Proposal to vary the Longreach licence area plan

Consultation paper

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Executive summary

Longreach licence area plan variation

We are seeking comments on proposed changes to the [Licence Area Plan – Longreach (Radio) – August 1996](https://www.legislation.gov.au/Details/F2005B01110) (Longreach LAP).

We are proposing to vary the Longreach LAP to:

* Add technical specifications for the existing transmissions of the 4LRE commercial radio broadcasting service at Aramac and Muttaburra in the Longreach RA1 licence area (**Proposal 1**).
* Vary the technical specifications for the 4LG and 4LRE commercial radio broadcasting services and the UBET open narrowcasting service at Winton (**Proposal 2**).
* Make technical amendments to the Longreach LAP, including:
* updates to transmitter location information
* substituting Australian Map Grid References with Geocentric Datum of Australia 1994 (GDA94) co-ordinates
* minor updates to antenna heights
* formatting and grammatical changes to the attachments (**Proposal 3**).

The draft variation instrument, Variation to Licence Area Plan – Longreach Radio – 2024 (No. 1), which would give effect to the proposed changes, is available in the key documents section of this consultation on the [ACMA website](https://www.acma.gov.au/consultations/2024-09/proposal-vary-longreach-licence-area-plan).

# Issues for comment

We welcome comments from interested stakeholders on the issues raised in this paper, or on any other issues relevant to this proposed licence area plan (LAP) variation.

Details on making a submission can be found at the [Invitation to comment](#_Invitation_to_comment) section of this document.

# Introduction

## Planning of broadcasting services

Our broadcasting planning functions are set out in Part 3 of the *Broadcasting Services Act 1992* (the BSA). We promote the objects of the BSA (section 3), including the economic
and efficient use of radiofrequency spectrum, and consider the planning criteria set out in section 23 of the BSA.

When planning analog broadcasting services, we take the approach outlined in our
paper, [*ACMA approach to broadcast planning and varying LAPs*](https://www.acma.gov.au/broadcast-planning-resources). The paper provides an overview of the regulatory framework, policy objectives and planning process for analog
broadcasting services.

Under section 26 of the BSA, we must, by legislative instrument, prepare LAPs that determine the number and characteristics, including technical specifications, of broadcasting services to be available in particular areas of Australia. The BSA also provides us with a discretionary power to vary LAPs.

In deciding whether to vary any LAP, we consider all submissions received.

## Overview of the Longreach LAP

The Longreach LAP specifies one licence area, which is Longreach RA1.

The following services are planned in the Longreach RA1 licence area:

* 2 national radio broadcasting services
* 2 commercial radio broadcasting services
* 5 open narrowcasting radio services.

# Proposal 1: Commercial radio – Longreach RA1

## Summary

We propose to:

* Add a technical specification for a FM transmitter for the 4LRE commercial radio broadcasting service currently operating at Aramac. This will permit the FM transmitter to operate on 98.1 MHz, with a maximum effective radiated power (ERP) of 50 W, an omnidirectional (OD) radiation pattern, mixed, and a maximum antenna height of 30 m.
* Add a technical specification for a FM transmitter for the 4LRE commercial radio broadcasting service currently operating at Muttaburra. This will permit the FM transmitter to operate on 97.3 MHz, with a maximum ERP of 100 W, an OD radiation pattern, mixed polarisation, and a maximum antenna height of 60 m.

We consider that this proposal is an economic and efficient use of spectrum. It promotes the objects of the BSA, particularly the availability of a diverse range of radio services (paragraph 3(1)(a) of the BSA). In developing this proposal, we have taken the planning criteria in section 23 of the BSA into account, and in particular:

* Relevant demographics and social and economic characteristics (paragraph 23(a)
and (b)).
* The number of existing broadcasting services and demand for new services (paragraph 23(c)).
* Technical restraints relating to the delivery or reception of broadcasting services (paragraph 23(e)).

## Background

### About the Longreach RA1 licence area

The Longreach RA1 licence area is in central west Queensland and covers several localities, including Aramac and Muttaburra (see [Appendix A](#_Appendix_A:_Map)). The localities of Longreach, Aramac and Muttaburra are located in the northeast part of the licence area, with Aramac approximately 112 km northeast, and Muttaburra 99 km north of Longreach. Parts of the licence area also lie on the Tropic of Capricorn. The main industries of the area are cattle, sheep and tourism.

The population of Longreach RA1 is 9,883,[[1]](#footnote-2) while Aramac and Muttaburra have a population of 226 and 158,[[2]](#footnote-3) respectively.

The Longreach RA1 licence area overlaps the commercial radio licence areas of Charleville RA1 and the Remote Commercial Radio Service North East Zone RA1. Commercial radio broadcasting services within these areas include 4CCC, 4VL, 4BRZ and 4RBL.[[3]](#footnote-4)

Radio Outback Pty Ltd was the original licensee of the 4LG[[4]](#footnote-5) and 4LRE[[5]](#footnote-6) commercial radio broadcasting services. The 2 services were sold in July 2012 to the current licensee, Resonate Broadcasting Pty Ltd (Resonate Broadcasting). Both 4LG and 4LRE are currently planned in the Longreach RA1 licence area. For the last 12 years, 4LRE has been licensed and has been broadcasting its service in Aramac and Muttaburra. This proposal will incorporate these existing, long-standing transmissions into the Longreach LAP.

### FM commercial radio broadcasting services in the Longreach RA1 licence area

In the Longreach LAP, 2 commercial radio broadcasting services, 4LG and 4LRE, are planned and licensed to operate in the Longreach RA1 licence area.

The 4LRE service broadcasts on 104.5 MHz to the Longreach locality. The 4LRE service also serves Barcaldine, Blackall, Tambo, and Winton, with transmitters operating on
100.9 MHz, 95.1 MHz, 101.9 MHz, and 95.9 MHz, respectively.

In May 2012, Radio Outback Pty Ltd, the then owner of the 4LG and 4LRE licences, lodged applications for transmitters to provide coverage to Aramac and Muttaburra. The apparatus licences[[6]](#footnote-7) to broadcast the 4LRE services in these locations were issued in late 2012 and the transmissions for both services remain licensed and operating. The proposed variation to the Longreach LAP will formalise the 2 long-running transmissions at Aramac and Muttaburra, which currently operate at 98.1 MHz and 97.3 MHz respectively.

The proposed technical specifications for the transmitters largely reflect the conditions in the apparatus licences that authorise their operation. For the Aramac transmitter, only the polarisation is changed from vertical to mixed to reflect the current planning standards in radio LAPs (see [Appendix B1](#_B1:_4LRE_transmitter)).

Similarly, the Muttaburra transmitter will change its polarisation from vertical to mixed. The maximum antenna height will be increased to 60 m and the maximum ERP is also proposed to be increased to 100 W. The proposed antenna height and power reflect the current operational conditions (see [Appendix B2](#_B2:_4LRE_transmitter)).

### Spectrum demand and availability

We do not consider spectrum demand to be a concern. There is good availability of FM frequencies in the Longreach RA1 licence area, given its relative remoteness. It is not necessary to identify additional frequencies, as licences for the transmission of 4LRE radio broadcasting services have been issued for the use of 98.1 MHz in Aramac and 97.3 MHz in Muttaburra. These services have been in operation for over 10 years.

### Coverage and overspill

The coverage of the 4LRE transmitters in Aramac and Muttaburra is predicted to have little or no impact on urban centres outside of the Longreach RA1 licence area.[[7]](#footnote-8)

## Preliminary view

We consider that this proposal is an economic and efficient use of the spectrum that promotes the objects of the BSA. This is particularly relevant to paragraph 3(1)(a), to make spectrum already in use available for 4LRE service at Aramac and Muttaburra on a long-term basis. In putting forward this proposal, we have taken the planning criteria in section 23 of the BSA into account, particularly the number of existing broadcasting services in the Longreach RA1 licence area (paragraph 23(c)), as the 4LRE service is the only commercial radio broadcasting service transmitting to Aramac and Muttaburra.

The proposed technical specifications are at [Appendix B](#_Appendix_B:_Proposed). The draft Variation to Licence Area Plan – Longreach Radio – 2024 (No. 1), that gives effect to this proposed change, is available in the key documents section of this consultation on the [ACMA website](https://www.acma.gov.au/consultations/2024-09/proposal-vary-longreach-licence-area-plan).

# Proposal 2: Commercial and HPON radio – Longreach RA1

## Summary

We propose to:

* Vary the technical specification for an FM transmitter for the 4LG commercial radio broadcasting service serving Winton to increase the maximum antenna height to 30 m.
* Vary the technical specification for an FM transmitter for the 4LRE commercial radio broadcasting service serving Winton to increase the maximum antenna height to 30 m.
* Vary the technical specification for an FM transmitter for the high-power open narrowcasting (HPON) radio broadcasting service serving Winton to:
* increase its maximum antenna height to 30 m
* change the polarisation to mixed
* add an advisory note on the measurement of the coverage area of the transmission.

We consider that this proposal is an economic and efficient use of spectrum, which promotes the objects of the BSA, particularly the availability of a diverse range of radio services (paragraph 3(1)(a)). In developing this proposal, we have taken the planning criteria in section 23 of the BSA into account, and in particular:

* Relevant demographics and social and economic characteristics (paragraph 23(a)
and (b)).
* The number of existing broadcasting services and the demand for new services (paragraph 23(c)).
* Technical restraints relating to the delivery or reception of broadcasting services (paragraph 23(e)).

## Background

Winton is a town located within the Longreach RA1 licence area in central west Queensland, approximately 177 km northwest of the Longreach locality and 1,153 km northwest of Brisbane. It has a population of 856 and its main industry is cattle farming, including beef production.

The 4LG and 4LRE commercial radio broadcasting services, as well as the HPON radio broadcasting service licensed to UBET, currently transmit from the same antenna at the Water Tower, Werna St, Winton[[8]](#footnote-9). Both 4LG and 4LRE are owned by Resonate Broadcasting, while UBET (part of the Radio TAB network) is the licensee of the HPON service. The transmitters for these services have been operating at Winton on the frequencies 100.7 MHz, 95.9 MHz and 98.3 MHz, respectively. All 3 services are licensed and have long-standing transmissions at Winton, with the earliest dating back to 1996.

We propose to increase the antenna height for the 4LG, 4LRE and the UBET HPON transmitters in the LAP to 30 m. All 3 services have been transmitting from this antenna height for a number of years.

Coverage and interference

At the currently planned antenna height of 15 m, it is predicted that approximately 930–950 people[[9]](#footnote-10) in the Winton area would have been able to receive the 4LG and 4LRE commercial radio broadcasting services, as well as the UBET HPON radio broadcasting service. At an antenna height of 30 m, approximately 950 people[[10]](#footnote-11) are predicted to be served by the
3 services. We consider this is substantially similar coverage and therefore the variation
is acceptable.

The updated technical specifications for the 4LG and 4LRE commercial radio broadcasting services are to remain operating on 100.7 MHz and 95.9 MHz respectively, have a maximum ERP of 100 W, an OD radiation pattern, mixed polarisation and a maximum antenna height of 30 m (see [Appendices C1](#_C1:_4LG_transmitter) and [C2](#_C2:_4LRE_transmitter)).

The updated technical specification for the UBET HPON service is to remain operating on 98.3 MHz, have a maximum ERP of 25 W, an OD radiation pattern, mixed polarisation and a maximum antenna height of 30 m (see [Appendix C3](#_C3:_HPON_service)).

Coverage prediction modelling identified potential interference between the UBET HPON service and a LPON service from United Christian Broadcasters Australia Limited,[[11]](#footnote-12) but this should not impede the proposal as both services have been operating at Winton for a number of years, with no complaints known to the ACMA.

### Spectrum demand and availability

We do not consider spectrum demand to be a concern. There is good availability of FM frequencies in the Longreach RA1 licence area, given its remoteness. It is not necessary to identify additional spectrum, as frequencies for the 4LG, 4LRE and the UBET HPON radio broadcasting services have been in use for many years with no spectrum availability issues.

## Preliminary view

We consider that this proposal is an economic and efficient use of spectrum that promotes the objects of the BSA, particularly paragraph 3(1)(a). Spectrum already in use for the 4LG, 4LRE and UBET HPON radio broadcasting services at Winton is proposed to be made available on a long-term basis. In making this proposal, we have taken the planning criteria in section 23 of the BSA into account, particularly the number of existing broadcasting services in the Longreach RA1 licence area (paragraph 23(c)).

The proposed technical specifications are at [Appendix C](#_Appendix_C:_Proposed). The draft Variation to Licence Area Plan – Longreach Radio – 2024 (No. 1), that gives effect to this proposed change, is available in the key documents section of this consultation on the [ACMA website](https://www.acma.gov.au/consultations/2024-09/proposal-vary-longreach-licence-area-plan).

# Proposal 3: Minor amendments

In addition to the proposals outlined above, we propose to make minor amendments to the text, schedules, and attachments of the Longreach LAP to:

* Rename the title of the Longreach LAP to ‘Licence Area Plan – Longreach Radio’.
* Delete the text ‘(Radio) – August 1996’ from the heading of Schedule One and restructure the table of service provided in Longreach RA1.
* Update Attachment 1.1 to make minor editorial amendments to the definition of the Longreach RA1 licence area and standard terminology defined by the Australian Bureau Statistics, in line with the modern style of LAPs. These edits will not change the actual definition of the Longreach RA1 licence area.
* Update the transmitter numbers in Attachments 1.2 to 1.31.
* Update transmitter site nominal locations and change Australian Map Grid references to Geocentric Datum of Australia (GDA94) coordinates, which is the current standard reference for LAPs.
* Amend Attachments 1.2,1.4 to 1.9, 1.11, 1.14 to 1.15 and 1.17 by making minor updates to the antenna heights to reflect operating conditions.
* Remove references to the *Technical Planning Guidelines* in all attachmentsand put the reference to the *Broadcasting Services (Technical Planning) Guidelines 2017* in a substantive clause at the start of the LAP. These changes are not intended to affect the operation of the LAP.
* Amend Attachments 1.19 to 1.26 to change polarisation from ‘vertical’ to ‘mixed’, which is the current standard technical specification for LAPs.
* Make formatting and grammatical changes to the Longreach LAP and its various attachments.

# Invitation to comment

## Making a submission

We invite comments on the issues set out in this consultation paper.

* [Online submissions](https://www.acma.gov.au/have-your-say) can be made by uploading a document. Submissions in PDF, Microsoft Word or Rich Text Format are preferred.
* Submissions by post can be sent to:

The Manager
Broadcasting Carriage Policy Section
Australian Communications and Media Authority
PO Box 78
Belconnen ACT 2616

The closing date for submissions is **COB, Tuesday 8 October 2024**.

Consultation enquiries can be emailed to BCP@acma.gov.au.

### Publication of submissions

We publish submissions on our website, including personal information (such as names and contact details), except for information that you have claimed (and we have accepted) is confidential.

Confidential information will not be published or otherwise released unless required or authorised by law.

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View information about our policy on the [publication of submissions](https://www.acma.gov.au/publication-submissions), including collection of personal information during consultation and how we handle that information.

Information on the *Privacy Act 1988*, how to access or correct personal information, how to make a privacy complaint and how we will deal with any complaints, is available in our [privacy policy](https://www.acma.gov.au/privacy-policy).

# Appendix A: Map of Longreach RA1 licence area



# Appendix B: Proposed technical specifications for 4LRE

## B1: 4LRE transmitter at Aramac

**Attachment 1.22A**

LICENCE AREA PLAN : Longreach

Category : Commercial

General Area Served : Aramac (QLD)

Service Licence Number : SL10223

TECHNICAL SPECIFICATION - FM Radio

Specification Number : TS1137985

Transmitter Site :-

Nominal location : SES site cnr of Porter Street and Aramac-Muttaburra Road ARAMAC

Nominal Co-ordinates Latitude Longitude
(GDA94) : -22.968151 145.243028

Emission :-

Frequency Band & Mode : VHF-FM

Carrier Frequency : 98.1 MHz

Polarisation : Mixed

Maximum antenna height : 30 m

Output Radiation Pattern :-

|  |  |
| --- | --- |
| Bearing or Sector (Clockwise direction) | Maximum ERP |
| At all angles of azimuth | 50 W |

## B2: 4LRE transmitter at Muttaburra

**Attachment 1.24A**

LICENCE AREA PLAN : Longreach

Category : Commercial

General Area Served : Muttaburra (QLD)

Service Licence Number : SL10223

TECHNICAL SPECIFICATION - FM Radio

Specification Number : TS1136871

Transmitter Site :-

Nominal location : SES site Cornish Street MUTTABURRA

Nominal Co-ordinates Latitude Longitude
(GDA94) : -22.594377 144.548408

Emission :-

Frequency Band & Mode : VHF-FM

Carrier Frequency : 97.3 MHz

Polarisation : Mixed

Maximum antenna height : 60 m

Output Radiation Pattern :-

|  |  |
| --- | --- |
| Bearing or Sector (Clockwise direction) | Maximum ERP |
| At all angles of azimuth | 100 W |

# Appendix C: Proposed technical specifications at Winton

## C1: 4LG transmitter at Winton

**Attachment 1.21**

LICENCE AREA PLAN : Longreach

Category : Commercial

General Area Served : Winton (QLD)

Service Licence Number : SL010221

TECHNICAL SPECIFICATION - FM Radio

Specification Number : TS10004185

Transmitter Site :-

Nominal location : Water Tower Werna St WINTON

Nominal Co-ordinates Latitude Longitude
(GDA94) : -22.386431 143.037523

Emission :-

Frequency Band & Mode : VHF-FM

Carrier Frequency : 100.7 MHz

Polarisation : Mixed

Maximum antenna height : 30 m

Output Radiation Pattern :-

|  |  |
| --- | --- |
| Bearing or Sector (Clockwise direction) | Maximum ERP |
| At all angles of azimuth | 100 W |

## C2: 4LRE transmitter at Winton

**Attachment 1.26**

LICENCE AREA PLAN : Longreach

Category : Commercial

General Area Served : Winton (QLD)

Service Licence Number : SL010223

TECHNICAL SPECIFICATION - FM Radio

Specification Number : TS10004429

Transmitter Site :-

Nominal location : Water Tower Werna St WINTON

Nominal Co-ordinates Latitude Longitude
(GDA94) : -22.386431 143.037523

Emission :-

Frequency Band & Mode : VHF-FM

Carrier Frequency : 95.9 MHz

Polarisation : Mixed

Maximum antenna height : 30 m

Output Radiation Pattern :-

|  |  |
| --- | --- |
| Bearing or Sector (Clockwise direction) | Maximum ERP |
| At all angles of azimuth | 100 W |

## C3: HPON service at Winton

**Attachment 1.31**

LICENCE AREA PLAN : Longreach

Category : Open Narrowcasting

General Area Served : Winton (QLD)

Service Licence Number : Not applicable

TECHNICAL SPECIFICATION - FM Radio

Specification Number : TS10004227

Transmitter Site :-

Nominal location : Nominal Planning Site Water Tower WINTON

Nominal Co-ordinates Latitude Longitude
(GDA94) : -22.387364 143.038002

Emission :-

Frequency Band & Mode : VHF-FM

Carrier Frequency : 98.3 MHz

Polarisation : Mixed

Maximum antenna height : 30 m

Output Radiation Pattern :-

|  |  |
| --- | --- |
| Bearing or Sector (Clockwise direction) | Maximum ERP |
| At all angles of azimuth | 25 W |

***Advisory Note:***

The coverage area of this transmission is a circle of radius 5 km measured from a point with the following GDA94 co-ordinates: -22.387364, 143.038002. This point is the same as the nominal transmitter location.

1. [Section 30](https://www.acma.gov.au/publications/2019-10/rules/determination-population-figures-under-section-30-broadcasting-services-act-1992) of the BSA provides for the ACMA, having regard to the most recently published census count prepared by the Australian Statistician, to determine the population of a licence area. [↑](#footnote-ref-2)
2. Australian Bureau of Statistics, [2021 Census QuickStats](https://www.abs.gov.au/census/find-census-data/search-by-area), viewed 18 June 2024. Aramac is an Urban Centre and Locality and Muttaburra is a Suburb and Locality. All other data in this paper, unless stated otherwise in a footnote, will also originate from this source. [↑](#footnote-ref-3)
3. 4CCC and 4VL are commercial radio broadcasting services owned by Resonate Regional Radio Pty Ltd, operating in the Charleville RA1 licence area. 4BRZ and 4RBL are commercial radio broadcasting services owned by Rebel FM Stereo Pty Ltd, operating in the Remote Commercial Radio Service North East Zone RA1. [↑](#footnote-ref-4)
4. 4LG is the callsign and its broadcasting service licence (BSL) number is 10221. Its on-air ID is the same as its callsign. [↑](#footnote-ref-5)
5. 4LRE is the callsign and BSL number is 10223. Its on-air ID is West FM. [↑](#footnote-ref-6)
6. The apparatus licence numbers are 1950047/1 (Aramac) and 1950049/1 (Muttaburra). [↑](#footnote-ref-7)
7. Urban centres defined according to the ABS (see Footnote 2). [↑](#footnote-ref-8)
8. The apparatus licences referred to are: 1151943/1 (4LG), 1158277/1 (4LRE) and 1152297/1 (HPON service for UBET). [↑](#footnote-ref-9)
9. Based on figures produced from the CRC Predict and ITU-R 1546-1 analysis models. [↑](#footnote-ref-10)
10. Based on figures produced from the CRC Predict and ITU-R 1546-1 analysis models. [↑](#footnote-ref-11)
11. The callsign of the LPON service is [VKJ533](https://web.acma.gov.au/rrl/assignment_search.lookup?pEFL_ID=645012) and it operates on 87.6 MHz at the Water Tower, Werna St, Winton. [↑](#footnote-ref-12)