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Australian Communications and Media Authority

Wireless microphones—getting ready for 1 January 2015

Media kit

JANUARY 2014

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Background

Many community groups and businesses use wireless audio devices—such as wireless microphones and public announcement systems—for a range of purposes, including school assemblies, religious services, theatre and live music performances, sporting events and conferences.

Currently, many of these devices use spectrum located in the 694–820 MHz frequency range. But from 1 January 2015, it will be illegal to use these devices in this range as the spectrum will be used to deliver 4G mobile broadband services. Changes are also happening that will affect the supply of such devices into Australia.

The Australian Communications and Media Authority (the ACMA) wants to ensure all community groups and businesses understand the change and know what they should do to prepare. A range of easy-to-understand resources is available on the ACMA's online wireless microphones hub.

What's spectrum?

Spectrum is a valuable public asset used for a range of purposes, for example, mobile phones, television channels and wireless microphones. Spectrum is divided into frequency ranges called megahertz (MHz).

We are focusing on spectrum located in the 694–820 MHz frequency range, which is also known as the 'digital dividend' and is currently used by digital television services and wireless microphone users.

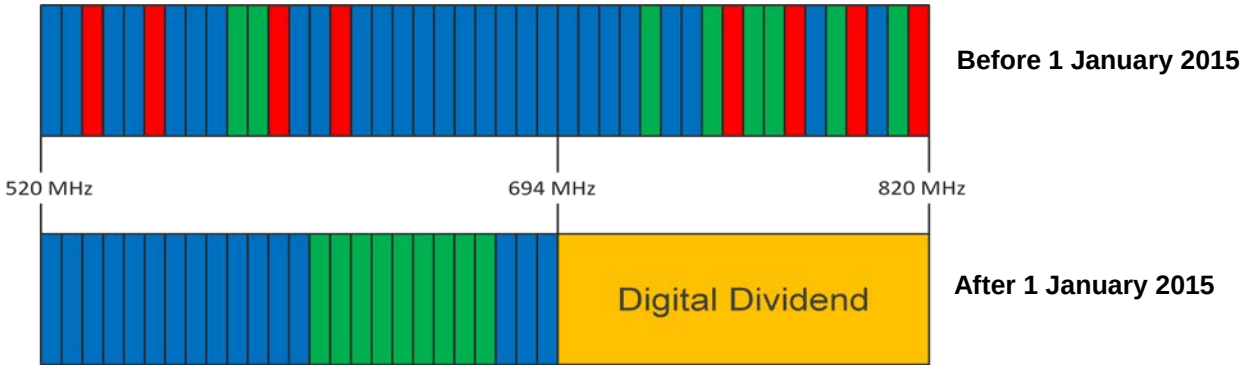
The ACMA and the government is undertaking a body of work to make the digital dividend available to deliver 4G services to meet Australia's growing demand for faster, greater coverage mobile broadband services.

To make the digital dividend available, Australia switched off its analog television services in December 2013.

In addition, digital television services are being relocated (or 'restacked') from the 694–820 MHz range so that it uses spectrum in the 520–694 MHz range. Restack will be completed by 31 December 2014. At the same time, the ACMA is working with community groups and businesses to relocate wireless microphone users from the digital dividend to other parts of the spectrum, such as the 520–694 MHz range.

An illustration of the digital dividend is shown on the next page.

Figure 1 Illustration of digital dividend before and after 1 January 2015



In Figure 1:

> The top row shows how spectrum in the 520–820 MHz range is currently being used.

> Analog television services are shown in red—these services ceased in December 2013.

> Digital television services are shown in green. By 31 December 2014, all digital television services will move (or 'restack') so that they use spectrum is below 694 MHz.

> The blue columns are unused spectrum. Wireless microphones can operate in this unused spectrum.

> The digital dividend (694–820 MHz) is shown in yellow.

What's changing?

From 1 January 2015, it will be illegal to use any wireless audio devices (including, wireless microphones and public announcement systems) in the 694–820 MHz frequency range. The ACMA is strongly encouraging users to start preparing for this change by checking whether their existing equipment will be legal to use after 31 December 2014.

From 17 September 2013, suppliers must include a warning label with each wireless audio device that operates in the 694–820 MHz range advising potential buyers the device will be illegal to use after 31 December 2014.

From 1 January 2014, suppliers will no longer be able to import, manufacture or sell wireless audio devices in Australia that operate in 694–820 MHz.

What does a wireless microphone look like?

This change affects wireless microphones and audio devices that operate in the 694–820 MHz range. Below are examples of devices likely to be affected. For more images, the ACMA has a photo gallery on its website.

Figure 2 Handheld microphone, headset and clip-on wireless microphones

Figure 3 Handheld wireless microphone with headset and body pack

Photos courtesy of Jands Pty Ltd

Figure 4 Wireless public address systems

Photos courtesy of Aerobic Microphones Australia

What do users need to do?

Before 31 December 2014, users will need to check their existing wireless microphones and audio devices to confirm whether they can still legally use it after this date.

The ACMA has fact sheets that provide information on the changes to users and suppliers and what they can do to prepare.

1. 'Plug and play' users—targeted to community groups, small businesses and people with a non-technical background. The name refers to the people who buy a wireless microphone and simply expects to plug it in to use it.
2. Professional users—targeted to people with some technical background, such as program making and special events, professional musicians and music venue managers.
3. Suppliers—targeted to businesses that import, manufacture or sell wireless audio transmitters.
4. Stakeholder engagement plan for 2013 and 2014—this sets out how the ACMA is educating community groups and businesses about the changes.

Copies of these fact sheets are also available in Attachment A.

In addition, FAQs are available for suppliers, providing further information on how the regulatory changes affect the supply of wireless audio devices into Australia.

How can I tell my community or business group about this change?

The ACMA is encouraging community and business groups to share information about the transition to their members.

You can use the following wording in your community or business newsletter, magazine or website:

> Many community groups and small businesses use wireless audio devices—such as wireless microphones and public announcement systems—for a range of purposes, including school assemblies, religious services, theatre and live music performances, sporting events and conferences.
>
> Currently, many of these devices use spectrum located in the 694–820 megahertz range. But from 1 January 2015, it will be illegal to use these devices in this range as the spectrum will be used to deliver 4G mobile broadband services.
>
> Find out more about the change and what you need to do to prepare by visiting the Australian Communications and Media Authority's wireless microphone hub which has a 'plug and play' fact sheet and, if you're not sure if you own these devices, there is also a photo gallery of the most common devices that will be affected by the change.

Where can I go for more information?

> Online wireless microphones hub—a 'one-stop shop' for information on the changes affecting the use and supply of wireless microphones.

> For people who aren't sure if they own a wireless microphone and other audio devices, there is a photo gallery of the most common devices that will be affected by the changes.

> Useful industry links—for trade-in deals for old equipment, free audits for people who aren't sure if their existing equipment will be affected by the change, and frequency finder tools.

> Free, monthly e-bulletin that provides updates on the ACMA's work on wireless microphones.

Media coverage

The ACMA's media releases on the changes:

> 6 January 2014—'Now hear this: wireless mic users get ready for switchover'

> 1 October 2013—'ACMA moves to protect wireless mic users'

> 17 September 2013—'Can you use your wireless mic in 2015?'

> 13 May 2013—'New frequency ranges for wireless microphones'

Media coverage is increasing as communities and businesses become aware of the changes:

> Lexy Sawides, *CNET Australia*, 'Australian wireless microphone frequencies become illegal in 2015', 23 September 2013.

> Lucy Battersby, *Sydney Morning Herald*, 'Older wireless microphones to become illegal', 17 September 2013.

> David Ramli, *Financial Review*, 'Wireless mics banned for 4G broadband', 11 September 2013.

Additional links to media coverage and case studies on how community groups and businesses are preparing for the changes can be found in Stakeholder engagement—what's new! on the ACMA's website.

Contact details

To request an interview, please contact: Emma Rossi, Media Manager, on (02) 9334 7719, 0434 652 063 or media@acma.gov.au. For all other enquiries, email freqplan@acma.gov.au.

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Wireless microphones—plug and play users

Important changes are happening to wireless audio transmitters—including wireless microphones—which will take effect from 1 January 2015. This fact sheet provides everything you need to know about the changes and what you can do to prepare.

Who uses wireless audio transmitters?

Many community groups and small businesses use wireless audio transmitters—such as wireless microphones, public announcement systems, in-ear monitoring systems and musical pick-ups—for a range of purposes, including:

> school assemblies and university lectures

> religious services

> theatre and live music performances

> auctions

> sporting events and gym classes

> museum and tourism activities

> ceremonies and conferences.

What's changing and why?

Many wireless audio transmitters currently operate in the spectrum located at frequency range 694–820 MHz. But from 1 January 2015, it will be **illegal** to use these devices in this range.

Spectrum is a valuable public asset that is used for a range of purposes; for example, mobile phones, television channels and wireless audio transmitters. Spectrum is divided into frequency ranges called megahertz (MHz). Unlike other users of spectrum, users of wireless audio transmitters don't pay any fees or ongoing charges to use the spectrum.

In 2010, the government declared the 694–820 MHz frequency range as the 'digital dividend', to be used for new communication services from 1 January 2015. This means that devices currently operating in this frequency—such as wireless microphones—must use a different range from 1 January 2015.

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The ACMA is working with community and industry groups now so that they can start planning for the change.

What do I need to do?

Before 1 January 2015, you need to check if you can retune your wireless audio transmitters to use a different frequency range. The range available in your area will depend on television broadcasting arrangements, which are changing and can vary in different locations.

Check your user manual or contact your supplier to find out if your wireless audio transmitter can be retuned so that it operates in a different frequency range. If it can't be retuned, you'll need to buy new equipment—but make sure that any new device you purchase does **not** operate in 694–820 MHz.

What frequency ranges can I use instead?

The main frequency ranges that can be used to operate wireless audio transmitters from 1 January 2015 are 520–694 MHz and 1790–1800 MHz.

However, changes to television broadcasting arrangements may also affect what frequency range you can use in your area. Suppliers can advise you on the most suitable frequency range for your device, depending on where you plan to use it.

What should I do with my old wireless equipment?

Planet Ark's Recycling near you website can identify your nearest electronic waste disposal service.

What laws govern the use of wireless audio transmitters?

Anyone using a wireless audio transmitter is bound by the rules set out in the Low Interference Potential Devices (LIPD) Class Licence.

As LIPD class licensees don't have to pay fees to use the spectrum, they operate on a 'no interference' and 'no protection' basis. Users must ensure that their devices don't cause interference to other radiocommunications devices. They also have no protection from interference or changes that may affect them.

The LIPD Class Licence also sets out what spectrum can be used for wireless audio transmitters.

More information

> Contact your supplier about your specific device to find out the most suitable frequency range for your location.

> Subscribe to our free monthly e-bulletin, visit the wireless microphones hub on our website or email us at freqplan@acma.gov.au.

The ACMA would like to thank Jands Pty Ltd for providing the images of wireless audio transmitters.

Last updated: August 2013.

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Wireless audio transmitters—professional users

Important changes are happening to wireless audio transmitters which take will effect from 1 January 2015. This fact sheet provides everything you need to know about the changes and what you can do to prepare.

Who uses wireless audio transmitters?

Wireless audio transmitters—for example, wireless microphones, in-ear monitoring systems, public announcement systems and musical pick-ups—are used by a wide range of industry professionals and venues, including:

> performing arts organisations

> concert promoters and festival organisers

> event managers and planners

> musicians and music venues

> convention centres and venues for hire

> public transport providers

> large-scale sporting events

> television and radio broadcasters.

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What's changing and why?

Many wireless audio transmitters currently operate in the spectrum located at frequency range 694–820 MHz. But from 1 January 2015, it will be **illegal** to use these devices in this range.

Spectrum is a valuable public asset that is used for a range of purposes; for example, mobile phones, television channels and wireless audio transmitters. Spectrum is divided into frequency ranges called megahertz (MHz). Unlike other users of spectrum, users of wireless audio transmitters don't pay any fees or ongoing charges to use the spectrum.

In 2010, the government declared the 694–820 MHz frequency range as the 'digital dividend', to be used for new communication services from 1 January 2015.

This means that devices currently operating in this frequency—such as wireless audio transmitters—must use a different range from 1 January 2015.

The ACMA is working with community and industry groups now so that they can start planning for the change.

What do I need to do?

Before 1 January 2015, you need to check if you can retune your wireless audio transmitters to use a different frequency range. The range available in your area will depend on television broadcasting arrangements, which are changing and can vary in different locations.

Check your user manual or contact your supplier to find out if your wireless audio transmitter can be retuned so that it operates in a different frequency range. If it can't be retuned, you'll need to buy new equipment—but make sure that any new device you purchase does **not** operate in 694–820 MHz.

What frequency ranges can I use instead?

The main frequency ranges that can be used to operate wireless audio transmitters from 1 January 2015 are 520–694 MHz and 1790–1800 MHz. A **full list of other available frequency ranges** is on the ACMA website.

How does 'restack' affect what spectrum is available below 694 MHz?

Digital television services currently use spectrum in the digital dividend and are also moving to a different frequency range by 31 December 2014. These television services are being 'restacked' below 694 MHz.

The government's intention is that restack will be completed by 31 December 2014. The **restack channel chart** and **timetable** set out where and when digital television services will be restacked across Australia. This information should enable wireless audio transmitter users to determine what spectrum below 694 MHz will be available in a given area.

Some suppliers of wireless audio transmitters also have other **resources** to help you find out what spectrum is available, given your area and chosen transmitter.

What happens if I continue to use wireless audio transmitters in the digital dividend after 31 December 2014?

The ACMA will continue our education and compliance activities after 31 December 2014, to ensure that wireless audio transmitters are no longer being used in the digital dividend. This work will form part of the ACMA's prioritised compliance activities.

What should I do with my old wireless equipment?

Planet Ark's Recycling near you website can identify your nearest electronic waste disposal service.

What laws govern the use of wireless audio transmitters?

Anyone using a wireless audio transmitter is bound by the rules set out in the Low Interference Potential Devices (LIPD) Class Licence.

As LIPD class licensees don't have to pay fees to use the spectrum, they operate on a 'no interference' and 'no protection' basis. Users must ensure that their devices don't cause interference to other radiocommunications devices. They also have no protection from interference or changes that may affect them.

The LIPD Class Licence also sets out what spectrum can be used for wireless audio transmitters.

More information

> Contact your supplier about your specific device to find out the most suitable frequency range for your location.

> Subscribe to our free monthly e-bulletin, visit the wireless microphones hub on our website or email us at freqplan@acma.gov.au.

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Last updated: August 2013.

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Wireless audio transmitters—suppliers

Does your business manufacture, import or sell wireless audio transmitters? From 1 January 2015, it will be illegal to operate these devices in the 694–820 MHz frequency range. This fact sheet explains all the important changes that may affect your business as a supplier of these devices.

What are wireless audio transmitters?

Wireless audio transmitters include wireless microphones, in-ear monitoring systems, public announcement systems and musical pick-ups.

What's changing and why?

Many wireless audio transmitters currently operate in the spectrum located at frequency range 694–820 MHz. In 2010, the government declared this range as the 'digital dividend' to be used for new communication services from 1 January 2015.

To protect these new services from interference, it will be illegal to use wireless audio transmitters in the digital dividend from 1 January 2015.

To prevent the supply of these devices into Australia and stop customers from buying them, new laws have been introduced. The ACMA is working with industry and users of wireless audio transmitters to make them aware of the key changes and dates, which are summarised in the timeline on the following page.

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Date	Change
17 September 2013	A wireless audio transmitter that operates in the digital dividend and is imported or manufactured *after* this date must include a brief written statement on its packaging explaining that it cannot be operated in this frequency range after 31 December 2014.
1 January 2014	Wireless audio transmitters that operate in the digital dividend cannot be *imported into or manufactured* for supply in Australia. Such transmitters will be considered 'non-standard' devices and illegal to supply in Australia. Transmitters that have been imported or manufactured between 17 September and 31 December 2013 can continue to be *sold* in Australia. However, these transmitters must include a brief written statement.
1 January 2015	It will be illegal to operate wireless audio transmitters in the digital dividend.

What must I include in the brief written statement?

The statement must say:

> *This device operates under an ACMA class licence and must comply with all the conditions of that licence including operating frequencies. Before 31 December 2014, this device will comply if it is operated in the 520–820 MHz frequency band. WARNING: After 31 December 2014, in order to comply, this device must not be operated in the 694–820 MHz band.*

The statement must be prominently displayed on the outside of the product's package, be at least 5 mm high and be printed in bold type.

I have stock of wireless audio transmitters that operate in the 694–820 MHz range. Can I still sell them and what do I need to tell potential buyers?

Transmitters that have been imported or manufactured before 1 January 2014 can continue to be sold in Australia. However, these transmitters must include a brief written statement about their limited use after 31 December 2014.

It would be good practice to also inform potential buyers about the limited use of such transmitters so they can make an informed decision before they make their purchase.

Under consumer protection laws, businesses cannot make statements that are incorrect or likely to create a false impression. If buyers believe you have misled them or withheld information, they may take action against you, including lodging a complaint with the Australian Competition and Consumer Commission or their state or territory fair trading agency.

What can I do with the wireless audio transmitters that I cannot sell?

Planet Ark's Recycling near you website can identify your nearest electronic waste disposal service.

What happens if I do not comply with the changes that are outlined in the table?

The ACMA will undertake education and compliance activities to ensure that suppliers include a brief written statement with each wireless audio transmitter and that such devices are no longer imported or manufactured for supply in Australia from 1 January 2014. This work will form part of the ACMA's prioritised compliance activities.

What frequency ranges can wireless audio transmitters use instead?

The main frequency ranges that can be used to operate wireless audio transmitters from 1 January 2015 are 520–694 MHz and 1790–1800 MHz. A full list of other available frequency ranges is on the ACMA website.

What information will users of wireless audio transmitters be given?

Users of wireless audio transmitters will be advised to:

> Check their user manuals or contact their supplier to determine whether their devices operate in the digital dividend.

> Check if they can retune their device to use a different frequency range. If they cannot retune, they will need to buy new equipment that does **not** operate in the 694–820 MHz frequency range.

> Consider buying equipment that can be retuned to the widest frequency range.

> Read the fact sheets for plug and play and professional users.

More information

> Read the FAQs for suppliers or visit the wireless microphones hub on our website.

> Subscribe to our free monthly e-bulletin or email us at freqplan@acma.gov.au.

The ACMA would like to thank Jands Pty Ltd for providing the images of wireless audio transmitters.

Updated: September 2013