EXPLANATORY STATEMENT

Approved by the Australian Communications and Media Authority

Radiocommunications Act 1992

Radiocommunications Advisory Guidelines (Managing Interference from Spectrum Licensed Transmitters – 3.4 GHz Band) Variation 2023 (No. 1)

Radiocommunications Advisory Guidelines (Managing Interference to Spectrum Licensed Receivers – 3.4 GHz Band) Variation 2023 (No. 1)

Radiocommunications (Unacceptable Levels of Interference – 3.4 GHz Band) Amendment Determination 2023 (No. 1)

Authority

The Australian Communications and Media Authority (**the ACMA**) has made the:

- *Radiocommunications Advisory Guidelines (Managing Interference from Spectrum Licensed Transmitters – 3.4 GHz Band) Variation 2023 (No. 1)* (**Tx RAG Variation**); and
- *Radiocommunications Advisory Guidelines (Managing Interference to Spectrum Licensed Receivers – 3.4 GHz Band) Variation 2023 (No. 1)* (**Rx RAG Variation**);

under section 262 of the *Radiocommunications Act 1992* (**the Act**) and subsection 33(3) of the *Acts Interpretation Act 1901* (**the AIA**).

Section 262 of the Act provides that the ACMA may make written advisory guidelines about any aspect of radiocommunication or radio emission.

Subsection 33(3) of the AIA relevantly provides that where an Act confers a power to make a legislative instrument, the power shall be construed as including a power exercisable in the like manner and subject to like conditions (if any) to repeal, rescind, revoke, amend or vary any such instrument.

The ACMA has made the *Radiocommunications (Unacceptable Levels of Interference – 3.4 GHz Band) Amendment Determination 2023 (No. 1)* (**the ULOI Variation**) under subsection 145(4) of the Act and subsection 33(3) of the AIA.

Subsection 145(1) of the Act provides that the ACMA may refuse to include details of a radiocommunications transmitter that is proposed to be operated under a spectrum licence in the Register of Radiocommunications Licences (**Register**), maintained by the ACMA under Part 3.5 of the Act. The ACMA may so refuse where it is satisfied that the transmitter could cause an unacceptable level of interference to the operation of other radiocommunications devices under that or any other spectrum licence, or any other licence. Subsection 145(4) of the Act provides that the ACMA may determine, by written instrument, what are unacceptable levels of interference for the purposes of section 145 of the Act.

Purpose and operation of the instruments

The purpose of the:

- Tx RAG Variation is to amend the *Radiocommunications Advisory Guidelines (Managing Interference from Spectrum Licensed Transmitters — 3.4 GHz Band) 2015* (**Tx RAG**);

- Rx RAG Variation is to amend the *Radiocommunications Advisory Guidelines (Managing Interference to Spectrum Licensed Receivers — 3.4 GHz Band) 2015* (**Rx RAG**);
- ULOI Variation is to amend the *Radiocommunications (Unacceptable Levels of Interference — 3.4 GHz Band) Determination 2015* (the **ULOI Determination**).

Before the Tx RAG Variation, Rx RAG Variation and the ULOI Variation were made, the Tx RAG, Rx RAG and ULOI Determination only applied in relation to specific parts of the 3400 MHz to 3800 MHz frequency band (**3.4 GHz band**), where spectrum licences had been issued. As a result of the *Radiocommunications (Spectrum Re-allocation – 3.4 GHz and 3.7 GHz Bands) Declaration 2022* (**Re-allocation Declaration**), the ACMA is preparing to allocate and issue spectrum licences in the remainder of the 3.4 GHz band, in metropolitan and regional areas.

A spectrum licence permits a licensee, subject to specified conditions, to operate radiocommunications devices within a particular spectrum space, defined by a frequency band and a geographic area. Interference occurring between adjacent spectrum licences consists of in-band interference, across the geographic boundaries, and out-of-band interference, across the frequency boundaries. Interference can also occur between spectrum licensed services and services operating under apparatus and class licensing arrangements.

The Act provides a number of means by which the ACMA may manage interference resulting from the operation of a radiocommunications transmitter under a spectrum licence, including the ability to make advisory guidelines under section 262 of the Act and the ability to determine an unacceptable level of interference under section 145 of the Act.

In preparing the Tx RAG Variation, the Rx RAG Variation and the ULOI Variation, the ACMA has been guided by the object of the Act, which requires the ACMA to promote the long-term public interest derived from the use of the spectrum, including by facilitating the efficient planning, allocation and use of the spectrum and supporting the communications policy objectives of the Commonwealth Government. Under section 28C of the Act, the ACMA is also required to have regard to any relevant Ministerial policy statements, in the performance of the ACMA's spectrum management functions or the exercise of the ACMA's spectrum management powers.

The *Radiocommunications (Ministerial Policy Statement – 3.4–4.0 GHz) Instrument 2022* (**3.4–4.0 GHz Statement**) specifies specific Commonwealth Government communications policy objectives that apply in the ACMA's performance of its spectrum management functions, and exercise of its spectrum management powers, in relation to the 3.4–4.0 GHz band. The 3.4 GHz band falls within the 3.4–4.0 GHz band, and accordingly the ACMA has had regard to the 3.4–4.0 GHz statement in preparing the Tx RAG Variation, the Rx RAG variation and the ULOI Variation.

Advisory guidelines

The TX RAG and Rx RAG are part of a set of legal instruments made by the ACMA that comprise the technical framework applicable to spectrum licences in the 3.4 GHz band.

The purpose of the Tx RAG is to provide guidance to assist in managing the potential for interference to particular radiocommunications receivers, operating under apparatus or class licences, from interference caused by radiocommunications transmitters operating under spectrum licences in the 3.4 GHz band (**3.4 GHz transmitters**). The Tx RAG also provides guidance on managing interference across the geographic areas of spectrum licences issued in the 3.4 GHz band.

The purpose of the Rx RAG is to provide guidance to assist in managing the potential for interference to particular radiocommunications receivers, operating under a spectrum licence, from interference caused by radiocommunications transmitters operated under an apparatus or class licence or from 3.4 GHz transmitters.

Operators of spectrum, class or apparatus licensed services should use the Tx RAG and Rx RAG in the planning of services or in the resolution of interference. The ACMA will also take the Tx RAG and Rx RAG into account when determining whether a radiocommunications transmitter is causing interference into a radiocommunications receiver that is operating in accordance with its licence conditions.

The Tx RAG and Rx RAG do not limit the actions of a spectrum licensee in negotiating operating or protection arrangements with another licensee. The Act does not prescribe any consequences for failing to comply with the Tx RAG or the Rx RAG.

The purpose of Tx RAG Variation is to amend the Tx RAG so it applies in relation to the frequencies and areas specified in the Re- allocation Declaration, to update and incorporate guidance on the management of interference with affected services, and to make some other minor changes to the Tx RAG.

The purpose of the Rx RAG Variation is to amend the Rx RAG so it applies in relation to the frequencies and areas specified in the Re- allocation Declaration, and to make some other minor changes.

ULOI Determination

Section 69 of the Act requires each spectrum licence to include a condition that a radiocommunications transmitter must not be operated under the licence unless the requirements of the ACMA under Part 3.5 of the Act for registration of transmitters have been met.

The ULOI Determination sets out what is meant by an 'unacceptable level of interference' in relation to a 3.4 GHz transmitter. If the ACMA is satisfied that the operation of the radiocommunications transmitter could cause interference of the kind set out in the ULOI Determination, the ACMA will be able to refuse to register the transmitter. Refusal to register a radiocommunications transmitter is subject to internal reconsideration and review by the Administrative Appeals Tribunal (see paragraph 285(n) of the Act).

The ULOI Variation amends the ULOI Determination so it also covers the frequencies and areas specified in the Re- allocation Declaration, and to make some minor changes.

Generally

A provision-by-provision description of:

- the Tx RAG Variation is set out in the notes at **Attachment A**.
- the Rx RAG Variation is set out in the notes at **Attachment B**.
- the ULOI Variation is set out in the notes at **Attachment C**.

The Tx RAG Variation, Rx RAG Variation and ULOI Variation are disallowable legislative instruments under the *Legislation Act 2003* (**the LA**). The Tx RAG, Rx RAG and ULOI Determination are subject to the sunsetting provisions in Part 4 of Chapter 3 of the LA.

Documents incorporated by reference

Subsection 314A(2) of the Act provides that an instrument under the Act may make provision in relation to a matter by applying, adopting or incorporating (with or without modifications) matter contained in any other instrument or writing as in force or existing at a particular time, or from time to time.

The Tx RAG Variation amends the Tx RAG, and the Rx RAG Variation amends the Rx RAG, to incorporate the following document by reference, as existing from time to time:

- Radiocommunications Assignment and Licensing Instruction (**RALI**) MS 47 *Frequency coordination and licensing procedures for Area-Wide Licences (AWL) in the 3400–4000 MHz band* (**RALI MS 47**), published by the ACMA and available, free of charge, from the ACMA's website at www.acma.gov.au;

The Tx RAG Variation also amends the Tx RAG to incorporate the following legislative instruments, as in force from time to time:

- the *Radiocommunications (Low Interference Potential Devices) Class Licence 2015* or, if a later instrument replaces that class licence, the later instrument;
- the *Radiocommunications (Overseas Amateurs Visiting Australia) Class Licence 2015* or, if a later instrument replaces that class licence, the later instrument;
- the *Australian Radiofrequency Spectrum Plan 2021* (**spectrum plan**);
- the *Radiocommunications (Spectrum Re-allocation – 3.4 GHz and 3.7 GHz Bands) Declaration 2022*;
- the *Radiocommunications (Spectrum Re-allocation – 3.6 GHz Band for Regional Australia) Declaration 2018*.

Each of these legislative instruments is available, free of charge, from the Federal Register of Legislation (www.legislation.gov.au).

The ULOI Variation does not amend the ULOI Determination to incorporate any document or legislative instrument by reference.

Consultation

Before the Tx RAG Variation, Rx RAG Variation and ULOI Variation were made, the ACMA was satisfied that consultation was undertaken to the extent appropriate and reasonably practicable, in accordance with section 17 of the LA.

From September 2022 to January 2023, the ACMA convened a short-term industry technical liaison group (**TLG**) to provide advice on modifications to the existing spectrum licence technical framework for the 3.4 GHz band (**technical framework**) to incorporate the frequencies and areas specified in the Re-allocation Declaration.

The TLG was asked to consider and provide advice to the ACMA on numerous technical aspects of the technical framework including:

- technical conditions on the spectrum licences to be issued in the 3.4 GHz band, including the core conditions in accordance with section 66 of the Act;
- modifications to the ULOI Determination;
- modifications to Rx RAG and Tx RAG; and
- modifications to RALI MS 47.

The ACMA developed papers which outlined its proposed approach to the technical framework. These papers were made available by the ACMA to the TLG members for comment and are available

on the ACMA's website. The ACMA had regard to the views expressed by the TLG members when preparing the Tx RAG Variation, Rx RAG Variation and ULOI Variation.

Draft versions of the Tx RAG Variation, Rx RAG Variation and ULOI Variation were released for public consultation on 13 February 2023. This was part of a broader consultation on draft allocation and technical instruments for the allocation of spectrum licences in the frequencies and areas specified in the Re-allocation Declaration. Consultation closed on 29 March 2023.

The ACMA received 12 responses. Ten of the responses commented on the proposed changes to the technical framework. Submissions were generally supportive of the changes proposed to the technical framework. Other than some minor corrections, the main issues raised were:

- coexistence arrangements for radiocommunications devices operated under the spectrum licences to be allocated with radio altimeters operating in the 4200 MHz to 4400 MHz frequency band (used as part of some aeronautical services); and
- radiofrequency (**RF**) filter expectations for fixed satellite service earth stations (**FSS ES**).

After considering submissions, the ACMA did not include provisions in the Tx RAG Variation that related to the management of interference to aeronautical services in the 4200 MHz to 4400 MHz frequency band.

The ACMA did not change provisions in the Tx RAG Variation that relate to RF filter expectations for FSS ES; the submissions in question suggested that more stringent expectations be in place for FSS ES. As other stakeholders have not had an opportunity to consider the submission, the ACMA considered it was not appropriate to adopt those more stringent expectations at this time; however, the ACMA may consider making a further variation to those provisions to change the RF filter expectations for FSS ES after conducting further consultation.

Regulatory impact assessment

An early assessment of the proposal to vary the technical framework instruments was conducted by the Office of Impact Analysis (**OIA**), based on information provided by the ACMA, for the purposes of determining whether a Regulation Impact Statement (**RIS**) would be required. OIA advised that a RIS would not be required because the proposed regulatory change is minor or machinery in nature – reference number OBPR22-01921.

Statement of compatibility with human rights

Subsection 9(1) of the *Human Rights (Parliamentary Scrutiny) Act 2011* requires the rule maker in relation to a legislative instrument to which section 42 of the LA applies (disallowance), to cause a statement of compatibility with human rights to be prepared in respect of that legislative instrument.

The statement of compatibility set out below has been prepared to meet that requirement.

Overview of the instruments

Section 262 of the Act permits the ACMA to make advisory guidelines about any aspect of radiocommunication or radio emissions.

The Tx RAG provides information and guidance to assist with the management of interference to radiocommunications receivers operating under apparatus, class and spectrum licences in or adjacent to the 3.4 GHz band caused by 3.4 GHz transmitters.

The purpose of Tx RAG Variation is to amend the Tx RAG so it applies in relation to the frequencies and areas specified in the Re- allocation Declaration, to update and incorporate guidance on the

management of interference with affected services, and to make some other minor changes to the Tx RAG.

The Rx RAG provides information and guidance to assist with the management of interference to radiocommunications receivers operating under spectrum licences in the 3.4 GHz band caused by radiocommunications transmitters operating under other licences issued in or near the 3.4 GHz band.

The purpose of the Rx RAG Variation is to amend the Rx RAG so it applies in relation to the frequencies and areas specified in the Re- allocation Declaration, and to make some other minor changes.

Section 69 of the Act requires each spectrum licence to include a condition which specifies that a radiocommunications transmitter must not be operated under the licence unless the requirements of the ACMA under Part 3.5 of the Act for registration of transmitters have been met.

Under subsection 145(1) of the Act, the ACMA may, if it is satisfied that the operation of a radiocommunications transmitter could cause an unacceptable level of interference to other radiocommunications devices, refuse to register the transmitter. The ULOI Determination sets out what is meant by an 'unacceptable level of interference' in relation to a radiocommunications transmitter operated under a spectrum licence issued in the 3.4 GHz band.

The ULOI Variation amends the ULOI Determination so it also covers the frequencies and areas specified in the Re- allocation Declaration, and to make some minor changes.

Human rights implications

The ACMA has assessed whether the Tx RAG Variation, Rx RAG Variation and ULOI Variation are compatible with human rights, being the rights and freedoms recognised or declared in the international instruments listed in subsection 3(1) of the *Human Rights (Parliamentary Scrutiny) Act 2011*.

Having considered the likely impact of the Tx RAG Variation, Rx RAG Variation and ULOI Variation and the nature of the applicable rights and freedoms, the ACMA has formed the view that the Tx RAG Variation, Rx RAG Variation and ULOI Variation do not engage any of those rights or freedoms.

Conclusion

The Tx RAG Variation, Rx RAG Variation and ULOI Variation are compatible with human rights as they do not raise any human rights issues.

Attachment A

Notes to the *Radiocommunications Advisory Guidelines (Managing Interference from Spectrum Licensed Transmitters – 3.4 GHz Band) Variation 2023 (No. 1)*

Section 1 Name

This section provides for the Tx RAG Variation to be cited as the *Radiocommunications Advisory Guidelines (Managing Interference from Spectrum Licensed Transmitters – 3.4 GHz Band) Variation 2023 (No. 1)*.

Section 2 Commencement

This section provides for the Tx RAG Variation to commence on the day after the day it is registered on the Federal Register of Legislation.

The Federal Register of Legislation may be accessed free of charge at www.legislation.gov.au.

Section 3 Authority

This section identifies the provision of the Act that authorises the making of the Tx RAG Variation, namely section 262 of the Act.

Section 4 Amendments

This section provides that Schedule 1 amends the Tx RAG.

Schedule 1 – Amendments

Item 1

The definition of ***3.4 GHz band*** in subsection 1.5(1) of the Tx RAG has been amended to cover the frequencies in the Re-allocation Declaration.

Item 2

Item 2 repeals the definitions and associated notes for ***RALI FX 14***, ***RALI FX 19*** and ***RALI MS 39***. These RALIs are no longer incorporated by reference in the Tx RAG.

Item 3

Item 3 inserts a definition for ***RALI MS 47*** and a note on where it can be found.

Item 4

This item amends the definition for the ***Spectrum Plan***. The Spectrum Plan, prepared under subsection 30(1) of the Act, is typically updated every four years, which also results in a name change. The amended definition ensures that the most recent plan is referenced.

Item 5

Item 5 includes a section that provides that, in the Tx RAG, unless the contrary intention appears:

- a reference to another legislative instrument is a reference to that other legislative instrument as in force from time to time; and

- a reference to any other kind of instrument or writing is a reference to that other instrument or writing as in force or existing from time to time.

Item 6

Item 6 substitutes "in specified parts of Australia" for "Australia-wide" in section 2.1 of the Tx RAG. This change reflects the fact that the 3.4 GHz band is not subject to spectrum licensing Australia-wide

Item 7

Item 7 updates the list of matters in relation to which the Tx RAG provides guidance for the management of interference, in section 2.3 of the Tx RAG.

Item 8

Item 8 repeals section 2.4 of the Tx RAG. The content of this section has been incorporated into section 2.3.

Item 9

Item 9 amends subparagraph 4.3(1)(c)(ii) of the Tx RAG to extend the upper frequency range in relation to which spectrum licensees need to consider cochannel coordination with earth receive stations. The frequency range is extended from 3700 MHz to 3800 MHz, to account for the frequencies specified in the Re-allocation Declaration.

Item 10

Item amends the heading of column 1 of Table 1 (in subsection 4.3(4) of the Tx RAG) to say "Frequency offset from appropriate frequency limit of licence for earth station receiver (MHz)".

Item 11

Item 11 removes the note under Table 1 (in subsection 4.3(4) of the Tx RAG), as a consequence of the changes in item 12.

Item 12

Item 12 inserts provisions in section 4.3 of the RAG, which provide updated guidance on the application of the RF filter characteristics specified in Table 1 in subsection 4.3(4). Table 1 sets out minimum filtering levels that are assumed to be employed by earth receive stations, for the purposes of considering whether they are suffering from interference from radiocommunications transmitters operated under spectrum licences in the 3.4 GHz band.

The earth receive stations will be assumed to use RF filters for different frequencies at different times, depending on whether the receiver licence that authorises the station was issued before or after 16 July 2022 (the date the Re-allocation Declaration commenced), whether the stations use the same antenna, and whether the stations are operated before or after 16 July 2027. The ACMA has generally stopped issuing earth receive licences that will be affected by these assumptions. This ensures new licensees either will not be impacted, or only apply with the knowledge of the assumptions that apply.

Items 13 to 16

Items 13 to 16 amend section 4.4 of the Tx RAG, so that it also applies to the frequency band 3700 MHz to 3800 MHz, as specified in the Re-allocation Declaration.

Items 17 and 18

Items 17 and 18 amend sections 5.1 and 5.2 of the Tx RAG to replace references to RALI FX14, RALI FX19 and RALI MS39 with a reference to RALI MS 47.

Item 19

Item 19 omits a reference to PMTS Class B receivers from section 5.2 of the Tx RAG, as there are no longer any PMTS class B licences issued in the 3.4 GHz band.

Items 20, 22 and 23

Items 20, 22 and 23 amend section 7.1 of the Tx RAG to replace references to the *Radiocommunications (Overseas Amateurs Visiting Australia) Class Licence 2008* and *Radiocommunications (Low Interference Potential Devices) Class Licence 2000* with references to the *Radiocommunications (Overseas Amateurs Visiting Australia) Class Licence 2015* and the *Radiocommunications (Low Interference Potential Devices) Class Licence 2015*, respectively.

Item 21

Item 21 amends subsection 7.1(1) of the Tx RAG, so that it also applies to the frequency band 3700 MHz to 3800 MHz, as specified in the Re-allocation Declaration.

Item 24

Item 24 replaces the existing note to section 9.2 of the Tx RAG, to indicate that the ACMA may vary RALI MS 44 to change the Earth Station Protection Zones specified in that RALI.

Items 25 to 27

Items 25 to 27 amend section 10 to extend the frequency range that protection requirements for Earth stations operating at the Uralla facility apply to. The lower frequency in subsection 10.2(1) is changed from 3600 MHz to 3400 MHz. As a result of this change, subsection 10.2(2) no longer applies and is omitted.

Item 28

Item 28 adds new Parts 11, 12 and 13 to the Tx RAG.

Part 11 provides guidance on the management of interference with adjacent frequency wireless broadband services in the 3400 MHz to 4000 MHz band.

Subsection 11.1(1) provides that the 3400 MHz to 3475 MHz band has been identified for use by highly localised wireless broadband services in urban areas.

Subsection 11.1(2) provides that there are arrangements for area-wide licences to operate in frequencies adjacent to the 3.4 GHz band.

Paragraph 11.2(a) provides that, to manage adjacent frequency interference between 3.4 GHz band spectrum licences and highly localised wireless broadband services in the 3400 MHz to 3475 MHz frequency band, the ACMA intends generally not to issue apparatus licences in the 3470 MHz to 3475 MHz frequency band.

Paragraph 11.2(b) provides that, to manage adjacent frequency interference between 3.4 GHz band spectrum licences and area-wide licences, the ACMA intends generally not to issue area-wide licences authorising the operation of radiocommunications transmitters in the 15 MHz of spectrum directly adjacent to a 3.4 GHz band spectrum licence.

Part 12 provides guidance on the management of interference with geographically adjacent area wide licences.

Section 12.1 provides that there are arrangements for area-wide licences to operate in remote areas in the 3.4 GHz band. These licences are typically used to provide wireless broadband services and can be near or geographically adjacent to a 3.4 GHz spectrum licence.

Section 12.2 provides that the device boundary criterion, as defined in the ULOI Determination, is the primary mechanism for managing interference across geographical boundaries from a spectrum licence to an area-wide licence. Geographically adjacent area-wide licensees and spectrum licensees are able to agree on the implementation of alternative measures to manage interference.

Part 13 provides guidance on the management of interference with aeronautical services.

Section 13.1 provides that the spectrum plan allocates the 4200 MHz to 4400 MHz frequency band to the aeronautical mobile service and aeronautical radionavigation service, as primary services. It states that that the operation of aircraft stations as radio altimeters in the 4200 MHz to 4400 MHz band is authorised under the *Radiocommunications (Aircraft and Aeronautical Mobile Stations) Class Licence 2016*. It also provides definition of aeronautical radionavigation service in Part 13 (the terms 'aeronautical mobile service' and 'aircraft station' are defined in the *Radiocommunications (Interpretation) Determination 2015*).

Section 13.2 provides the protection requirements that apply to radio altimeters and limits their applicability to radiocommunications transmitters operating in the 3700 MHz to 3800 MHz frequency band. For spectrum licences, it requires the operation of radiocommunications transmitters to adhere to the same co-existence with radio altimeters requirements that apply to the operation of radiocommunications transmitters under an area-wide licence, as detailed in RALI MS 47.

Attachment B

Notes to the *Radiocommunications Advisory Guidelines (Managing Interference to Spectrum Licensed Receivers – 3.4 GHz Band) Variation 2023 (No. 1)*

Section 1 Name

This section provides for the Rx RAG Variation to be cited as the *Radiocommunications Advisory Guidelines (Managing Interference to Spectrum Licensed Receivers – 3.4 GHz Band) Variation 2023 (No. 1)*.

Section 2 Commencement

This section provides for the Rx RAG Variation to commence on the day after the day it is registered on the Federal Register of Legislation.

The Federal Register of Legislation may be accessed free of charge at www.legislation.gov.au.

Section 3 Authority

This section identifies the provision of the Act that authorises the making of the Rx RAG Variation, namely section 262 of the Act.

Section 4 Amendments

This section provides that Schedule 1 amends the Rx RAG.

Schedule 1–Amendments

Item 1

Item 1 simplifies the text in paragraph 1.3(1)(b) of the Rx RAG.

Item 2

Item 2 replaces the definition of ***3.4 GHz band*** to include the 3400 MHz to 3425 MHz, 3492.5 MHz to 3542.5 MHz, and 3700 MHz to 3800 MHz frequency ranges.

Item 3

Item 3 repeals the definition of ***active antenna system*** as it is not used in the Rx RAG.

Items 4, 5 and 6

Items 4, 5 and 6 repeal the definitions of ***blocking***, ***RALI MS 39*** and ***restricted block***, and replace them with definitions of ***RALI MS 47*** and ***receiver blocking***.

Item 7

Item 7 repeals the definition of ***spurious response immunity*** as it is not used in the Rx RAG.

Item 8

Item 8 adds a new subsection 1.4(3) of the Rx RAG which provides that, in the Rx RAG, a reference to a part of the spectrum or a frequency band includes all frequencies that are greater than but not including the lower frequency, up to and including the higher frequency.

It also adds a new section 1.5 to the Rx RAG which provides that, in the Rx RAG, unless the contrary intention appears:

- a reference to another legislative instrument is a reference to that other legislative instrument as in force from time to time; and
- a reference to any other kind of instrument or writing is a reference to that other instrument or writing as in force or existing from time to time.

Item 9

Item 9 replaces subsection 3.1(2) of the Rx RAG to provide guidance on how to manage in-band interference with apparatus licences issued in spectrum covered by the Re-allocation Declaration after its commencement (16 July 2022). The relevant criteria for managing in-band interference from radiocommunications transmitters specified in subsection 3.1(2) is through the application of the device boundary criterion set out in RALI MS 47, as if the apparatus licence were an area wide licence.

Item 10

Item 10 repeals subsection 3.1(3) of the RX RAG, as its guidance on the guidance on the management of out-of-band interference is already contained in section 3.2.

Item 11

Item 11 makes a minor correction to subsection 3.1(4) of the RX RAG.

Item 12

Item expands the frequency range specified in paragraph 3.1(5)(a) of the Rx RAG to include the entire 3400 MHz to 3575 MHz frequency range.

Item 13

Item 13 amends paragraph 3.1(5)(a) of the Rx RAG, which sets out the ACMA's policy in relation to interference to radiocommunications receivers received from certain radiocommunications transmitters operating under apparatus licences. Previously, the ACMA policy was that the receivers were to accept interference from transmitters operating under apparatus licences issued before 14 December 2015. Item 13 changes the latest date of issue for such apparatus licences to 16 July 2022, which is the commencement of the Re-allocation Declaration. The ACMA considered that changing the date would have negligible impact on existing spectrum licensees, as apparatus licences issued in the period 14 December 2015 to 16 July 2022 have sufficient geographical separation from existing spectrum licence geographical boundaries.

Items 14 and 15

Items 14 and 15 make minor and consequential changes to paragraph 3.1(5)(b) of the Rx RAG.

Item 16

Item 16 inserts a new paragraph 3.1(5)(c) in the Rx RAG. The new paragraph states the ACMA's policy that a spectrum licensee is not afforded protection from in-band interference caused by a radiocommunications transmitter operating under an apparatus licence operating in the 3700 MHz to 3800 MHz frequency band if the apparatus licence was issued before 16 July 2022 (the commencement of the Re-allocation Declaration).

Item 17

Item 17 makes a consequential change to subsection 3.2(4) of the Rx RAG.

Item 18

Item 18 amends subitem (5)(a) of Schedule 1 to the Rx RAG, to change the upper frequency limit for the bandwidth to which the receiver blocking requirement in the subitem applies. The upper frequency limit is moved from 3740 MHz to 3860 MHz so it incorporates the frequencies covered by the Re-allocation Declaration.

Attachment C

Notes to the *Radiocommunications (Unacceptable Levels of Interference – 3.4 GHz Band) Amendment Determination 2023 (No. 1)*

Section 1 Name

This section provides for the ULOI Variation to be cited as the *Radiocommunications (Unacceptable Levels of Interference – 3.4 GHz Band) Amendment Determination 2023 (No. 1)*.

Section 2 Commencement

This section provides for the ULOI Variation to commence on the day after the day it is registered on the Federal Register of Legislation.

The Federal Register of Legislation may be accessed free of charge at www.legislation.gov.au.

Section 3 Authority

This section identifies the provision of the Act that authorises the making of the ULOI Variation, namely subsection 145(4) of the Act.

Section 4 Amendments

This section provides that Schedule 1 amends the ULOI Determination.

Schedule 1–Amendments

Item 1

Item 1 amends subsection 5(1) of the ULOI Determination so the definition of ***3.4 GHz band*** includes the 3700 MHz to 3800 MHz frequency range. As a result of the Re-allocation Declaration, spectrum licences may be issued in this range.

Items 2 and 3

Item 2 amends Step 2 of item 1 of Part 1 of Schedule 2 to the ULOI Determination (**Step 2**). The amendment provides greater clarity on how to determine the lowest value of 'm' for each radial in Step 2 when calculating the device boundary for a radiocommunications transmitter. This is consistent with similar instruments recently made by the ACMA.

Item 3 replaces the note under Step 2, to provide greater clarity on how to determine the end point of a radial when calculating the device boundary for a radiocommunications transmitter. This is consistent with similar instruments recently made by the ACMA.

Item 4

Item 4 amends Step 3 of item 1 of Part 1 of Schedule 2 to the ULOI Determination. The amendment provides greater clarity on how to determine the device boundary for a radiocommunications transmitter. This is consistent with similar instruments recently made by the ACMA.

Item 5

Item 5 makes a consequential change as a result of the amendment in item 3.