- (4) For a rotorcraft—gyroplane course: (i) Fundamentals of instructing;
  - (ii) Technical subject areas;
  - (iii) Preflight preparation;
- (iv) Preflight lesson on a maneuver to be performed in flight;
- (v) Preflight procedures;
- (vi) Airport operations;
- (vii) Takeoffs, landings, and go-arounds:
- (viii) Fundamentals of flight;
- (ix) Performance maneuvers;
- (x) Flight at slow airspeeds;
- (xi) Ground reference maneuvers;
- (xii) Emergency operations; and
- (xiii) Postflight procedures.
- (5) For a powered-lift course: (i) Fundamentals of instructing;
- (ii) Technical subject areas:
- (iii) Preflight preparation;
- (iv) Preflight lesson on a maneuver to be performed in flight;
  - (v) Preflight procedures;
- (vi) Airport and heliport operations;
- (vii) Hovering maneuvers;
- (viii) Takeoffs, landings, and go-arounds;
- (ix) Fundamentals of flight;
- (x) Performance maneuvers;
- (xi) Ground reference maneuvers;
- (xii) Slow flight and stalls;
- (xiii) Basic instrument maneuvers;
- (xiv) Emergency operations;
- (xv) Special operations; and
- (xvi) Postflight procedures.
- (6) For a glider course: (i) Fundamentals of instructing;
- (ii) Technical subject areas;
- (iii) Preflight preparation;
- (iv) Preflight lesson on a maneuver to be performed in flight;
  - (v) Preflight procedures;
- (vi) Airport and gliderport operations;
- (vii) Tows or launches, landings, and goarounds, if applicable;
- (viii) Fundamentals of flight;
- (ix) Performance speeds;
- (x) Soaring techniques;
- (xi) Performance maneuvers;
- (xii) Slow flight, stalls, and spins;
- (xiii) Emergency operations; and
- (xiv) Postflight procedures.
- 5. Stage checks and end-of-course tests. (a) Each student enrolled in a flight instructor course must satisfactorily accomplish the stage checks and end-of-course tests, in accordance with the school's approved training course, consisting of the appropriate approved areas of operation listed in paragraph (c) of section No. 4 of this appendix appropriate to the flight instructor rating for which the course applies.
- (b) In the case of a student who is enrolled in a flight instructor-airplane rating or flight instructor-glider rating course, that student must have:
- (1) Received a logbook endorsement from a certificated flight instructor certifying the student received ground and flight training

- on stall awareness, spin entry, spins, and spin recovery procedures in an aircraft that is certificated for spins and is appropriate to the rating sought; and
- (2) Demonstrated instructional proficiency in stall awareness, spin entry, spins, and spin recovery procedures.
- [Doc. No. 25910, 62 FR 16347, Apr. 4, 1997; Amdt. 141-9, 62 FR 40909, July 30, 1997, as amended by Docket FAA-2015-1846, Amdt. 141-18, 81 FR 21461, Apr. 12, 2016]
- APPENDIX G TO PART 141—FLIGHT IN-STRUCTOR INSTRUMENT (FOR AN AIR-PLANE, HELICOPTER, OR POWERED-LIFT INSTRUMENT INSTRUCTOR RAT-ING, AS APPROPRIATE) CERTIFI-CATION COURSE
- 1. Applicability. This appendix prescribes the minimum curriculum for a flight instructor instrument certification course required under this part, for the following ratings:
- (a) Flight Instructor Instrument—Airplane.
- (b) Flight Instructor Instrument—Helicopter.
- (c) Flight Instructor Instrument—Powered-lift aircraft.
- 2. Eligibility for enrollment. A person must hold the following prior to enrolling in the flight portion of the flight instructor instrument course:
- (a) A commercial pilot certificate or airline transport pilot certificate with an aircraft category and class rating appropriate to the flight instructor category and class rating for which the course applies; and
- (b) An instrument rating or privilege on that flight instructor applicant's pilot certificate that is appropriate to the flight instructor instrument rating (for an airplane, helicopter-, or powered-lift-instrument rating, as appropriate) for which the course applies.
- 3. Aeronautical knowledge training. (a) Each approved course must include at least 15 hours of ground training on the aeronautical knowledge areas listed in paragraph (b) of this section, appropriate to the flight instructor instrument rating (for an airplane, helicopter-, or powered-lift-instrument rating, as appropriate) for which the course applies:
- (b) Ground training must include the following aeronautical knowledge areas:
- (1) The fundamentals of instructing including:
- (i) The learning process;
- (ii) Elements of effective teaching;
- (iii) Student evaluation and testing;
- (iv) Course development;
- (v) Lesson planning; and
- $(vi) \ Classroom \ training \ techniques.$