

# RAAF BASE RICHMOND

## BASE AIRCRAFT NOISE MANAGEMENT PLAN



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# RAAF RICHMOND BASE AIRCRAFT NOISE MANAGEMENT PLAN

## Introduction

1. Aircraft noise is an unavoidable consequence of Air Force operations and training. The impact of aircraft noise is subjective and affects communities in different ways. Air Force has an obligation to reduce the effects of aircraft noise on local communities to the maximum extent possible, without affecting operational or training outcomes. Consequently, aircraft noise is managed locally by personnel who know and understand community concerns.

## Background and scope

2. The RAAF Richmond Base Aircraft Noise Management Plan (BANMP) has been raised in compliance with the Air Force Aircraft Noise Management Strategy. The BANMP applies to all flying and airside ground operations operating from RAAF Richmond.

3. The BANMP informs and aims to improve public understanding of aircraft noise management strategies in the vicinity of RAAF Richmond (RIC) as per Annex A and the current [Aircraft Noise Exposure Forecast \(ANEF\)](#).

4. The ANEF map provides a forecast of anticipated noise around RAAF Richmond. The ANEF does not show every flight path and homeowners with properties outside of the ANEF map zones may still experience aircraft noise. The [Environmental Impact Statement for the F-35A aircraft](#), should also be referred to for additional information regarding noise exposure as there may be occasions, although seldom, in which F-35A aircraft operate at RAAF Richmond.

## RAAF Richmond

5. RAAF Richmond is located approximately 60 kilometres north west of Sydney and is the home of Air Mobility Group (AMG). The base has a single operational runway (see Annex A) with one parallel taxiway. The Runway (10/28) is aligned east/west, with Richmond Township to the west of RAAF Base Richmond and Windsor Township to its east. Runway 28 is serviced by an Instrument Landing System (ILS) which guides pilots to safe landing in adverse weather conditions. The Southern Grass, located adjacent to the south and parallel to the main runway is used by the RAAF Richmond gliding club for gliding operations.

6. The preferred runway in use is determined primarily by wind direction and is stipulated by Air Traffic Control (ATC) to ensure safety of flight. When ATC is not active, pilots determine the most suitable runway by examining the wind conditions from weather reports and also wind socks located at the airfield. 453 SQN Richmond Flight ATC have declared Runway 28 to be the preferred runway for the airbase.

7. RAAF Richmond remains an active air base supporting:

- a. international air transportation for Government of Australia (GOAS) and Australian Defence Force (ADF) activities
- b. Australian and international Defence Force air operations, exercises, training and aircraft maintenance

- c. national and international humanitarian aid, disaster relief and emergency evacuation capability
- d. diversionary emergency aircraft landing facilities for ADF and civilian aircraft where necessary
- e. Defence Assistance to the Civil Community (DACC)
- f. medical evacuation for air-ambulatory civilian casualties
- g. New South Wales Rural Fire Service (NSW RFS) Large Air Tanker (LAT) and Very Large Air Tanker (VLAT) firefighting aircraft
- h. Australian Air Force Cadets Elementary Flying Training School (AAFC EFTS)
- i. RAAF Richmond Flying Club and RAAF Richmond Gliding Club activities.

8. The majority of RAAF Richmond flying training occurs in designated training areas situated over farming, rural and over-water areas (see Annex B). This is designed to reduce the time aircraft spend over residential areas.

9. The proximity and orientation of RAAF Richmond's runway means that aircraft are required to take off and land directly over the townships of Richmond and Windsor. The introduction of aircraft simulators, allowing aircrew to practice flying in ground-based training devices, has significantly reduced the number of training aircraft movements over the Hawkesbury.

### Drop zones

- 10. RAAF Richmond is responsible for the following off-base drop zones:
  - a. **Londonderry Drop Zone (LDZ).** Located approximately 10km to the west of the base. LDZ is used for parachute drop practice by ADF elements. The primary aircraft using LDZ are from AMG flying squadrons which operate C-27J, C-130J-30 and C-17A aircraft.
  - b. **Rickaby's Creek Drop Zone.** Located on lowlands immediately adjacent to RAAF Base Richmond's north-west boundary. It is used by the ADF to practice airdropping of parachute qualified personnel.

### Description of standard aircraft operations

- 11. Air Force aircraft permanently based at RAAF Richmond:
  - a. Lockheed C-130J-30, four engine turboprop transport aircraft (37SQN)
  - b. Diamond DA40NG single engine propeller aircraft (AAFC).
- 12. Non-Air Force aircraft permanently based at RAAF Richmond:
  - a. 1 x NSW RFS B737 LAT
  - b. 2 x NSW RFS Cessna Citation

c. NSW RFS is also able to contract additional LAT/VLAT and light spotter aircraft as required to complement the above fleet during the annual bushfire season.

13. Normal flying operations for military aircraft are from 0800-2300 Monday to Thursday and 0800-1830 Friday to Sunday Australian Eastern Standard Time (AEST) and is adjusted for Australian Eastern Daylight Savings Time (AEDT). Flying conducted over drop zones and night flying outside of normal flying operations hours are restricted to the minimum required to achieve training targets and operational requirements.

14. RAAF Richmond maintains ATC support between 0800-2300 Monday to Thursday and 0800-1830 Friday to Sunday Australian Eastern Standard Time (AEST) and is adjusted for Australian Eastern Daylight Savings Time (AEDT). Where possible operations outside of these hours is restricted to arrivals and departures only with flight profiles compliant with the Richmond Noise Abatement Procedures and the Air Force Fly Neighbourly Policy (see Annexes C and D).

15. The RAAF Richmond airfield is available 24 hours each day for all emergency services aircraft (NSW Police, NSW RFS, NSW Air Ambulance, Royal Flying Doctors, Careflight, Westpac Rescue, etc).

16. The average number of military aircraft movements at RAAF Richmond is approximately 100 per week. NSW RFS will operate heightened operations during the September – March fire season with reduced operations during the April – August period.

17. RAAF Richmond utilises the training areas indicated at Annex B. Aircraft movements are dispersed across different training areas in order to reduce localised noise impacts. The majority of training is conducted in the Western Training Area where population density is the least.

18. Where possible, RAAF Richmond will advise the local community of non-routine flying events. This is not always possible due to changes in weather conditions or operational restrictions, which may require aircraft to operate over land training areas. Members of the public can access information regarding planned non-routine flying via the [Richmond Flying Operations](#) website.

19. Installed engine ground testing may be required post aircraft maintenance which requires engines to be tested at all power settings. This testing is performed during the day and at times in the evening during which the contrast to ambient noise may give the impression of excess noise.

20. IAW the RAAF Richmond Aerodrome Manual, an engine run curfew applies from 2300 to 0700, Mon –Thu and from 2200 – 0700 Fri, weekends and public holidays. An exemption to the curfew may be considered where an aircraft is required for task the following morning or a test flight the following morning prior to a task later in the day.

21. However, as a result of a dramatic drop in ambient noise levels for residential areas at the eastern end of the base after 1900 h, noise levels from engine maintenance ground operations tend to give the impression of generating excessive noise levels up to 2200 h. For this reason, daylight engine runs are preferred with night time operations restricted to unavoidable occasions only, with appropriate approvals.

## Variations to standard aircraft operations

22. The most likely variation to standard flying operations at RAAF Richmond is visiting aircraft from other bases. Defence has an extensive range of aircraft with differing engine configurations including:

- a. KC-30A – two turbofan engines
- b. F-35A – single jet engine
- c. F/A-18F Super Hornet – twin jet engine
- d. EA-18G Growler – twin jet engine
- e. C-17A Globemaster III – four turbofan engines
- f. B737 Boeing Business Jet – two turbofan engines
- g. C-27J Spartan – two turboprop engines
- h. Falcon 7X – three turbofan engines
- i. P-8A Poseidon – two turbofan engines
- j. B350 King Air – two turboprop engines
- k. Various single and multi-rotor aircraft (helicopters) – single and twin turboshaft engines
- l. Visiting aircraft types from international Defence Forces.

23. Unforeseeable variations, such as those caused by inclement weather and aircraft serviceability issues, will occur from time to time. Where possible, noise control minimisation measures will be implemented as required.

## Richmond noise minimisation strategies

24. RAAF Richmond maintains guidelines to reduce noise impacts from aircraft operations. These are:

- a. **Intent to Fly Neighbourly policy.**
  - (1) **Within 10nm of the airfield.** Noise abatement procedures are adhered to within 10 nautical miles (18.5 kilometres) of the airfield which complements extant local procedures.
  - (2) **Consideration for operations over land outside of regular military flying areas.** Consideration will be given to concentrated periods of flight over rarely used military training areas and Temporary Restricted Areas (TRAs). These operations shall require notifications to local communities if time permits. This will include operations:
    - (a) involving multiple aircraft
    - (b) over areas that do not usually experience military aircraft activity

- (c) over land within TRAs
  - (d) irrespective of the altitudes involved.
- (3) **Consideration for Operations over major urban areas.** Flight activities conducted over urban areas are to be communicated to the community if time permits and as much as flight planning allows. These missions should be conducted at as high an altitude as practicable. Weather conditions such as overcast conditions that forces flight at lower than designed altitude could result in mission cancellation if a risk assessment rating is not acceptable.
- b. **Aircraft engine maintenance ground operations.** The following time restrictions apply to C-130J-30 engine runs at RAAF Base Richmond:
- (1) Full power runs are permissible on eastern and western aprons and Taxiway Whisky (Birdbath) between 0700-2200 AEST and seasonally adjusted to AEDT. Other times are restricted.
  - (2) Ground idle runs can be carried out with no set duration IAW operating SQN procedures 0700-2300 AEST and seasonally adjusted to AEDT.
  - (3) Duty Engineer (DENG) authorisation is required to conduct engine runs during restricted hours and is to occur on Taxiway Zulu only. Engines and APUs are to be run for no longer than 15 minutes duration and aircraft engines are not to exceed ground idle.
  - (4) Where possible, notice to local residents of engine runs during restricted hours shall occur if time permits.
  - (5) All engine runs completed during restricted hours are to be recorded in the DENG Report with details of the engine run time and task number and emailed to SENGO and Air Base Command Post (ABCP) at the completion of the shift.

### **Low flying**

25. Air Force and civilian regulations define low flying as flight below 500ft over a non-built-up area, or below 1,000ft over a built-up area.

### **Localised communication strategy**

26. RAAF Richmond communicates regularly with the local council and community regarding base operations in a variety of formal and informal means. RAAF Richmond advises the local community of flying operations that may generate excessive noise levels by utilising any of the following avenues:

- a. media releases
- b. social media
- c. [Richmond Flying Operations](#) website
- d. email communication with registered local community residents.



## Noise information

27. The [Defence Aircraft Noise](#) website provides all Aircraft Noise information peculiar to the RAAF Richmond area.

## Noise complaints

28. RAAF Base Richmond manages noise complaints from the public in accordance with Air Command Standing Instruction (Operations) 03-11, Aircraft Noise Management. Complaints regarding Air Force aircraft noise can be made via:

- a. the Defence switchboard on 1300 333 362 and ask to be connected to RAAF Base Richmond
- b. online by the [aircraft noise enquiry or complaint form](#)
- c. mail to:

Staff Officer Aircraft Noise Management  
R8-03-030  
Russell Drive  
Russell  
ACT 2601

29. On receipt of a noise complaint, a Defence member will initiate an investigation to determine the occurrence and likely operating Squadron. Contact will be made to the complainant to provide information on the nature of the operations to the query. Complaints relating to civilian aircraft will be directed to [Airservices Australia NCIS](#).

30. To assist with the investigation, the date and time, location, and a description of the event that prompted the enquiry or complaint should be clearly articulated. Following the guidelines of Defence Noise Management process, an initial response should be provided within 2 working days. If the complaint requires further investigation, the aim is to resolve the case within 28 working days

31. Military aircraft noise complaints are generally taken by RAAF Base Richmond ABCP and documented on webform OA039. All completed investigations are forwarded to Air Force Headquarters Staff Officer Aircraft Noise Management in Canberra via Headquarters Air Command for further vetting.

32. Further details on the aircraft noise complaint process can be found on the [Defence Aircraft Noise](#) website.

33. If a complainant is unsatisfied with how their aircraft noise complaint has been handled, the complainant may seek an independent review by the Aircraft Noise Ombudsman (ANO). The ANO will only review aircraft noise complaints that have already been submitted to the Department of Defence. Further information on the ANO including the ANO Charter and other policies can be found on the [ANO website](#).

34. A complaint investigation can be submitted to the ANO via:

- a. the ANO's online complaint form
- b. toll free phone number 1800 266 040

c. email [ano@ano.gov.au](mailto:ano@ano.gov.au)

d. mail:

Aircraft Noise Ombudsman  
GPO Box 1985  
Canberra City ACT 2601

### **Review and update process**

35. Review of this document is to be conducted annually.

#### **Annexes:**

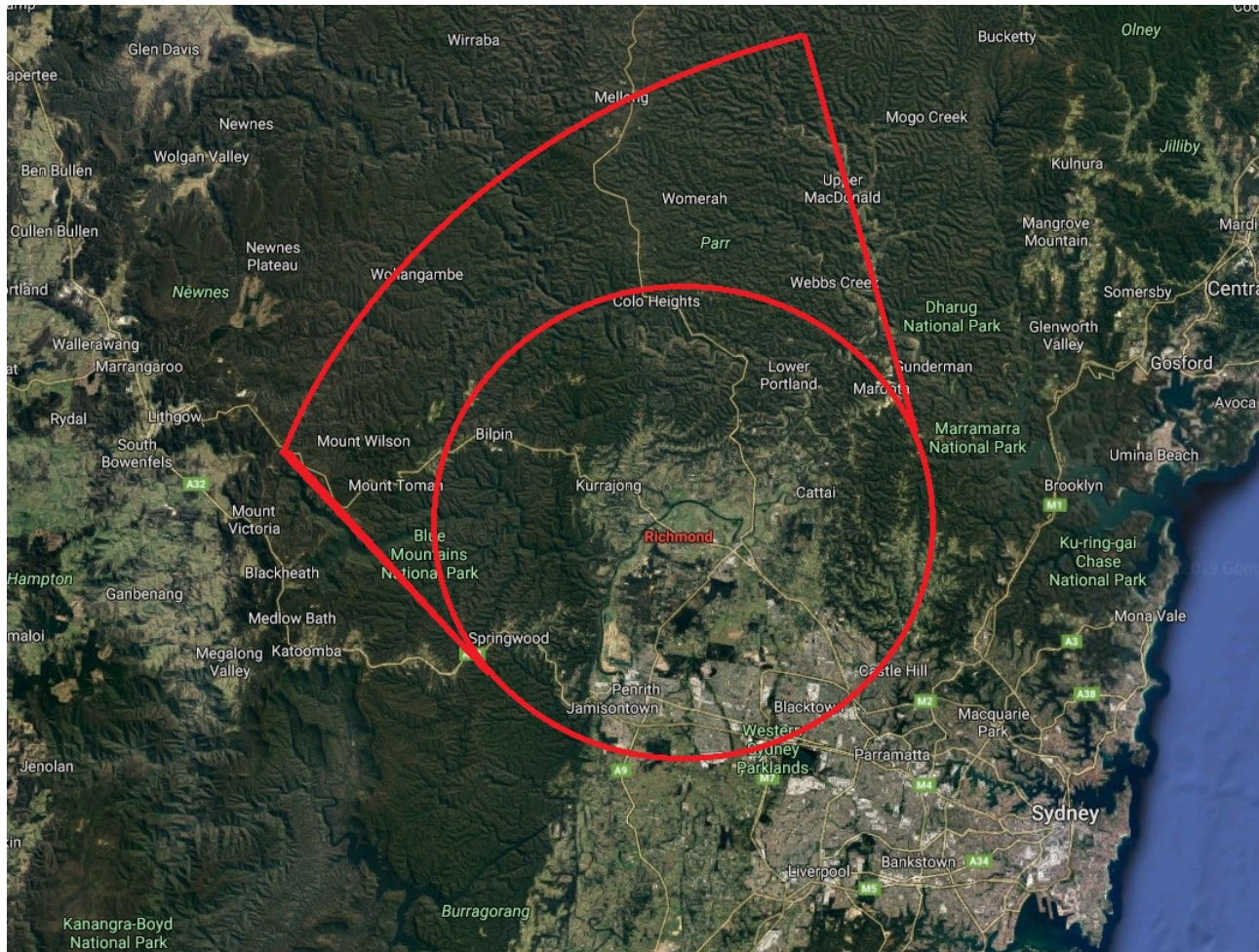
- A. RAAF Base Richmond Training Areas
- B. RAAF Base Richmond Map
- C. Richmond Noise Abatement Procedures
- D. Air Force Fly Neighbourly Policy

**RAAF BASE RICHMOND MAP**





**RAAF BASE RICHMOND TRAINING AREAS**



## RICHMOND NOISE ABATEMENT PROCEDURES

1. The RAAF has an honest and open approach towards the management of aircraft noise experienced by residents living near RAAF Bases. Aircraft noise will never be eliminated, however the RAAF is committed to working with the community and local Councils to reduce aircraft noise impact. In this regard, the RAAF has developed a public access online resource relating to Defence Aircraft Noise which is found at <http://www.defence.gov.au/aircraftnoise>.
2. The following programs are available to further mitigate aircraft noise impacts upon communities adjacent to RAAF Base Richmond:
  - a. **Air Force – Aircraft Noise Communication Strategy (ANCS).** A strategy outlining how the RAAF communicates with the community in balancing operational priorities with community needs.
  - b. **Air Force – Media Awareness Strategy (MAS).** A strategy on how the RAAF is to utilise media to provide the local and broader civil community advance notice of irregular planned aircraft flypasts, displays or other activities which are likely to generate excessive aircraft noise.
  - c. **Air Force – Aircraft Noise Management Strategy (ANMS).** A strategy outlining how the RAAF considers the local community by reducing noise impact whilst maintaining the safe operation of aircraft in balancing operational and training requirements. The ANMS is available at <http://www.defence.gov.au/aircraftnoise>.
  - d. **Air Force – Fly Neighbourly Policy (FNP).** A practical guideline of principles exercised by aircraft during the course of RAAF Base operations. The FNP is available at <http://www.defence.gov.au/aircraftnoise> and further details are presented in Annex D.
3. RAAF Base Richmond also adheres to operational guidelines including being committed to:
  - a. undertaking flying operations in a manner which is considerate of our local community, whilst maintaining the safe operation of the aircraft.
  - b. adhering to all Commonwealth legislation and Civil Aviation Safety Authority (CASA) regulations and guidelines.
  - c. notifying local communities of major operations, exercises or other non-routine training and aircraft flying activities such as flying displays.

## **AIR FORCE FLY NEIGHBOURLY POLICY**

1. Air Force is working with local communities near airbases, training areas and air weapons ranges to reduce noise impacts whilst balancing operational and training requirements. Consequently Air Force has developed a Fly Neighbourly Policy (FNP) which can be found online at <http://www.defence.gov.au/aircraftnoise>.

2. Air Force is committed to undertake flying operations in a manner which is considerate of our local communities, whilst maintaining safe operation of our aircraft and achieving the required levels of capability. Guided by these principles RAAF Richmond will:

- a. comply with published airfield noise abatement procedures
- b. use appropriate runway length for departures to maximise height over local communities
- c. minimise the use of afterburner on fast jets during take-off and minimise noise during climb out on the occasions fast jets visit RAAF Richmond
- d. limit the speed of aircraft over populated areas
- e. minimise flight over residential areas and other noise sensitive buildings such as hospitals, schools and farming communities
- f. avoid low flying over known noise sensitive areas
- g. minimise flying late at night or early in the morning
- h. include aircraft noise awareness in pilot training and familiarisation
- i. notify local communities of major exercises or other non-routine training and flying activities such as flying displays.

3. To further minimise noise RAAF Richmond may:

- a. limit continuous circuit training at night and on weekends and public holidays
- b. use satellite airfields for repetitive aircraft circuits
- c. vary flight paths to share noise
- d. consider continuous descents to reduce noise
- e. implement local engine run-up procedures
- f. minimise jet or turbo prop engine testing at night.