is incorrect because the passenger may only pay an equal share of the operating expenses. Answer (B) is incorrect because a recreational pilot may not carry passengers for hire, even if the flight is a donation to a charitable organization.

Answers

3044 [B]

3045 [C]

3046 [A]

3047 [C]

3048 [B]

3049 [C]

REC

3050. May a recreational pilot act as pilot in command of an aircraft in furtherance of a business?

- A— Yes, if the flight is only incidental to that business.
- B— Yes, providing the aircraft does not carry a person or property for compensation or hire.
- C— No, it is not allowed.

A recreational pilot may not act as pilot-in-command of an aircraft in furtherance of a business. (PLT448) — 14 CFR §61.101

REC

3051. With respect to daylight hours, what is the earliest time a recreational pilot may take off?

- A— One hour before sunrise.
- B— At sunrise.
- C— At the beginning of morning civil twilight.

A recreational pilot may not act as pilot-in-command of an aircraft between sunset and sunrise. The earliest a recreational pilot may takeoff is at sunrise. (PLT467) — 14 CFR §61.101

REC

3052. If sunset is 2021 and the end of evening civil twilight is 2043, when must a recreational pilot terminate the flight?

- A— 2021.
- B— 2043.
- C— 2121.

A recreational pilot may not act as pilot-in-command of an aircraft between sunset and sunrise. A recreational pilot must land by sunset. (PLT448) — 14 CFR §61.101

SPO

2130. If sunset is 2021 and the end of evening civil twilight is 2043, when must a sport pilot terminate the flight?

- A— 2021.
- B— 2043.
- C— 2121.

A sport pilot may not act as pilot-in-command of an aircraft at night. A sport pilot must land by the end of evening twilight. (PLT448) — 14 CFR §61.315

REC

3052-1. When may a recreational pilot act as pilot in command of an aircraft at night?

- A— When obtaining an additional certificate or rating under the supervision of an authorized instructor, provided the surface or flight visibility is at least 1 statute mile.
- B— When obtaining an additional certificate or rating under the supervision of an authorized instructor, provided the surface or flight visibility is at least 3 statute miles.
- C— When obtaining an additional certificate or rating under the supervision of an authorized instructor, provided the surface or flight visibility is at least 5 statute miles.

For the purpose of obtaining additional certificates or ratings while under the supervision of an authorized instructor, a recreational pilot may fly as the sole occupant of an aircraft between sunset and sunrise, provided the flight or surface visibility is at least 5 SM. (PLT448) — 14 CFR §61.101

REC

3053. When may a recreational pilot operate to or from an airport that lies within Class C airspace?

- A— Anytime the control tower is in operation.
- B— When the ceiling is at least 1,000 feet and the surface visibility is at least 2 miles.
- C— After receiving training and a logbook endorsement from an authorized instructor.

A recreational pilot may not operate in airspace where air traffic control is required until they receive and log ground and flight training and an endorsement from an authorized instructor. (PLT161) — 14 CFR §61.101

REC

3054. Under what conditions may a recreational pilot operate at an airport that lies within Class D airspace and that has a part-time control tower in operation?

- A— Between sunrise and sunset when the tower is in operation, the ceiling is at least 2,500 feet, and the visibility is at least 3 miles.
- B— Any time when the tower is in operation, the ceiling is at least 3,000 feet, and the visibility is more than 1 mile.
- C— Between sunrise and sunset when the tower is closed, the ceiling is at least 1,000 feet, and the visibility is at least 3 miles.

Answers

3050 [C] 3051 [B] 3052 [A] 2130 [B] 3052-1 [C] 3053 [C]
 3054 [C]

A recreational pilot may not act as pilot-in-command of an aircraft in airspace in which communication with ATC is required. If the tower is closed, no communication is required and it reverts to Class E airspace. The visibility and cloud clearances for Class E airspace require a ceiling at least 1,000 feet and the visibility at least 3 miles. (PLT161) — 14 CFR §61.101

Answers (A) and (B) are incorrect because a recreational pilot may not operate in airspace that requires communication with ATC.

REC

3055. When may a recreational pilot fly above 10,000 feet MSL?

- A— When 2,000 feet AGL or below.
- B— When 2,500 feet AGL or below.
- C— When outside of controlled airspace.

A recreational pilot may not act as pilot-in-command of an aircraft at an altitude of more than 10,000 feet MSL or 2,000 feet AGL, whichever is higher. (PLT448) — 14 CFR §61.101

REC

3056. During daytime, what is the minimum flight or surface visibility required for recreational pilots in Class G airspace below 10,000 feet MSL?

- A— 1 mile.
- B— 3 miles.
- C— 5 miles.

A recreational pilot may not act as pilot-in-command of an aircraft when the flight or surface visibility is less than 3 statute miles. (PLT163) — 14 CFR §61.101

REC

3057. During daytime, what is the minimum flight visibility required for recreational pilots in controlled airspace below 10,000 feet MSL?

- A— 1 mile.
- B— 3 miles.
- C— 5 miles.

A recreational pilot may not act as pilot-in-command of an aircraft when the flight or surface visibility is less than 3 statute miles. (PLT163) — 14 CFR §61.101

REC

3058. Under what conditions, if any, may a recreational pilot demonstrate an aircraft in flight to a prospective buyer?

- A— The buyer pays all the operating expenses.
- B— The flight is not outside the United States.
- C— None.

A recreational pilot may not act as pilot-in-command of an aircraft to demonstrate that aircraft in flight to a prospective buyer. (PLT448) — 14 CFR §61.101

REC

3059. When, if ever, may a recreational pilot act as pilot in command in an aircraft towing a banner?

- A— If the pilot has logged 100 hours of flight time in powered aircraft.
- B— If the pilot has an endorsement in his/her pilot logbook from an authorized flight instructor.
- C— It is not allowed.

A recreational pilot may not act as pilot-in-command of an aircraft that is towing any object. (PLT401) — 14 CFR §61.101

REC

3043. How many passengers is a recreational pilot allowed to carry on board?

- A— One.
- B— Two.
- C— Three.

A recreational pilot may not carry more than one passenger. (PLT448) — 14 CFR §61.101

SPO

2123. How many passengers is a sport pilot allowed to carry on board?

- A— One.
- B— Two.
- C— Three.

Sport Pilots may not act as pilot in command of a light-sport aircraft while carrying more than one passenger. (PLT448) — 14 CFR §61.315

Answers

3055 [A] 3056 [B] 3057 [B] 3058 [C] 3059 [C] 3043 [A]
2123 [A]

REC

3060. When must a recreational pilot have a pilot-in-command flight check?

- A— Every 400 hours.
- B— Every 180 days.
- C— If the pilot has less than 400 total flight hours and has not flown as pilot in command in an aircraft within the preceding 180 days.

A recreational pilot who has logged fewer than 400 flight hours and who has not logged pilot-in-command time in an aircraft within the preceding 180 days may not act as pilot-in-command of an aircraft until flight instruction is received from an authorized flight instructor who certifies in the pilot's logbook that the pilot is competent to act as pilot-in-command of the aircraft. This requirement can be met in combination with the requirements of flight reviews, at the discretion of the instructor. (PLT448) — 14 CFR §61.101

REC

3061. A recreational pilot may fly as sole occupant of an aircraft at night while under the supervision of a flight instructor provided the flight or surface visibility is at least

- A— 3 miles.
- B— 4 miles.
- C— 5 miles.

For the purpose of obtaining additional certificates or ratings, while under the supervision of an authorized flight instructor, a recreational pilot may fly as sole occupant of an aircraft between sunset and sunrise, provided the flight or surface visibility is at least 5 statute miles. (PLT448) — 14 CFR §61.101

REC

3134. What minimum visibility and clearance from clouds are required for a recreational pilot in Class G airspace at 1,200 feet AGL or below during daylight hours?

- A— 1 mile visibility and clear of clouds.
- B— 3 miles visibility and clear of clouds.
- C— 3 miles visibility, 500 feet below the clouds.

Minimum flight or surface visibility for recreational pilots is 3 miles and minimum cloud clearance for all pilots in Class G airspace, below 1,200 AGL, is clear of clouds. (PLT163) — 14 CFR §61.101

Answer (A) is incorrect because this would be for private pilots. Answer (C) is incorrect because this is for controlled airspace.

REC

3135. Outside controlled airspace, the minimum flight visibility requirement for a recreational pilot flying VFR above 1,200 feet AGL and below 10,000 feet MSL during daylight hours is

- A— 1 mile.
- B— 3 miles.
- C— 5 miles.

Minimum flight or surface visibility for recreational pilots is 3 miles. (PLT163) — 14 CFR §61.101

SPO

2061. Outside controlled airspace, the minimum flight visibility requirement for a sport pilot flying above 1,200 feet AGL and below 10,000 feet MSL during daylight hours is

- A— 1 statute mile.
- B— 3 statute miles.
- C— 5 statute miles.

Minimum flight or surface visibility for sport pilots is 3 statute miles in all airspace at all times. (PLT467) — 14 CFR §61.315

SPO

2061-1. The minimum flight visibility requirement for a sport pilot is

- A— 1 statute mile.
- B— 3 statute miles.
- C— 5 statute miles.

Minimum flight or surface visibility for sport pilots is 3 statute miles. (PLT163) — 14 CFR §61.315

Answers

3060 [C]

3061 [C]

3134 [B]

3135 [B]

2061 [B]

2061-1 [B]

Pilot Ratings

When a pilot certificate is issued, it lists the category, class, and type (if appropriate) of aircraft in which the certificate holder is qualified. See Figure 4-1.

The term “**category**” means a broad classification of aircraft, such as airplane, rotorcraft, glider, and lighter-than-air. The term “**class**” means a classification within a category having similar operating characteristics, such as single-engine, multi-engine, land, water, helicopter, and balloon. The term “**type**” means a specific make and basic model of aircraft, such as Cessna 172 or Gulfstream IV.

A type rating must be held by the pilot-in-command of a large aircraft. “Large aircraft” means aircraft of more than 12,500 pounds maximum certificated takeoff weight.

All turbojet-powered airplanes, regardless of weight, require the PIC to have a type rating.

In addition to the category, class, and type ratings, if a pilot wishes to fly IFR, an instrument rating is required.

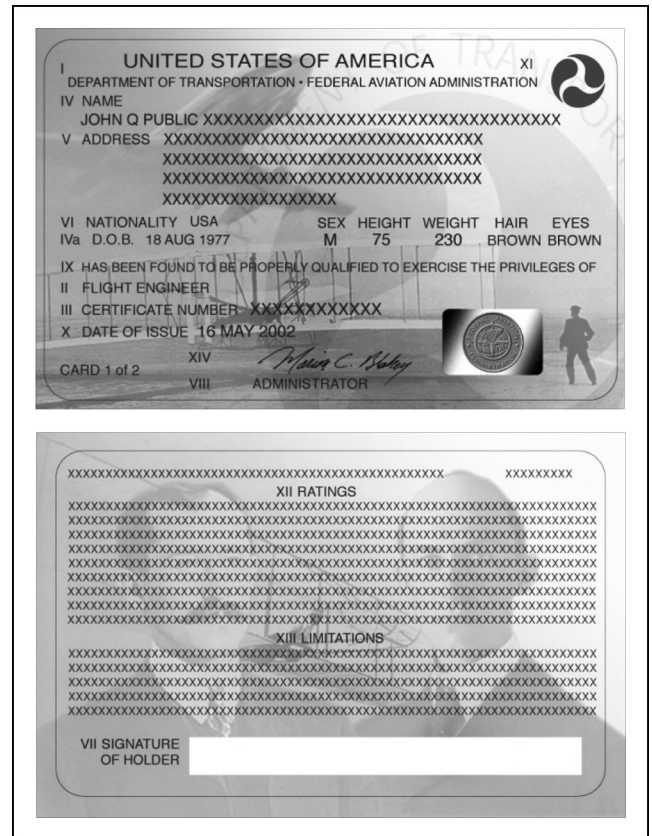


Figure 4-1. Airman certificate

ALL, SPO

3001. With respect to the certification of airmen, which are categories of aircraft?

- A— Gyroplane, helicopter, airship, free balloon.
- B— Airplane, rotorcraft, glider, lighter-than-air.
- C— Single-engine land and sea, multiengine land and sea.

With respect to the certification of airmen, “category” means a broad classification of aircraft such as airplane, rotorcraft, glider, lighter-than-air, weight-shift control, and powered parachute. (PLT371) — 14 CFR §1.1

Answer (A) is incorrect because it refers to classes of rotorcraft and lighter-than-air craft. Answer (C) is incorrect because it refers to classes of airplanes.

ALL

3002. With respect to the certification of airmen, which are classes of aircraft?

- A— Airplane, rotorcraft, glider, lighter-than-air.
- B— Single-engine land and sea, multiengine land and sea.
- C— Lighter-than-air, airship, hot air balloon, gas balloon.

With respect to the certification of airmen, a “class” refers to aircraft with similar operating characteristics such as single-engine land/sea and multi-engine land/sea, gyroplane, helicopter, airship, and free balloon. (PLT371) — 14 CFR §1.1

Answer (A) is incorrect because it refers to categories of aircraft. Answer (C) is incorrect because it refers to lighter-than-air category. Airship and free balloon are lighter-than-air class ratings, but hot air balloon and gas balloon are not.

Answers

3001 [B]

3002 [B]

Virtual flight school

Flight Maneuvers Virtual Test Prep DVD Flight School

Over 3 hours of high-definition in-flight video, 3D and animated graphics, special effects, and experienced flight instructors work together to help pilots prepare for their flight training, checkride, or flight review. Covers all of the maneuvers required for Private, Sport, Commercial, and Instructor (CFI) pilot certification. Both DVD and Blu-ray disks are included.



Also Available as Video Segment Downloads

Lessons taken directly from the Virtual Test Prep Flight Maneuvers DVD and Blu-ray disc set. Segments include: Introduction, Airport Operations & Takeoffs, Landings, Maneuvers, Stalls & Emergencies, and Test Preparation.



AVIATION SUPPLIES & ACADEMICS, INC.
Quality & Service You Can Depend On

Training Starts Here

See our complete line of study aids, textbooks, pilot supplies and more at your local airport and in bookstores nationwide. asa2fly.com | 425-235-1500

On demand. On the go.



Get there faster with ASA Prepware and Checkride Apps

Prepware apps for Apple, Android, and Windows devices are the perfect supplement when preparing for an FAA knowledge exam. Study or take practice tests anywhere, anytime.

Checkride apps list the questions most likely to be asked by examiners during the oral exam, and provide succinct, ready responses to help students prepare. Available for Apple and Android operating systems.



AVIATION SUPPLIES & ACADEMICS, INC.
Quality & Service You Can Depend On

Training Starts Here

See our complete line of study aids, textbooks, pilot supplies and more at your local airport and in bookstores nationwide. asa2fly.com | 425-235-1500



The image shows the ASA CX-3 Flight Computer, a handheld electronic device with a screen and a keypad. The screen displays various flight-related data and unit conversion options. The keypad includes buttons for flight planning, calculations, and unit conversions.

Unit Conversions

Altitude

Cloud Base

Standard Atmosphere

Airspeed

Fuel

Ground Speed

Slide

Time & Placement

CG = $193,193 / 2,055$

MC = TC +/- VAR

Weight x Arm / 100 = Moment / Index

True Course

Distance

Time = Distance / GroundSpeed

TAS = 146 kts

Fuel Flow = $(11.5 + 10.9) / 2 = 11.2$ gallons / hr

47.5390° N, 122.1557° W

Time

Answers when you need them.

CX-3

Flight Computer

Ground School ■ Preflight ■ Enroute



AVIATION SUPPLIES & ACADEMICS, INC.
Quality & Service You Can Depend On

Training Starts Here

See our complete line of study aids, textbooks, pilot supplies and more at your local airport and in bookstores nationwide. asa2fly.com/cx-3 | 425-235-1500

You've passed your written, now get ready for the checkride.



Private Oral Exam Guide

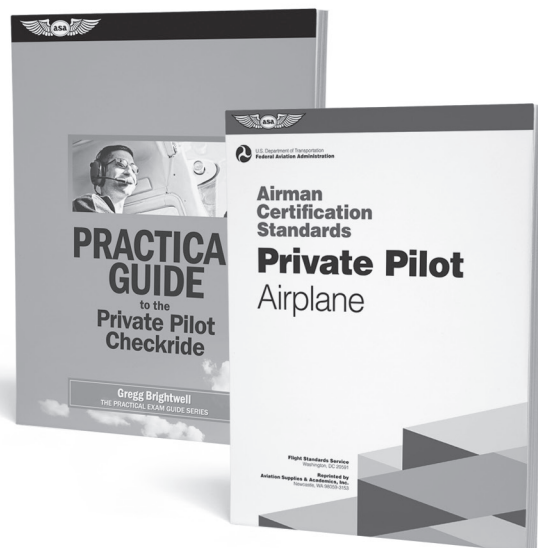
This book lists the questions most likely to be asked by examiners and provides succinct, ready responses. It teaches applicants how to exhibit subject mastery and confidence when under the examiner's scrutiny. Pilots will find this Guide an indispensable tool in both planning for what to expect during the airplane checkride, and mastering the subject matter. Excellent preparation for students, as well as a prep for Flight Reviews, aircraft transitions, and as general refresher material. Also available as an App and eBook!

Practical Guide to the Private Pilot Checkride

This book explains in "plain language" exactly what private pilot applicants must know and demonstrate during the oral portion of the FAA Practical Exam, eliminating any surprise about examiner expectations. This book will help you prioritize information, consolidating the FAA guidance materials into language you can understand, remember, and quickly reference. Also available as an eBook!

Private Pilot Airplane Airman Certification Standards

The Airman Certification Standards is the guide for students, instructors, and FAA-designated examiners to know what applicants must know, do, and consider for their FAA Knowledge Exam and practical (checkride) to earn their pilot certificate or rating.



AVIATION SUPPLIES & ACADEMICS, INC.
Quality & Service You Can Depend On

Training Starts Here

See our complete line of study aids, textbooks, pilot supplies and more at your local airport and in bookstores nationwide. asa2fly.com | 425-235-1500