

The following sample exam for Instrument Rating Airplane (IRA) is suitable study material for all the Instrument Rating tests including helicopters. Although these questions are airplane based they represent the same type of questions that can be found on all Instrument Rating tests. The applicant must realize that these questions are to be used as a study guide, and are not necessarily actual test questions. The full IRA test contains 60 questions. The Application Identification, Information Verification and Authorization Requirements Matrix lists all FAA exams. It is available at: [http://www.faa.gov/training\\_testing/testing/airmen/media/testing\\_matrix.pdf](http://www.faa.gov/training_testing/testing/airmen/media/testing_matrix.pdf)

The FAA testing system is supported by a series of supplement publications. These publications include the graphics, legends, and maps that are needed to successfully respond to certain test questions. FAA-CT-8080-3, Computer Testing Supplement for Instrument Rating is available at: [http://www.faa.gov/training\\_testing/testing/airmen/test\\_questions/media/FAA-CT-8080-3E.pdf](http://www.faa.gov/training_testing/testing/airmen/test_questions/media/FAA-CT-8080-3E.pdf)

The Learning Statement Reference Guide for Airman Knowledge Testing contains listings of learning statements with their associated codes. Matching the learning statement codes with the codes listed on your Airman Knowledge Test Report assists in the evaluation of knowledge areas missed on your exam. It is available at: [http://www.faa.gov/training\\_testing/testing/airmen/media/LearningStatementReferenceGuide.pdf](http://www.faa.gov/training_testing/testing/airmen/media/LearningStatementReferenceGuide.pdf)

### **SAMPLE IRA EXAM:**

1. PLT292

A Precision Runway Monitoring (PRM) approach may require

- A) monitoring of two communication frequencies simultaneously.
- B) special training and monitoring of two ILS receivers simultaneously.
- C) tracking performance parameters within the "decision region" of: 1/3 dot localizer and 1/2 dot glideslope displacement.

2. PLT172

Under which condition does ATC issue a STAR?

- A) To all pilots wherever STARs are available.
- B) Only if the pilot requests a STAR in the `Remarks` section of the flight plan.
- C) When ATC deems it appropriate, unless the pilot requests `No STAR.`

3. PLT128

A generally recommended practice for autopilot usage during cruise flight in icing conditions is

- A) having the autopilot continuously engaged while monitoring the system for abnormal trim, trim rate, or attitude.
- B) periodically disengaging the autopilot and hand flying the airplane.
- C) periodically disengaging and immediately reengaging the altitude hold function.

4. PLT088

If both the ram air input and drain hole of the pitot system are blocked, what airspeed indication can be expected?

- A) Increase of indicated airspeed during a climb.
- B) Decrease of indicated airspeed during a climb.
- C) Constant indicated airspeed during any change in altitude.

5. PLT140

What is the rule for a pilot receiving a "Land and Hold Short Operation (LAHSO) clearance?"

- A) The pilot is required to accept the controller`s clearance in visual meteorological conditions.
- B) The pilot must accept the clearance if the pavement is dry and the stopping distance is adequate.
- C) The pilot has the option to accept or reject all LAHSO clearances regardless of the meteorological conditions.

6. PLT147

The middle and far bars of a 3 bar VASI will

- A) both appear white to the pilot when on the upper glidepath.
- B) constitute a 2 bar VASI for using the lower glidepath.
- C) constitute a 2 bar VASI for using the upper glidepath.

7. PLT145

Which type of runway lighting consists of a pair of synchronized flashing lights, one on each side of the runway threshold?

- A) RAIL.
- B) HIRL.
- C) REIL.

8. PLT147

(Refer to figure 136.) Which illustration depicts an 'on glidepath' indication?

- A) 8.
- B) 10.
- C) 11.

9. PLT141

(Refer to figure provided.) While clearing an active runway, you are clear of the ILS critical area when you pass which sign?

- A) Top red.
- B) Middle yellow.
- C) Bottom yellow.

10. PLT161

The aircraft's transponder fails during flight within Class D airspace.

- A) The pilot should immediately request clearance to depart the Class D airspace.
- B) No deviation is required because a transponder is not required in Class D airspace.
- C) Pilot must immediately request priority handling to proceed to destination.

11. PLT161

The vertical extent of the Class A airspace throughout the conterminous U.S. extends from

- A) 18,000 feet to and including FL 450.
- B) 18,000 feet to and including FL 600.
- C) 12,500 feet to and including FL 600.

12. PLT008

The rate of descent on the glide slope is dependent upon

- A) true airspeed.
- B) ground speed.
- C) indicated airspeed.

13. PLT008

(Refer to figure 29 and Legend 21.) Using a ground speed of 90 knots on the ILS final approach course, what rate of descent should be used as a reference to maintain the ILS glide slope?

- A) 415 feet per minute.
- B) 478 feet per minute.
- C) 555 feet per minute.

14. PLT170

(Refer to figure 153.) For a stabilized approach, the aircraft must be in an approved configuration for landing

- A) with the engines spooled up, before descending below 1,768 feet MSL.
- B) with the correct speed and on glide path before descending below 1,268 feet MSL.
- C) with a descent rate of less than 1,000 FPM below 1,080 feet MSL and bank angles of less than 15° below 500 feet AGL.

15. PLT333

Which use of cockpit lighting is correct for night flight?

- A) Reducing the interior lighting intensity to a minimum level.
- B) The use of regular white light, such as a flashlight, will not impair night adaptation.
- C) Coloration shown on maps is least affected by the use of direct red lighting.

16. PLT330

Tunnel vision and cyanosis are symptoms of

- A) hypoxia.
- B) hyperventilation.
- C) carbon monoxide poisoning.

17. PLT225

How is your flight plan closed when your destination airport has IFR conditions and there is no control tower or flight service station (FSS) on the field?

- A) The ARTCC controller will close your flight plan when you report the runway in sight.
- B) You may close your flight plan any time after starting the approach by contacting any FSS or ATC facility.
- C) Upon landing, you must close your flight plan by radio or by telephone to any FSS or ATC facility.

18. PLT222

During a takeoff into IFR conditions with low ceilings, when should the pilot contact departure control?

- A) Before penetrating the clouds.
- B) When advised by the tower.
- C) Upon completing the first turn after takeoff.

19. PLT170

For which speed variation should you notify ATC?

- A) When the ground speed changes more than 5 knots.
- B) When the average true airspeed changes 5 percent or 10 knots, whichever is greater.
- C) Any time the ground speed changes 10 MPH.

20. PLT224

When may a pilot cancel the IFR flight plan prior to completing the flight?

- A) Any time.
- B) Only if an emergency occurs.
- C) Only in VFR conditions when not in Class A airspace.

21. PLT141

If you are performing a VFR practice instrument approach and Radar Approach Control assigns an altitude or heading that will cause you to enter the clouds, what action should you take?

- A) Enter the clouds, since ATC authorization for practice approaches is considered an IFR clearance.
- B) Avoid the clouds and inform ATC that altitude/heading will not permit VFR.
- C) Abandon the approach and advise ATC of your intentions.

22. PLT382

If the RVR equipment is inoperative for an IAP that requires a visibility of 2,400 RVR, how should the pilot expect the visibility requirement to be reported in lieu of the published RVR?

- A) As a slant range visibility of 2,400 feet.
- B) As an RVR of 2,400 feet.
- C) As a ground visibility of 1/2 SM.

23. PLT321

Which substitution is permitted when an ILS component is inoperative?

- A) A compass locator or precision radar may be substituted for the ILS outer or middle marker.
- B) ADF or VOR bearings which cross either the outer or middle marker sites may be substituted for these markers.
- C) DME, when located at the localizer antenna site, should be substituted for the outer or middle marker.

24. PLT292

What does the absence of the procedure turn barb on the plan view on an approach chart indicate?

- A) A procedure turn is not authorized.
- B) Teardrop-type procedure turn is authorized.
- C) Racetrack-type procedure turn is authorized.

25. PLT083

(Refer to figure 120.) Refer to the DEN ILS RWY 35R procedure. The FAF intercept altitude is

- A) 7,488 feet MSL.
- B) 7,500 feet MSL.
- C) 9,000 feet MSL.

26. PLT083

(Refer to figure 129 and Legend 21.) You have been cleared for the RNAV RWY 36 approach to LIT. At a ground speed of 105 knots, what are the vertical descent angle and rate of descent on final approach?

- A) 2.82 degrees and 524 feet per minute.
- B) 3.00 degrees and 500 feet per minute.
- C) 2.80 degrees and 550 feet per nautical mile.

27. PLT354

Your onboard GPS-based FMS/RNAV unit is IFR certified under TSO-C129. Your destination is below minimums and you proceed to your filed alternate. You know that

- A) GPS units certified under TSO-C129 are not authorized for alternate approach requirements; subsequently, you must use an approach procedure based on ground based NAVAIDS.
- B) once diverted to the alternate airport, you may fly a GPS-based approach as long as there is an operational ground-based NAVAID and appropriate airborne receiver for use as a backup.
- C) if your aircraft is equipped with a second TSO-C129 certified GPS as a backup in place of a ground-based NAVAID receiver, you may complete the approach even if the IAP is based on ground-based NAVAIDS.

28. PLT224

(Refer to figure 1.) What information should be entered in block 7 of an IFR flight plan if the flight has three legs, each at a different altitude?

- A) Altitude for first leg.
- B) Average cruise altitude.
- C) Highest altitude.

29. PLT455

An airport may not be qualified for alternate use if

- A) the only standard approach procedure is GPS.
- B) the airport has only AWOS-3 weather reporting.
- C) the airport is next to a restricted or prohibited area.

30. PLT370

You are being vectored to the ILS approach course, but have not been cleared for the approach. It becomes evident that you will pass through the localizer course. What action should be taken?

- A) Turn outbound and make a procedure turn.
- B) Continue on the assigned heading and query ATC.
- C) Start a turn to the inbound heading and inquire if you are cleared for the approach.

31. PLT202

Where does the DME indicator have the greatest error between ground distance to the VORTAC and displayed distance?

- A) High altitudes far from the VORTAC.
- B) High altitudes close to the VORTAC.
- C) Low altitudes far from the VORTAC.

32. PLT277

Which indications will a pilot receive when passing over an inner marker (IM) on a front course ILS approach?

- A) One dot per second and a steady amber light.
- B) Four dots per second and a flashing white light.
- C) Alternating dashes and a blue light.

33. PLT322

For IFR operations off of established airways below 18,000 feet, VOR navigational aids used to describe the `route of flight` should be no more than

- A) 40 NM apart.
- B) 70 NM apart.
- C) 80 NM apart.

34. PLT354

If Receiver Autonomous Integrity Monitoring (RAIM) is not available when setting up a GPS approach, the pilot should

- A) continue the approach, expecting to recapture the satellites before reaching the FAF.
- B) use a navigation system other than GPS for the approach.
- C) continue to the MAP and hold until the satellites are recaptured.

35. PLT202

(Refer to figure 128.) How should a pilot determine when the DME at Price/Carbon County Airport is inoperative?

- A) The airborne DME will always indicate `0` mileage.
- B) The airborne DME will `search,` but will not `lock on.`
- C) The airborne DME may appear normal, but there will be no code tone.

36. PLT354

During IFR en route operations using an approved GPS system for navigation,

- A) the aircraft must have an approved and operational alternate navigation system appropriate for the route.
- B) active monitoring of an alternate navigation system is always required.
- C) no other navigation system is required.

37. PLT354

A hand-held GPS system

- A) may be used for IFR operations in VFR weather conditions.
- B) is not authorized for IFR navigation.
- C) may be used in IFR weather conditions only for en route navigation.

38. PLT058

(Refer to figure 87.) Which VHF frequencies, other than 121.5, can be used to receive De Ridder FSS in the Lake Charles area?

- A) 122.1, 126.4.
- B) 123.6, 122.65.
- C) 122.2, 122.3.

39. PLT058

(Refer to figure 87.) What is indicated by the localizer course symbol at Jefferson County Airport?

- A) A published LDA localizer course.
- B) A published SDF localizer course.
- C) A published ILS localizer course, which has an additional navigation function.

40. PLT058

(Refer to figure 91.) What is the minimum crossing altitude at DBS VORTAC for a northbound IFR flight on V257?

- A) 7,500 feet.
- B) 8,600 feet.
- C) 11,100 feet.

41. PLT058

(Refer to figures 70 and 71.) Which VORTAC along the proposed route of flight could provide HIWAS information?

- A) SPARTA VORTAC.
- B) HUGUENOT VORTAC.
- C) KINGSTON VORTAC.

42. PLT058

(Refer to figure 24.) Proceeding southbound on V187, (vicinity of Cortez VOR) contact is lost with Denver Center. You should attempt to reestablish contact with Denver Center on:

- A) 133.425 MHz.
- B) 122.1 MHz and receive on 108.4 MHz.
- C) 122.35 MHz.

43. PLT100

Which aeronautical chart depicts Military Training Routes (MTR) above 1,500 feet?

- A) IFR Planning Chart.
- B) IFR Low Altitude En Route Chart.
- C) IFR High Altitude En Route Chart.

44. PLT058

(Refer to figure 53.) What service is indicated by the inverse 'H' symbol in the radio aids to navigation box for SAN MARCUS VORTAC?

- A) VOR with TACAN compatible DME.
- B) Availability of HIWAS.
- C) The VOR has an "H" (high altitude) SSV Class Designator.

45. PLT442

To meet the minimum required instrument flight experience to act as pilot in command of an aircraft under IFR, you must have logged within the 6 calendar months preceding the month of the flight, in the same category of aircraft:

- A) holding procedures, intercepting and tracking courses through the use of navigation systems, and six instrument approaches.
- B) 6 hours of instrument time in any aircraft, and six instrument approaches.
- C) six instrument approaches, three of which must be in the same category and class of aircraft to be flown, and 6 hours of instrument time in any aircraft.

46. PLT448

A certificated commercial pilot who carries passengers for hire at night or in excess of 50 NM is required to have at least

- A) an associated type rating if the airplane is of the multiengine class.
- B) a First-Class Medical Certificate.
- C) an instrument rating in the same category of aircraft.

47. PLT442

Enroute weather conditions are IMC. However, during the descent to your destination for an ILS approach, you encounter VMC weather conditions prior to reaching the initial approach fix. You know that to log the ILS approach toward instrument currency requirements,

- A) the flight must remain on an IFR flight plan throughout the approach and landing.
- B) the ILS approach can be credited only if you use a view-limiting device.
- C) the ILS approach can be credited regardless of actual weather if you are issued an IFR clearance.

48. PLT442

When is an IFR clearance required during VFR weather conditions?

- A) When operating in the Class E airspace.
- B) When operating in a Class A airspace.
- C) When operating in airspace above 14,500 feet.

49. PLT370

When is an IFR clearance required during VFR weather conditions?

- A) When operating in the Class E airspace.
- B) When operating in a Class A airspace.
- C) When operating in airspace above 14,500 feet.

50. PLT379

For aircraft other than helicopters, what minimum conditions must exist at the destination airport to avoid listing an alternate airport on an IFR flight plan when a standard IAP is available?

- A) From 2 hours before to 2 hours after ETA, forecast ceiling 2,000, and visibility 2 and 1/2 miles.
- B) From 2 hours before to 2 hours after ETA, forecast ceiling 3,000, and visibility 3 miles.
- C) From 1 hour before to 1 hour after ETA, forecast ceiling 2,000, and visibility 3 miles.

51. PLT288

When the visibility is greater than 6 SM on a TAF it is expressed as

- A) 6PSM.
- B) P6SM.
- C) 6SMP.

52. PLT288

Which primary source should be used to obtain forecast weather information at your destination for the planned ETA?

- A) Area Forecast.
- B) Radar Summary and Weather Depiction Charts.
- C) Terminal Aerodrome Forecast (TAF).

53. PLT284

Decode the excerpt from the Winds and Temperature Aloft Forecast (FD) for OKC at 39,000 feet.

FT 3000 6000 39000

OKC 830558

- A) Wind 130° at 50 knots, temperature -58 °C.
- B) Wind 330° at 105 knots, temperature -58 °C.
- C) Wind 330° at 205 knots, temperature -58 °C.

54. PLT288

What is the wind shear forecast in the following TAF?

TAF

KCVG 231051Z 231212 12012KT 4SM -RA BR OVC008

WS005/27050KT TEMPO 1719 1/2SM -RA FG

FM1930 09012KT 1SM -DZ BR VV003 BECMG 2021 5SM HZ=

- A) 5 feet AGL from 270° at 50 KT.
- B) 50 feet AGL from 270° at 50 KT.
- C) 500 feet AGL from 270° at 50 KT.

55. PLT059

What is meant by the entry in the remarks section of METAR surface report for KBNA?

METAR KBNA 211250Z 33018KT 290V260 1/2SM R31/2700FT +SN

BLSNFG VV008 00/M03 A2991 RMK RAE42SNB42

- A) The wind is variable from 290° to 360.
- B) Heavy blowing snow and fog on runway 31.
- C) Rain ended 42 past the hour, snow began 42 past the hour.

56. PLT290

Sigmets are unscheduled weather products that are valid for

- A) a period not to exceed 4 hours, but may be reissued for additional 4 hour periods.
- B) 2 to 12 hours, depending on the severity of the weather.
- C) 6 hours, unless associated with hurricanes or tropical cyclones.

57. PLT294

If you encounter in-flight icing and ATC asks you to report your conditions, what are the official reportable icing values that you are expected to use?

- A) Light, moderate, severe, extreme.
- B) Trace, light, moderate, severe.
- C) Few, light, moderate, severe.

58. PLT068

(Refer to figure 7.) What weather conditions are depicted within the area indicated by arrow F?

- A) 2/8 to 6/8 coverage, occasional embedded thunderstorms, tops at FL 540.
- B) 1/8 to 4/8 coverage, occasional embedded thunderstorms, maximum tops at 51,000 feet MSL.
- C) Occasional embedded cumulonimbus, bases below 25,000 feet with tops to 48,000 feet.

59. PLT068

(Refer to figure 18, SFC-400MB.) The U.S. Low Level Significant Weather Surface Prog Chart at 00Z indicates that northwestern Colorado and eastern Utah can expect

- A) moderate or greater turbulence from the surface to FL 240.
- B) moderate or greater turbulence above FL 240.
- C) no turbulence is indicated.

60. PLT066

(Refer to figure 9.) The Severe Weather Outlook Chart, which is used primarily for advance planning, provides what information?

- A) An 18-hour categorical outlook with a 48-hour valid time for severe weather watch, thunderstorm lines, and of expected tornado activity.
- B) A preliminary 12-hour outlook for severe thunderstorm activity and probable convective turbulence.
- C) A 24-hour severe weather outlook for possible thunderstorm activity.