Subject No. 37 ATPL Air Law (Helicopter)

Each subject has been given a subject number and each topic within that subject a topic number. These reference numbers will be used on knowledge deficiency reports and will provide valuable feedback to the examination candidate. These topic reference numbers may be common across the subject levels and therefore may not be consecutive within a specific syllabus.

Sub Topic	Syllabus Item
	General
37.2	**Aviation Legislation**
37.2.2	Describe the requirements to hold an aviation document, as laid down in CA Act 1990 S7.
37.2.4	Describe the criteria for the fit and proper person test, as laid down in CA Act 1990 S10.
37.2.6	Describe the duties of the pilot-in-command, as laid down in CA Act 1990 S13 and 13A.
37.2.8	Describe the responsibilities of a licence holder with respect to changes in their medical condition, as laid down in CA Act 1990 S27.
37.2.10	Describe the responsibilities of a licence holder with respect to the surrender of a medical certificate as laid down in CA Act 1990 S27.
37.2.12	Describe the responsibilities of a licence holder with respect to safety offences, as laid down in CA Act 1990 S43 and 44.
37.4	**Definitions**
37.4.2	CAR Part 1 (unless otherwise noted) State the definition of: (a) accident (b) Act (c) aerodrome control service (d) aerodrome operational area (e) aeronautical information circular (f) aircraft category (g) air transport operation (h) air operation (i) airworthiness certificate (j) airworthiness directive

Sub Topic	Syllabus Item
	(k) airworthy condition
	(l) alerting service
	(m) alternate aerodrome
	(n) altitude
	(o) approach control
	(p) area control
	(q) area navigation
	(r) ATC clearance
	(s) ATC instruction
	(t) barometric vertical navigation (baro-VNAV) AIP GEN
	(u) augmented crew
	(v) Category I precision approach procedure
	(w) Category II precision approach procedure
	(x) ceiling
	(y) certified organisation
	(z) Class 3.1A Flammable liquid
	(aa) Class 3.1C Flammable liquid
	(bb) Class 3.1D Flammable liquid
	(cc) clearance limit
	(dd) command practise
	(ee) commercial transport operation
	(ff) controlled airspace
	(gg) controlled flight
	(hh) co-pilot
	(ii) crew member
	(jj) dangerous goods
	(kk) day
	(ll) decision altitude (DA)

Sub Topic	Syllabus Item
	(mm) decision height (DH)
	(nn) design helicopter (AIP GEN)
	(oo) disabled passenger
	(pp) dual flight time
	(qq) escorted passenger
	(rr) final reserve fuel
	(ss) fit and proper person
	(tt) flight crew member
	(uu) flight examiner
	(vv) flight level
	(ww) flight manual
	(xx) flight plan
	(yy) flight time
	(zz) height
	(aaa) heliport (AIP GEN)
	(bbb) IFR flight
	(ccc) incident
	(ddd) instrument approach procedure
	(eee) instrument flight
	(fff) instrument flight time
	(ggg) instrument meteorological conditions
	(hhh) instrument time
	(iii) minimum descent altitude (MDA)
	(jjj) minimum descent height (MDH)
	(kkk) minimum safe altitude (AIP GEN)
	(lll) minimum sector altitude (MSA 25M) (AIP GEN)
	(mmm) night
	(nnn) NOTAM

Sub Topic	Syllabus Item
	(ooo) passenger
	(ppp) pilot-in-command
	(qqq) precision approach procedure
	(rrr) pressure altitude
	(sss) procedure altitude (AIP GEN)
	(ttt) rated coverage (AIP GEN)
	(uuu) rating
	(vvv) regular air transport passenger service
	(www) reporting point
	(xxx) RNP performance
	(yyy) runway visual range
	(zzz) SARTIME
	(aaaa) serious incident
	(bbbb) segment OCA (AIP GEN)
	(cccc) take-off distance available
	(dddd) take-off run available
	(eeee) take-off weight
	(ffff) Technical Instructions
	(gggg) threshold (CAR 121.3)
	(hhhh) type
	(iiii) unlawful interference
	(jjjj) VFR flight
	(kkkk) visibility
	(llll) visual meteorological conditions and
	(mmmm) ZFT simulator.
37.6	**Abbreviations**
37.6.2	CAR Part 1 (unless otherwise noted)
	State the meaning of the following abbreviations:

Sub Topic	Syllabus Item
	(a) ACAS
	(b) AD
	(c) ADF
	(d) AGL
	(e) AMSL
	(f) ATIS
	(g) CAR
	(h) CRM
	(i) DME
	(j) ELT
	(k) FATO (AIP GEN)
	(l) GPWS
	(m) ICAO
	(n) ILS
	(o) OGE
	(p) QFE
	(q) QNH
	(r) RNP
	(s) RTODAH (AIP GEN)
	(t) RVR
	(u) TODAH (AIP GEN)
	(v) TALO (AIP GEN)
	(w) TLOF (AIP GEN)
	(x) TAWS
	(y) TCAS
	(z) VOR
	(aa) VTOL (AIP GEN)
	(bb) ZFT.

Sub Topic	Syllabus Item
	Personnel Licensing
37.10	**Requirements for Licences and Ratings**
37.10.2	State the requirements for holding a pilot's licence. CAR 61
37.10.4	State the requirements for a pilot-in-command to hold a type rating on the type of aircraft being flown. CAR 61
37.10.6	State the requirements for entering flight details into a pilot's logbook. CAR 61
37.12	**Eligibility, Privileges and Limitations**
37.12.2	Describe the allowance for a person who does not hold a current pilot's licence to fly dual with an instructor. CAR 61
37.12.4	State the solo flight requirements on person who does not hold a current pilot's licence. CAR 61
37.12.6	State the limitations on a person who does not hold a current pilot's licence. CAR 61
37.12.8	State the eligibility requirements for the issue of a helicopter air transport pilot's licence. CAR 61
37.12.10	State the privileges of holding a helicopter air transport pilot's licence. CAR 61
37.14	**Competency, Currency and Recency**
37.14.2	State the recent experience requirements of a pilot-in-command on an air operation, who is the holder of an airline transport pilot licence. CAR 61
37.14.4	State the requirements for the completion of a biennial flight review. CAR 61
37.14.6	Explain the use of a lower licence or rating. CAR 61
37.14.8	State the period within which a pilot-in-command of a helicopter engaged on an air operation under CAR Part 135 must have passed a check of route and aerodrome proficiency.
37.14.10	State the period within which a pilot, acting as a flight crew member of a helicopter engaged on a CAR Part 135 air operation under VFR, must have passed a check of normal, abnormal and emergency procedures in the same aircraft type.
37.14.12	State the period within which a pilot, acting as a flight crew member of a helicopter engaged on a CAR Part 135 air operation under IFR, must have passed a check of normal, abnormal and emergency procedures in the same aircraft type.
37.14.14	State the period within which a pilot of a helicopter engaged on an air operation under CAR Part 135 must have completed a written or oral test of their knowledge in aeroplane systems, performance and operating procedures.
37.14.16	State the CAR Part 135 crew member grace provisions.

Sub Topic	Syllabus Item
37.14.18	State the currency requirements of a pilot who is the holder of an instrument rating. CAR 61
37.14.20	State the currency requirements for carrying out an instrument approach. CAR 61
37.14.22	State the requirements for acting as a safety pilot during simulated instrument flight. CAR 61
37.16	**Medical Requirements**
37.16.2	State the requirements for holding a medical certificate. CAR 61
37.16.4	State the requirements on a person applying for a medical certificate. CAR 67
37.16.6	State the requirements for maintaining medical fitness following the issue of a medical certificate. CA Act 1990 S27C
37.16.8	State the normal currency period of the Class 1 medical certificate for an ATPL holder who is under the age of 40. CAR 67
37.16.10	State the normal currency period of the Class 1 medical certificate for an ATPL holder who is 40 years of age or more on the date that the certificate is issued. CAR 67
	Airworthiness of Aircraft and Aircraft Equipment
37.20	**Documentation**
37.20.2	State the documents which must be carried in aircraft operated in New Zealand. CAR 91
37.22	**Aircraft Maintenance**
37.22.2	Describe the maintenance requirements of an aircraft operator. CAR 91
37.22.4	State the requirements for maintenance records. CAR 91
37.22.6	State the requirements for the retention of maintenance records. CAR 91
37.22.8	State the requirements for and contents of a technical log. CAR 91
37.22.10	State the requirements for entering defects into a technical log. CAR 91
37.22.12	State the requirements for clearing defects from a technical log. CAR 91
37.22.14	State the limitations and requirements on a person undertaking ‘pilot maintenance’. CAR 43
37.22.16	State the requirements for conducting an operational flight check on an aircraft. CAR 91
37.22.18	State the requirements for acting as a test pilot. CAR 19
37.22.20	State the inspection period for radios. CAR 91

Sub Topic	Syllabus Item
37.22.22	State the inspection period for altimeters. CAR 91
37.22.24	State the inspection period for transponders. CAR 91
37.22.26	State the inspection period for the ELT. CAR 91
37.24	**Instruments and Avionics**
37.24.2	State the minimum instrument requirements for a day VFR flight. CAR 91
37.24.4	State the minimum instrument requirements for a night VFR flight. CAR 91
37.24.6	State the radio equipment requirements for a VFR flight. CAR 91
37.24.8	State the communications and navigation equipment requirements for a VFR over water flight. CAR 91
37.24.10	State the minimum instrument requirements for an IFR flight. CAR 91
37.24.12	State the communications and navigation equipment requirements for an IFR flight. CAR 91
37.26	**Equipment**
37.26.2	State the requirements for night flight. CAR 91
37.26.4	State the equipment requirements for a night VFR flight. CAR 91
37.26.6	State the CAR Part 135 requirements for night flight.
37.26.8	State the equipment requirements for an IFR flight. CAR 91
37.26.10	State the equipment requirements for flight over water. CAR 91 & CAR 135
37.26.12	State the requirements for emergency equipment in helicopters with seating capacity for more than 10 passengers. CAR 91
37.26.14	State the CAR Part 135 requirements for emergency equipment.
37.26.16	State the requirements for an ELT. CAR 91
37.26.18	State the requirements for indicating the time in flight. CAR 91
37.26.20	State the CAR Part 135 requirements for a cockpit voice recorder.
37.26.22	State the CAR Part 135 requirements for a flight data recorder.
37.26.24	State the CAR Part 135 requirements for an additional altitude indicator.
37.26.26	Explain the requirement for altitude alerting/assigned altitude indicating. CAR 91
	General Operating and Flight Rules
37.30	**General Operating Requirements**

Sub Topic	Syllabus Item
37.30.2	Describe the requirements of passengers to comply with instructions and commands. CAR 91
37.30.4	Explain the requirements for maintaining daily flight records. CAR 91
37.30.6	State the aircraft requirements for giving flight instruction. CAR 91
37.30.8	State the requirements for operating an aircraft in simulated instrument flight. CAR 91
37.30.10	State the requirements of a pilot-in-command with respect to the safe operation of an aircraft. CAR 91
37.30.12	Describe the authority of the pilot-in-command. CAR 91
37.30.14	State the requirements for crew occupation of seats and wearing safety belts. CAR 91
37.30.16	State the requirements for the occupation of seats and wearing of restraints. CAR 91
37.30.18	State the requirements for the use of oxygen equipment. CAR 91
37.30.20	State the requirements for briefing passengers prior to flight. CAR 91
37.30.22	State the requirements for familiarity with operating limitations and emergency equipment. CAR 91
37.30.24	State the requirements for carrying appropriate aeronautical publications and charts in flight. CAR 91
37.30.26	State the requirements for operating on and in the vicinity of an aerodrome. CAR 91
37.30.28	Describe the standard overhead joining procedure, and state when it should be used. AIP AD
37.30.30	State and describe the application of the right of way rules. CAR 91
37.30.32	Explain the requirement for aircraft lighting. CAR 91
37.30.34	State the requirements for the pilot of a helicopter, being flown for the purpose of demonstrating eligibility for the issue of an airworthiness certificate. CAR 91
37.30.36	State the requirements for wearing/holding identity documentation in certain areas. CAR 19
37.32	**General Operating Restrictions**
37.32.2	State the restrictions on smoking in a helicopter. CA Act 1990 S65N
37.32.4	State the restrictions associated with the abuse of drugs and alcohol. CAR 91 and CAR 19
37.32.6	State the restrictions on the use of portable electronic devices in flight. CAR 91

Sub Topic	Syllabus Item
37.32.8	State the restrictions on the carriage and discharge of firearms on helicopters. CAR 91
37.32.10	Explain the restrictions on stowage of carry-on baggage. CAR 91
37.32.12	Explain the restrictions on the carriage of cargo. CAR 91
37.32.14	State the restrictions applicable to aircraft flying near other aircraft. CAR 91
37.32.16	State the restrictions on the dropping of objects from a helicopter in flight. CAR 91
37.32.18	State the minimum heights for VFR flights under CAR Part 91.
37.32.20	State the restrictions when operating VFR in icing conditions. CAR 91
37.32.22	State the restrictions when operating IFR in icing conditions. CAR 91
37.32.24	State the restrictions applicable to operating a helicopter in aerobatic flight. CAR 91
37.32.26	State the restrictions applicable to parachute-drop operations. CAR 91
37.32.28	State the restrictions on aircraft noise and engine emission standards. CAR 91
37.34	**General Meteorological Requirements and Restrictions**
37.34.2	State the met minima for VFR flight in various airspace. CAR 91
37.34.4	State the restrictions and met minima for Special VFR flight. CAR 91
37.36	**Carriage of Dangerous Goods**
37.36.2	Describe the limitation of CAR Part 92 with respect to members of the Police.
37.36.4	State the restriction for the carriage of dangerous goods in a helicopter's cabin occupied by passengers, or in the cockpit of a helicopter. CAR 92
37.36.6	Describe the allowance for the carriage of dangerous goods for the recreational use of passengers. CAR 92
37.36.8	State the requirements for the carriage of non-dangerous goods in an aircraft. CAR 92
37.36.10	State the requirement for the notification of the pilot-in-command when dangerous goods are carried. CAR 92
37.36.12	State the requirement for a dangerous goods training programme. CAR 92
37.36.14	State the dangerous goods recurrent training programme requirements. CAR 92
37.36.16	State the allowance for the carriage of dangerous goods as an under-slung load. CAR 133
37.38	**Helicopter External Load Operations**

Sub Topic	Syllabus Item
37.38.2	State the definition of: (a) helicopter external load operation (b) helicopter external load towing operation (c) helicopter sling load operation (d) OGE. CAR 133
37.38.4	State the pilot licence requirements for performing a helicopter external load operation. CAR 133
37.38.6	Describe the minimum height requirements when performing a helicopter external load operation. CAR 133
37.38.8	State the restrictions on the carriage of persons inside a helicopter on a helicopter external load towing operation. CAR 133
37.38.10	State the restrictions on the carriage of persons inside a helicopter on a helicopter sling load operation. CAR 133
37.38.12	State the restrictions on the carriage of persons inside a helicopter on a winching, rappelling, or human sling load operation. CAR 133
37.38.14	State the third party risk restrictions when carrying a load suspended beneath a helicopter. CAR 133
37.38.16	State the weight limitation for a helicopter performing a helicopter external load operation. CAR 133
37.38.18	State the flight rules restriction for a helicopter performing a helicopter external load operation. CAR 133
37.38.20	Describe the restrictions on helicopter external load operations at night. CAR 133
37.38.22	Describe the flight characteristics requirements for a helicopter performing a helicopter external load operation. CAR 133
37.38.24	Explain the requirements for performing a helicopter external load operation over congested areas. CAR 133
37.38.26	Describe the general requirements for performing an operation involving the suspension of a person beneath a helicopter. CAR 133
37.38.28	State the requirements for performing a helicopter winch operation. CAR 133
37.38.30	State the requirements for the carriage of an injured person beneath a helicopter in a harness or stretcher. CAR 133
37.38.32	State the requirements for performing a helicopter rappelling operation. CAR 133
37.38.34	Explain the requirements for the carriage of a supplementary crew member on a helicopter performing a helicopter external load operation. CAR 133

Sub Topic	Syllabus Item
37.38.36	Explain the requirements for ensuring crew member competency to carryout winching, rappelling, or human sling load operations. CAR 133
37.38.38	Describe the external load equipment requirements on a helicopter performing a helicopter external load operation. CAR 133
37.38.40	Describe the requirements for quick release devices on a helicopter performing a helicopter external load operation. CAR 133
37.38.42	Explain the requirements for the maintenance of external load equipment. CAR 133
	Air Operations
37.40	**Air Operations Crew Requirements**
37.40.2	State the CAR Part 135 crew qualification and experience requirements.
37.40.4	State the CAR Part 135 flight and duty time limitations on flight crew members.
37.40.6	State the AC119-2 normal minimum rest period required following any duty period.
37.40.8	State the maximum number of flight hours that a pilot may fly as crew in a helicopter which carries two pilots on an internal air operation. AC119
37.42	**Air Operations Requirements and Restrictions**
37.42.2	State the airworthiness requirements for a helicopter used on air operations. CAR 135
37.42.4	State the CAR Part 135 minimum heights for VFR flights.
37.42.6	State the CAR Part 135 operating restriction on single-engine air operations under IFR (SEIFR).
37.42.8	State the CAR Part 135 requirements for reduced take-off minima.
37.42.10	State the requirement to keep a daily flight record. CAR 135
37.42.12	State the CAR Part 135 requirement for a maintenance review.
37.42.14	State the CAR Part 135 requirement for passenger safety and the carriage of certain passengers.
37.42.16	State the CAR Part 135 restrictions when refuelling.
37.42.18	State the CAR Part 135 restrictions on the manipulation of a helicopter’s controls.
37.42.20	State the CAR Part 135 requirement for helicopter operations over congested areas.
37.42.22	State the restrictions on helicopter sling loads on an air operation. CAR 135
37.44	**Air Operations Meteorological Requirements and Restrictions**

Sub Topic	Syllabus Item
37.44.2	State the CAR Part 135 requirements for persons performing an air operation to use meteorological information.
37.44.4	State the CAR Part 135 meteorological conditions and requirements for an air operation under VFR.
37.44.6	State the CAR Part 135 meteorological conditions and requirements for an air operation under IFR.
37.44.8	State the CAR Part 135 aerodrome operating minima - IFR flight.
37.44.10	State the CAR Part 135 requirements for reduced take-off minima.
37.44.12	State the CAR Part 135 restrictions for IFR procedures.
37.46	**Air Operations Performance Requirements**
37.46.2	State the meaning of a Performance-Class 1 (Category A) helicopter. CAR Pt 1
37.48	**Air Operations Weight and Balance Requirements**
37.48.2	State the CAR Part 135 requirements for managing weight and balance of aircraft used on an air operation.
	Flight Planning and Preparation
37.50	**Flight Preparation**
37.50.2	Explain the requirements for the obtaining and considering relevant information prior to flight. CAR 91
37.50.4	Describe the publications and their content that provide operational route and aerodrome information.
37.50.6	Derive operational information from charts and publications that provide route, approach and aerodrome information.
37.52	**Alternate Requirements**
37.52.2	State the meteorological minima at destination which would require an alternate to be nominated. CAR 91
37.52.4	State the meteorological minima at departure which would require a CAR Part 135 IFR operation to nominate a departure alternate. CAR 135
37.52.6	Determine the meteorological minima required at an aerodrome for it to be nominated as an IFR alternate. CAR 91
37.52.8	State the power supply requirements for the selection of an aerodrome as an alternate on an IFR air operation. CAR 91
37.52.10	State the reference datum for take-off meteorological minima for IFR operations. CAR 91

Sub Topic	Syllabus Item
37.52.12	State the reference datum for landing meteorological minima for IFR operations. CAR 91
37.52.14	State the reference datum for alternate meteorological minima for IFR operations. AIP ENR
37.54	**Fuel Requirements**
37.54.2	State the fuel reserve required for a VFR flight in a helicopter. CAR 91
37.54.4	State the fuel reserve required for an IFR flight in a helicopter. CAR 91
37.56	**Flight Plans**
37.56.2	State the CAR Part 135 requirements for the filing of a flight plan.
37.56.4	State the requirements for the notification of changes to a filed VFR flight plan. CAR 91
37.56.6	State the requirements for the terminating a VFR flight plan. CAR 91
37.56.8	State the requirements for the filing of a flight plan for flight under IFR. CAR 91
37.56.10	State the notification lead time for filing an IFR flight plan. CAR 91 & AIP ENR
37.56.12	State the requirements for adhering to an IFR flight plan. CAR 91
37.56.14	State the requirements for the notification of changes to the filed IFR flight plan. CAR 91
37.56.16	State the requirements for an inadvertent departure from an IFR flight plan. CAR 91
37.56.18	State the requirements for the cancellation of an IFR flight plan in various airspaces. AIP ENR
37.56.20	State the requirements for the terminating an IFR flight plan at an aerodrome without ATS. CAR 91
37.56.22	State the time search and rescue action would be initiated if a flight plan is not terminated. AIP ENR
	Air Traffic Services
37.60	**Communications**
37.60.2	Derive from operational publications, the required radio frequency for communicating with specified ATC units.
37.60.4	Explain the use of aircraft radiotelephony callsigns. CAR 91
37.60.6	State the requirements for making position reports to an ATS unit. CAR 91 & AIP ENR
37.60.8	State the content of a position report. AIP ENR

Sub Topic	Syllabus Item
37.60.10	State the purpose of Universal Communications Services (UNICOM). AIP GEN
37.60.12	State the purpose of an Aerodrome Frequency Response Unit (AFRU). AIP GEN
37.60.14	State the purpose of Aerodrome and Weather Information Broadcasts (AWIB). AIP GEN
37.60.16	State the meaning of the various light signals from a control tower. CAR 91 & AIP AD
37.60.18	State the communications requirements when TIBA procedures are in force. AIP ENR
37.62	**Clearances**
37.62.2	State the requirements for complying with ATC clearances and instructions. CAR 91 & AIP ENR
37.62.4	State the requirements for coordinating with an aerodrome flight information service. CAR 91
37.62.6	State the requirements for receiving an ATC clearance prior to entering various types of airspace, and ground manoeuvring area. CAR 91 & AIP ENR
37.62.8	State the requirements for receiving an ATC clearance prior to re-entering controlled airspace. CAR 91
37.63	**Separation**
37.63.2	Describe the method of passing traffic information using the clock code.
37.63.4	Describe the situations where Air Traffic Control is responsible for the provision of separation between VFR, SVFR and IFR traffic. AIP ENR
37.63.6	Describe the situations where the pilot-in-command of an IFR flight is responsible for maintaining separation from other traffic. AIP ENR
37.63.8	Describe the normal separation standards applied by ATC. AIP ENR
37.63.10	Describe the situations where the normal separation may be reduced. AIP ENR
37.63.12	State the meaning of the term “Essential traffic”. AIP ENR
37.63.14	State the conditions under which longitudinal separation between reciprocal track aircraft may be reduced. AIP ENR
37.63.16	State the wake turbulence separation requirements for light aircraft in non-radar environment. AIP AD
37.63.18	State the minimum descent height in IMC at an unattended aerodrome where traffic conflict may exist. AIP ENR
37.64	**Terrain Clearance**
37.64.2	Describe the determination of the minimum safe altitude for IFR flight. AIP GEN

Sub Topic	Syllabus Item
37.64.4	Explain the coverage and use of VORSEC charts. AIP GEN
37.64.6	Explain the coverage and use of 25nm Minimum Sector Altitude diagrams. AIP GEN
37.64.8	State when the radar control service is responsible for the provision of terrain clearance. AIP ENR
37.64.10	Explain how radar control provides terrain clearance. AIP ENR
37.64.12	Describe the use of DME descent steps for maintaining terrain clearance during departure climb or descent for an approach. AIP GEN and ENR
37.65	**Weather Avoidance**
37.65.2	State the requirements for deviation off track for weather avoidance. AIP ENR
37.66	**Radar Services**
37.66.2	Describe the radar services available to VFR and IFR flights. AIP ENR
37.66.4	Describe the responsibility of the radar controller to keep an aircraft within controlled airspace. AIP ENR
37.66.6	State the accuracy limits required when under radar speed control. AIP ENR
37.66.8	State the distance from touchdown that radar speed control can be maintained on an instrument and a visual approach. AIP ENR
37.66.10	State the meteorological and other conditions which allow a radar controller to vector an aircraft for a visual approach. AIP ENR
37.66.12	State the criteria for a radar controller to consider an unknown aircraft to be on a conflicting path with another aircraft. AIP ENR
37.68	**Global Navigation Satellite System.**
37.68.2	State the equipment required by aircraft on air operations within the New Zealand flight information region, using GPS as a primary means navigation system. CAR 19
37.68.4	State the meaning of a GPS “sole means navigation system”. CAR 19
37.68.6	State the restriction on using GPS as a sole means navigation system under IFR in the New Zealand flight information region. CAR 19
37.68.8	State the actions required of pilots, under IFR using GPS equipment as a primary means navigation system, if system degradation occurs. CAR 19
37.68.10	State the requirements which must be met before a pilot of an aircraft operating within the New Zealand flight information region, under IFR, using GPS equipment as a primary means navigation system, is permitted random flight routing. CAR 19
37.68.12	State the requirements for carrying out an instrument approach using GPS equipment as a primary means navigation system. CAR 19
37.68.14	State the requirements for the nomination of an alternate if GPS is used as a

Sub Topic	Syllabus Item
	primary means navigation system. CAR 19
	Airspace, Aerodromes and Heliports
37.70	**Altimetry**
37.70.2	State the altimeter setting requirements for flight under VFR and IFR in the New Zealand FIR. CAR 91 & AIP ENR
37.70.4	State the procedure to use to obtain an altimeter setting when QNH is not available prior to take-off and the requirement to obtain a QNH once in flight. AIP ENR
37.70.6	Describe QNH zones and state when zone QNH should be used. AIP ENR
37.70.8	Describe the transition altitude, layer and level. AIP ENR
37.72	**Cruising Levels**
37.72.2	State the altitude/flight level requirements when cruising VFR and IFR within the New Zealand FIR. CAR 91 & AIP ENR
37.72.4	Determine from charts and publications the minimum flight altitude (MFA) for a route sector.
37.72.6	Describe situations where ATC may assign cruising altitudes not in accordance with the table of cruising altitudes. AIP ENR
37.72.8	Determine the minimum flight altitude (MFA) for a route sector.
37.72.10	State the position by which an aircraft must be at a higher MFA if one is specified. AIP GEN
37.74	**Transponders**
37.74.2	State the requirements for the operation of transponders within the New Zealand FIR. CAR 91 & AIP ENR
37.74.4	Describe the procedures required of pilots operating transponders. AIP ENR
37.74.6	Describe the altitude accuracy limits of transponders. AIP ENR
37.74.8	State the requirements and limitations on an aircraft operating under VFR in transponder mandatory airspace without an operating transponder. CAR 91 & AIP ENR
37.75	**Airspace**
37.75.2	State the rules pertaining to operating VFR in the various classes of airspace. CAR 91 and AIP ENR
37.75.4	Describe the vertical limits and purpose of control zones (CTR). CAR 71
37.75.6	Describe the vertical limits and purpose of control areas (CTA). CAR 71

Sub Topic	Syllabus Item
37.75.8	State the status and conditions relating to flight in VFR transit lanes. AIP ENR
37.75.10	Describe the status and purpose of a general aviation area (GAA). CAR 91 & AIP ENR
37.75.12	Describe visual reporting points.
37.75.14	Describe the status of controlled airspace when ATC go off duty. AIP GEN
37.75.16	State the restrictions on operating an aircraft in a restricted area. CAR 91 & AIP ENR
37.75.18	State the restrictions on operating an aircraft in a military operating area (MOA). CAR 91 & AIP ENR
37.75.20	State the purpose of the various special use airspace. AIP ENR
37.75.22	State the restrictions and operating considerations relating to operating an aircraft in a mandatory broadcast zone (MBZ). CAR 91 & AIP ENR
37.75.24	State the restrictions and operating considerations relating to operating an aircraft in a volcanic hazard zone (VHZ). CAR 91 & AIP ENR
37.75.26	State the restrictions and operating considerations relating to operating an aircraft in a danger area. CAR 91 & AIP ENR
37.75.28	State the restrictions and operating considerations relating to operating an aircraft in a parachute landing area (PLA). AIP ENR
37.75.30	State the restrictions and operating considerations relating to operating an aircraft in a designated low flying zone (LFZ). CAR 91 & AIP ENR
37.75.32	State the operating considerations relating to operating an aircraft in a common frequency zone (CFZ). AIP ENR
37.75.34	State the operating considerations relating to operating an aircraft over or close to temporary hazards/airspace. AIP ENR
37.75.36	Interpret airspace information on aeronautical charts.
37.76	**Aerodromes and Heliports**
37.76.2	Describe the limitations on the use of a place as an aerodrome or heliport. CAR 91.
37.76.4	Describe the method of runway designation. AIP AD
37.76.6	Describe the movement area of an aerodrome. CAR 1
37.76.8	Describe the meaning of the various aerodrome ground signals.
37.76.10	Describe and interpret heliport markings and lighting.
37.76.12	Interpret runway, taxiway, apron and stand signs and markings.
37.76.14	Interpret information on aerodrome/heliport charts. AIP GEN

Sub Topic	Syllabus Item
37.78	**Aerodrome Lighting**
37.78.2	Describe the lighting intensity classifications.
37.78.4	Describe the following lighting systems:

(a) Runway edge lighting (REDL)

(b) Runway landing threshold lighting (RTHL)

(c) Runway end lighting (RENL)

(d) Runway centreline lighting system (RCLL)

(e) Runway touchdown zone lighting (RTZL)

(f) Runway end identifier lighting (REIL)

(g) Approach lighting systems (ALS)

(h) Circling guidance lighting (CGL)

(i) Runway lead in lighting (RLLS)

(j) Pilot activated lighting (PAL)

(k) T-Visual approach slope indicators (T-VASIS)

(l) Visual approach slope indicators (VASIS)

(m) Precision approach path indicators (PAPI).

37.78.6	Describe aerodrome beacons.
37.78.8	Describe the indication of above, on and below slope for:

(a) PAPIs

(b) VASIS

(c) T-VASIS.

Emergencies Incidents and Accidents

37.80	**Responsibilities of Operators and Pilots**
37.80.2	State the requirement for the notification of incidents. CAR 12
37.80.4	State the requirement for the notification of accidents. CAR 12
37.80.6	State the extent to which a pilot may deviate from the CA Act or rules in an emergency situation. CA Act 1990 S13A (2)
37.80.8	State the pilot action required following deviation from the CA Act or rules in an emergency situation. CA Act 1990 S13A (6)

Sub Topic	Syllabus Item
37.82	**Communications and Equipment**
37.82.2	State the radio transmission applicable to a distress and urgency situation. AIP ENR
37.82.4	State the radio message required to impose silence during and emergency situation.
37.82.6	State the transponder code a pilot should set to indicate an emergency condition. AIP ENR
37.82.8	State the transponder code a pilot should set to indicate a loss of communications. AIP ENR
37.82.10	State the transponder code a pilot should set to indicate that the aircraft is being subjected to unlawful interference. AIP ENR
37.82.12	Describe the means by which ATC will verify the transmission of an emergency SSR transponder code. AIP ENR
37.82.14	Describe the use of the speechless technique using unmodulated transmissions. AIP ENR
37.82.16	Describe and interpret ground-air visual signal codes. AIP GEN
37.82.18	Describe the procedures for directing a surface craft to a distress incident. AIP GEN
37.82.20	State the procedures for the emergency activation of an ELT. AIP GEN
37.82.22	State the pilot action required following the inadvertent transmission of an ELT. AIP GEN
37.82.24	State the requirements for the operational testing of an ELT. AIP GEN
37.82.26	State the procedures to be followed on receiving an ELT signal. AIP GEN
	Instrument Departures and Approaches
37.90	**Departure Procedures**
37.90.2	Interpret information on SID and Departure Procedure charts.
37.90.4	Determine the IFR take-off minima for a departure off a given runway. AIP ENR
37.90.6	State the IFR take-off minima if it is not prescribed in the IFG. AIP ENR
37.90.8	State the CAR Part 91 requirements and limitations of IFR reduced take-off minima. CAR 91 & AIP ENR
37.90.10	State the minimum height for a turn after take-off on departure. AIP ENR
37.90.12	State the minimum climb gradient on a SID unless otherwise specified. AIP ENR
37.90.14	Calculate the rate of climb required to meet the net climb gradient specified on instrument departures. AIP ENR

Sub Topic	Syllabus Item
37.90.16	State when a departure procedure terminates. AIP ENR
37.90.18	State the limitation on the termination of radar vectoring for a departing IFR aircraft. AIP ENR
37.90.20	State the requirements for broadcasting intentions when departing from an unattended aerodrome. AIP ENR
37.90.22	State the requirements for and limitations on a visual departure. AIP ENR
37.90.24	Describe the operating restrictions where an IFR departure procedure is not promulgated. AIP ENR
37.92	**Holding Procedures**
37.92.2	State the maximum entry and holding pattern speeds. AIP ENR
37.92.4	Identify and describe appropriate holding pattern entry procedures. AIP ENR
37.92.6	State when an onwards clearance time will be passed to the pilots of an aircraft instructed to hold en route. AIP ENR
37.92.8	State when an expected approach time will be passed to the pilots of an aircraft instructed to hold at an initial approach fix. AIP ENR
37.92.10	State the angle of bank required during turns in a holding pattern. AIP ENR
37.94	**Approach Procedures**
37.94.2	Describe the descent limitations from cruise to approach commencement. AIP GEN
37.94.4	Interpret information on STAR charts. AIP GEN
37.94.6	State the limitations on a clearance to fly a STAR. AIP ENR
37.94.8	Define the minimum initial approach altitude. AIP ENR
37.94.10	Interpret information on instrument approach charts.
37.94.12	Determine the IFR meteorological minima for an instrument approach to a given runway.
37.94.14	State the meteorological minima which must exist prior to an instrument approach being commenced. CAR 91 and AIP ENR
37.94.16	Describe the procedures for joining overhead a navigation aid for an instrument approach. AIP ENR
37.94.18	State the minimum meteorological conditions which must exist before ATC may clear an aircraft for an instrument approach with a descent restriction. AIP ENR
37.94.20	State the meteorological and other conditions which will allow a pilot to request a visual approach in controlled airspace. AIP ENR
37.94.22	State the meteorological and other conditions which allow ATC to advise that

Sub Topic	Syllabus Item
	conditions are suitable for a visual approach. AIP ENR
37.94.24	State the meteorological and other conditions which will allow a pilot to carry out a visual approach in uncontrolled airspace. AIP ENR
37.94.26	Describe the provision of traffic separation and terrain clearance during a visual approach. AIP ENR
37.94.28	State the aircraft category for approach speeds and minima for helicopters. AIP ENR
37.94.30	State the category A speed limitations during an instrument approach under ICAO PANS OPS II procedures. AIP ENR
37.94.32	State the requirements for making position reports during an instrument approach in controlled and uncontrolled airspace. AIP ENR
37.94.34	Describe the procedures for carrying out an instrument approach at an unattended aerodrome. AIP ENR
37.94.36	Determine the minimum descent altitude using a QNH from a remote location. AIP ENR
37.94.38	State when descent below decision altitude or minimum descent altitude may be made on an instrument approach. AIP ENR
37.94.40	Describe the missed approach procedures and limitations. AIP ENR
37.96	**Communications and Navigation Aid Failure**
37.96.2	Describe the procedures required following a communications failure en route. AIP ENR
37.96.4	Describe the procedures required following a communications failure during an instrument approach. AIP ENR
37.96.6	Describe the procedure to be carried out in the event of a radio navigation aid failure during an approach. AIP ENR
37.96.8	State the requirements for changing approach types in the event of a radio navigation aid failure during an approach. AIP ENR