

Radio Failure

CIRCUIT TRAINING

Objectives

To join at a controlled or uncontrolled aerodrome in the event of a radio failure.

1. Considerations

- If controlled, return or divert?
- Clearance required to enter Control Zone
- Follow any clearance already accepted
- If cleared to enter, but no joining instructions—join overhead
- How is it detected?

Causes

- Wrong frequency selected
- On/Off and volume switch turned down
- Altitude too low and/or range too great,
- Alternator failure
- Comm box switches
- Avionics or master switch accidentally off
- Radio loose in its cradle
- Avionics master off
- Faulty headset connections
- Popped circuit breaker
- Check simple solutions first

2. Airmanship

- Anticipate circuit direction
- Vol 4 and joining checklists
- Right-of-way rules
- Lookout
- Terminate flight plan after landing

3. Aeroplane Management

- Below 120 kts before joining
- Landing lights on

5. Air Exercise

- Be familiar with comms failure procedures in AIP
- Transmit blind
- Squawk 7600
- Turn on all lights
- Use a cellular phone to communicate if available
- Aviate – Navigate
- Remain clear of controlled airspace while diagnosing and planning

Uncontrolled Aerodromes








- Standard Overhead Join
- Transmit 'blind'
- Keen lookout for other traffic
- Refer to Vol 4 and VNC
- Complete checklist

Controlled Aerodromes

- Light Signals used by tower
- Vol 4, VNC
- Checklists
- Carry out Standard Overhead Join
- Report fault to tower after landing

4. Human Factors

- Use mental picture to help orientation

	Colour and Type of Signal	To Aircraft in Flight	To Aircraft on the Aerodrome
	Steady green	Cleared to land	Cleared for takeoff
	Steady red	Give way to other aircraft and continue circling	Stop
	Series of green flashes	Return for landing	Cleared to taxi
	Series of red flashes	Aerodrome unsafe – do not land	Taxi clear of landing area in use
	Series of white flashes	Land at this aerodrome and proceed to apron	Return to starting point on aerodrome
	Series of alternate red and green flashes	Danger – be on the alert	Danger – be on the alert
	Red pyrotechnic	Notwithstanding any previous instructions do not land for the time being	
		① Circling means continue tracking in the aerodrome traffic circuit. Do not orbit in position.	
		② Clearance to land and taxi will be given in due course.	