

700 MHz: Auction Catalogue

24 October 2013

ISBN 978-0-478-41701-2

newzealand.govt.nz



RADIO FREQUENCY AUCTION No. 12

CALL FOR BIDS

On behalf of the Chief Executive of the Ministry of Business, Innovation & Employment and with his

authority, I give notice of intention to conduct an auction of Management Rights commencing at

10.00 am, Tuesday, 29 October 2013 in accordance with the Terms and Conditions attached to this

notice. Those rights are to be transferred under section 42 of the Radiocommunications Act 1989

("the Act") in Lots as specified in Schedules 1 and 2 to the Terms and Conditions (such transfer

subject to the requirements of the Management Rights Contract discussed below).

The Management Rights to be sold by auction are subject to the provisions of the

Radiocommunications Act 1989, together with the Radiocommunications Regulations 2001. Before

the auction commences, prospective bidders should familiarise themselves thoroughly with that Act

and those Regulations, as well as the Terms and Conditions and Management Rights Contract (into

which Provisionally Successful Bidders are required to enter and which contains acquisition limits,

requirements for implementing services, and payment provisions).

Without limit, the Management Rights may be suitable for telecommunications services.

Prospective bidders are advised to seek specific legal advice from a qualified professional person

before undertaking any action in reliance on the contents of this publication.

Dated at WELLINGTON this 24th day of October 2013.

Len Starling

Manager, Radio Spectrum Policy and Planning Resources, Energy and Communications Branch

Infrastructure and Resource Markets

MBIE-MAKO-9084904

Page ii

TABLE OF CONTENTS

1	INTERPRETATION	2
1.1	Defined Terms	
1.2	Additional definitions relating to Associations	2
1.5	Construction	
2	AMENDMENTS TO THIS CALL FOR BIDS	6
3	ACQUISITION SUBJECT TO THE ACT	6
	·	
4	COMMERCE ACT 1986 – EFFECT OF BREACH	е
5	REGISTRATION AS A BIDDER	7
5.1	Who may bid	7
5.2	Prospective bidders to complete registration form	
5.3	Deadline to provide form RFA1	
5.4	Auction Manager to advise of successful registration	7
5.5	Bidders to provide details of principals	
5.6	Auction Manager to publish bidder principal details	8
5.7	Bidders to advise of associations with other bidders	
5.8	Auction Manager to publish details of associated bidders	8
5.9	Bids not accepted or invalid if incorrect information provided	8
6	DEPOSITS	9
6.1	Bidders to provide deposits	9
6.2	Deposits from Provisionally Successful Bidders held securely	9
6.3	Return of deposits to unsuccessful bidders	9
7	THE LOTS	
7.1	Schedules 1 and 2 contain details of Lots	
7.2	Reserve price	
7.3	Creation of Licences	
7.4	Incumbent Licences	
7.5	No representation regarding suitability	10
8	THE AUCTION	
8.1	Combinatorial Clock Auction	
8.2		
8.3	Rounds held according to time schedule	
8.4	Clock Round bidding requirements	
8.5	Clock Round bids are unconditional	
8.6	Advice of Clock Round outcome	
8.7	Auction Manager will vary the price for subsequent Clock Rounds	
8.8	Completion of Clock Rounds	12
8.9	Commencement of Supplementary Rounds	
8.10		
	Lots available in Supplementary Rounds	
	Acquisition Limit altered for Supplementary Rounds	
	Supplementary Round bidding requirements	
	Advice of Supplementary Round outcome	
	Auction Manager will vary the price for subsequent Supplementary Rounds	
	Completion of Supplementary Rounds	
	Assignment Round bidding	
	Associated Bidders to inform of intention to share spectrum	
ช.19	Auction Manager to identify options for contiguous Lots	14

	Not all options for contiguous Lots available	
	Assignment Round bidding requirements	
	Result of Assignment Round	
	Tied bids	
	Conclusion of the auction	
	Bids must meet requirements to be valid	
	Bids by Ministry employees invalid	
	Bidders to advise of Technical Difficulties	
8.28	Auction Manager may halt auction if Technical Difficulty arises	15
8.29	Auction Manager may choose to not conclude auction	16
_		
9	ACQUISITION LIMIT APPLIES TO BIDDING	
9.1	Acquisition Limit	
9.2	Bidders must not bid if success would exceed Acquisition Limit	
9.3	Associate Groups bidding separately	
9.4	Crown has no obligation to notify about Acquisition Limit	16
40	WITHDRAWAL OF LOTS	4-7
	WITHDRAWAL OF LOTS	
	Auction Manager may withdraw Lots	
	Withdrawals to be announced	
10.3	No claims if Lots withdrawn	17
11	POST AUCTION PROCESSES	17
	Provisional Auction Results Announced	
	Statutory Declaration to be provided confirming matters	
11.3	Changes to details in statutory declaration	17
12	SETTLEMENT REQUIREMENTS	17
	Settlement amount	
	Invoices to be provided	
	GST is payable	
	Payment Option	
	Payment Plan	
	Payment in full by bank cheque or electronic funds transfer	
	Payment in full within 40 Working Days of invoice	
	Management Rights Contract is a condition of settlement	
	Management Rights Contract conditional on security being given	
	Contract imposes acquisition limit and implementation obligation	
	CANCELLATION AND LIABILITY	
	Cancellation events	
13.2	Effect of cancellation event	20
1 /	EARLY MANAGEMENT RIGHT TO BE TRANSFERRED TO PURCHASER	21
	Management Right will be transferred	
	Transfer in accordance with payment plan	
14.3	Ability to nominate licence and Management Right holder	21
15	PUBLICATION OF FINAL RESULTS AND OTHER INFORMATION	21
	Results published	
15.2	Agreement to Publication of Results	22
	Information relating to bids	
16	CROWN NOT LIABLE	22
	NOTICES	
17.1	Notices by bidders to be in writing	22

17.2 Notices to meet requirements to be effective	22
17.3 Email notices	
17.4 Timing of Notices and Working Days	
SCHEDULE 1 – SCHEDULE OF LOTS	24
SCHEDULE 2 – RECORDS OF MANAGEMENT RIGHTS	
SCHEDULE 3 – INCUMBENT LICENCE	
SCHEDULE 4 – EXAMPLE STATUTORY DECLARATION	63
SCHEDIU E 5 _ AUCTION MANAGER CONTACT DETAILS	64



Version number	Date of publication	Summary of changes
1	11 September 2013	(none)
2	20 September 2013	Changes to the definition of Auction Message System, and to clauses 5.3, 6.1, and 17.3.
3	27 September 2013	 Correction of mistake in clause 5.5; changes to clauses 5.5, 5.6, 5.7, and 5.8 (references to Registered Bidders replaced with 'parties that have submitted registration'; changes to clause 6 (deposits); changes to clause 14 (transfer of management rights to purchaser); correction of formatting error on page 31; correction of mistake in upper boundary AFEL on page 49; changes to upper boundary frequency AFELS in Schedule 2 (all instances of '-62.0 dBW at 807.000 MHz to -62.0 dBW at 849.000 MHz' in all management rights changed to '-62.0 dBW at 807.000 MHz to -62.0 dBW at 825.000 MHz).
4	17 October 2013	 Removed all references to auction software and Auction Message System; simplified clause 8.3 relating to round schedule; removed 'number' from clause 8.6; removed clause 8.26 'Onscreen acceptance of bid is not determinative'.
5	24 October 2013	Change to all records of management rights in Schedule 2, clause 5, paragraph 4, to clarify statement.

TERMS AND CONDITIONS

The Terms and Conditions applicable to this auction are as follows:

1 INTERPRETATION

1.1 **Defined Terms**

In these Terms and Conditions, the following terms have the following meanings.

"Acquisition Limit" A limit on the number of Lots able to be purchased in this auction.

This number may be varied at the discretion of the Auction

Manager;

"Act" The Radiocommunications Act 1989, as amended from time to time;

"Agreement" Includes an agreement, arrangement or understanding whether:

(a) formal or informal or partly formal and partly informal; or

(b) written or oral or partly written and partly oral; or

(c) having legal or equitable force or not, and whether or not based

on legal or equitable rights;

"Associate" and "Associate Group" have the meanings given in clause 1.2;

"Auction Manager" The person designated by the Chief Executive as the Auction

Manager from time to time and whose contact details are provided

to Registered Bidders;

"Banker's A Banker's Certificate of Undertaking is an absolute guarantee given by the issuing bank to make payment up to the face value of the

by the issuing bank to make payment up to the face value of the certificate on demand by the Ministry without further reference to

the Registered Bidder;

"Business" A business that relates to or includes (in whole or in part) the

holding of radio frequency spectrum licences or Management Rights

or the provision of telecommunications services;

"Chief Executive" The Chief Executive of the Ministry of Business, Innovation &

Employment and his or her delegate;

"Clause" A clause of these Terms and Conditions;

"Conditional The Management Rights that commence 12 March 2020 and end on

Management Right" 28 November 2031;

ianagement Night 20 November 203.

"Controlling In relation to any Management Right, an interest which results in Interest" the direct or indirect control of any radio frequency spectrum the

subject of that Management Right, including (to avoid doubt) the non-exclusive right for any person to use that spectrum on arm's length commercial terms where that frequency is controlled directly

or indirectly by another person;

"Crown" has the meaning given in the Public Finance Act 1989 and includes

the Chief Executive (and the Crown acting by and through the Chief Executive) and any other officer of the Ministry of Business,

Innovation & Employment;

"Early Management

Right"

The Management Rights in Schedule 2 that end on 11 March 2020;

"GST" Goods and services tax within the meaning of the Goods and

Services Act 1985;

"Incumbent Licence" A licence that has been registered for use within the bands

703-748 MHz and 758-803 MHz and is described in Schedule 3;

"Lot" A Lot comprising Management Rights recorded under the Act over

the range of frequencies described as part of that Lot in Schedule 1;

"Management Rights

Contract "

The Contract to be entered into between the Chief Executive and each Provisionally Successful Bidder for Lots;

"Ministry" The Ministry of Business, Innovation and Employment and any other

government department given responsibility for the auction from

time to time;

"Provisionally Successful Bidder"

A Registered Bidder who has made a valid bid in the final Clock

Round and/or final Supplementary Round;

"Registered Bidders" Those persons whose registration as a bidder has been advised as

accepted by the Auction Manager under clause 5.4;

"Registered Bidder's

Pack"

The information provided by the Auction Manager to Registered

Bidders on registration under clause 5.4;

"Related Body Corporate"

A body corporate is related to another body corporate if:

- (a) the other body corporate is its holding company or subsidiary within the meaning of sections 5 and 6 of the Companies Act 1993; or
- (b) at least 20% of its issued shares, other than shares that carry no right to participate beyond a specified amount in a distribution of either profits or capital, is held by the other body corporate and bodies corporate related to that other body corporate (whether directly or indirectly, but other than in a fiduciary capacity); or
- (c) at least 20% of the issued shares of each of them, other than shares that carry no right to participate beyond a specified amount in a distribution of either profits or capital, is held by shareholders or members of the other (whether directly or indirectly, but other than solely in a fiduciary capacity); or
- (d) the businesses of the bodies corporate have been so carried on that the separate business of each body corporate, or a substantial part of it, is not readily identifiable; or
- (e) there is another body corporate to which both bodies corporate are related;

"Roaming An agreement between two or more companies that provides the Agreement" ability for a customer to automatically make and receive voice calls,

ability for a customer to automatically make and receive voice calls, send and receive data, or access other services, including home data services, when travelling outside the geographical coverage area of

the home network, by means of using a visited network;

"Schedule" A Schedule to these Terms and Conditions;

"Successful Bidder" A Provisionally Successful Bidder that has fulfilled the requirements

in clauses 11.2, 11.3, 12.7, 12.8, and 12.9 (and an event in clause

13.1 has not occurred);

"Technical Difficulty" A difficulty relating to the operation of any hardware or software

associated with the computer system, or internet browser belonging to or operated by any Registered Bidder, the Ministry, or any contractor to the Ministry involved in running the auction, and includes any interruption in the operation of the internet as a

medium of communication affecting the auction;

"Terms and Conditions"

These Terms and Conditions, including the Schedules attached to it;

and

"Working Day" Between the hours of 8.30am to 5.00pm on any day that is not a

Saturday or a Sunday or a day that is a public holiday within the

meaning of section 44 of the Holidays Act 2003.

1.2 Additional definitions relating to Associations

For the purposes of these Terms and Conditions, person A is an Associate of person B (and vice versa) if:

- (a) person A is a body corporate, and person B is:
 - (i) a director of that body corporate; or
 - (ii) a Related Body Corporate of that body corporate; or
 - (iii) a director of a Related Body Corporate of that body corporate; or
- (b) person A is in the same immediate family as person B (including a spouse, civil union partner, de facto partner, child (including step-child), parent (including step-parent) or sibling (including step-siblings and half-siblings) of person B); or
- (c) person A is a nominee or trustee for person B; or
- (d) person A is a director of a body corporate, or person A holds any voting power in the body corporate, and person A and person B are parties to an agreement relating to:
 - (i) the control of that body corporate; or
 - (ii) at least 20% of the voting power in that body corporate; or
- (e) person A holds or controls directly or indirectly at least 20% of the voting power, or at least 20% of the issued shares, in person B; or

- (f) person B (or a director, employee or other Associate of person B) is the trustee of a trust acting in that capacity and person A is a settlor, beneficiary, or trustee, of that trust; or
- (g) person A is a person who, in making a decision or exercising a power materially affecting a Business, is accustomed, or under an obligation, or proposes or is likely (in the Chief Executive's sole opinion, which is final), to act in accordance with the directions or instructions or wishes of person B; or
- (h) person A and person B are acting, or propose or are likely to act (in the Chief Executive's sole opinion, which is final), jointly or in concert in relation to a Business; or
- (i) person A (being a person other than the Chief Executive) and person B are parties to an Agreement that:
 - (i) relates directly or indirectly to the bidding strategy to be adopted by either or both of persons at the auction; or
 - (ii) entitles one of the persons to a substantial degree of influence, or the right to obtain a substantial degree of influence, over radio frequency spectrum covered by the Lots and in respect of which the other person is or will be (subject to these Terms and Conditions) a manager or rightholder under the Act; or
- (j) person A is an Associate of another person that is an Associate of person B under these Terms and Conditions, including an Associate in a chain of Associates,

and Associate Group means a Registered Bidder for Management Rights under these Terms and Conditions together with any Associate of that bidder that is also a Registered Bidder for Management Rights under these Terms and Conditions. For the avoidance of doubt, a Registered Bidder for Management Rights is, by itself, considered to be an Associate Group under these Terms and Conditions if it has no Associate that is also a Registered Bidder.

1.3 Exceptions to Associations

For the avoidance of doubt, the following types of agreements are not Associations for the purposes of the 700 MHz auction:

- (a) Roaming Agreements;
- (b) Agreements under the Rural Broadband Initiative, including the Rural Broadband Agreements dated 20 April 2011 between Telecom New Zealand Limited and the Crown, and between Vodafone New Zealand Limited and the Crown.

1.4 Associates will be held to sum of implementation requirements

Associates and Associated Groups will be held to the implementation requirement at the level of the total number of Lots of their combined Successful Bids.

If an Associated Group comprises a Bidder that is an existing cellular network operator and a Bidder that does not operate a cellular network, the Associated Group will be held to the implementation requirement for existing operators.

1.5 Construction

In these Terms and Conditions:

- (a) a reference to "including" or similar phrases does not imply any limitation;
- (b) a reference to a person includes an individual, body corporate or unincorporated body of persons;
- (c) the singular includes the plural, and vice versa;
- (d) a reference to \$ or dollars is a reference to New Zealand currency;
- (e) the headings and clause and sub-clause headings in these Terms and Conditions are for convenience only and have no legal effect; and
- (f) where any word or phrase has been given a defined meaning, any other part of speech or other grammatical form in respect of that word or phrase has a corresponding meaning.

2 AMENDMENTS TO THIS CALL FOR BIDS

This call, including these Terms and Conditions, may be amended or revoked by the Chief Executive in whole or in part, and at any time, by notice on the Ministry's website (www.rsm.govt.nz) or by email notice to Registered Bidders.

3 ACQUISITION SUBJECT TO THE ACT

These Terms and Conditions, and any Management Rights acquired under these Terms and Conditions, are subject to all legal requirements that apply to the acquisition and holding of Management Rights created under the Act, including section 138 of the Act which provides that section 47 of the Commerce Act 1986 (relating to acquisitions of assets of a business) applies to the acquisition of Management Rights in relation to the spectrum.

4 COMMERCE ACT 1986 – EFFECT OF BREACH

4.1 No warranty

The Ministry makes no warranty that an acquisition within the Acquisition Limit complies with section 47 of the Commerce Act 1986.

4.2 Ministry indemnified

Every Registered Bidder indemnifies the Ministry against any claim, liability, loss or expense (including legal fees on a solicitor own client basis) brought or threatened against, or incurred by the Ministry, in the event that the purchase of the Lot, or Lots, by the Registered Bidder breaches, or is alleged to breach, the Commerce Act 1986.

5 **REGISTRATION AS A BIDDER**

5.1 Who may bid

Persons may bid only if they:

- (a) are Registered Bidders; and
- (b) have disclosed the information required to be disclosed to the Auction Manager under clauses 5.5 and 5.7; and
- (c) bid in a manner that meets the requirements of clauses 8.4, 8.13 and 8.21.

5.2 Prospective bidders to complete registration form

Persons wishing to register as a bidder in this auction must complete form RFA1, which may be downloaded from the Ministry's website or obtained from the Auction Manager. By submitting form RFA1, the person agrees to be bound by these Terms and Conditions.

5.3 **Deadline to provide form RFA1**

Form RFA1 must be received by the Auction Manager no later than 4.00 pm on 3 October 2013.

The postal address for the delivery of form RFA1 and deposit is:

Auction Manager (700 MHz)
Resources, Energy and Communications Branch
Ministry of Business, Innovation and Employment
PO Box 1473
WELLINGTON 6140

The address for hand delivery of form RFA1 and deposit is:

Auction Manager (700 MHz)
Resources, Energy and Communications Branch
Ministry of Business, Innovation and Employment
33 Bowen St
Wellington 6011

5.4 Auction Manager to advise of successful registration

The Auction Manager will advise applicants of their successful registration, and will issue a Registered Bidder's Pack which will include documentation required for participation in this auction.

5.5 Bidders to provide details of principals

A Registered Bidder that is:

- (a) not a publicly listed company is required to disclose the following information to the Auction Manager no later than 4.00 pm on the date specified in Clause 5.3:
 - (i) the identity or identities of its principals and ultimate beneficial owners; and
 - (ii) any other information that the Auction Manager requires to confirm that Registered Bidder's structure, ownership, or Associates.
- (b) a publicly listed company is required to disclose the identity of any person with a shareholding of 5% or more in that company no later than 4.00 pm on the date specified in Clause 5.3.

5.6 Auction Manager to publish bidder principal details

The Auction Manager will publish the information received from Registered Bidders under clause 5.5 to all Registered Bidders on the next Working Day after the date specified in clause 5.3.

5.7 Bidders to advise of associations with other bidders

Registered Bidders shall notify the Auction Manager before 4.00 pm on the fourth Working Day after the date specified in Clause 5.3 whether or not they are an Associate of any other Registered Bidder. If a Registered Bidder provides notification to the Auction Manager under this clause, the notification must include:

- (a) the identities of the Registered Bidder(s) that are their Associate(s); and
- (b) details of how any associations arise.

5.8 Auction Manager to publish details of associated bidders

The Auction Manager will provide to Registered Bidders on or before the sixth Working Day after the date specified in Clause 5.3 the composition of any Associate Groups and the identities of any disclosed principals or ultimate beneficial owners as advised to the Auction Manager. Registered Bidders must advise the Auction Manager of any changes in the composition of their Associate Groups as and when they arise up to, and including, the completion date of the auction. The Auction Manager will provide updates to all Registered Bidders if the Auction Manager becomes aware that the composition of any Associate Group changes or that any new Associate Group has been formed prior to completion of the auction.

5.9 Bids not accepted or invalid if incorrect information provided

If, in the opinion of the Auction Manager, any information given by a Registered Bidder to the Auction Manager under clause 5.5, 5.7, or 5.8 omits a material particular, or it becomes incorrect or misleading, or is not provided within the required timeframe then (without limitation to any other legal rights and remedies available to the Crown) the Auction Manager may refuse to accept any bid from the Associate Group of the Registered Bidder (including, to avoid doubt, the Registered Bidder) at the auction or may choose to declare any bid invalid.

5.10 Bidders to advise of existing networks

If a person or company, or their Associate under the terms in clause 1.2, owns and/or operates an existing cellular network in New Zealand as at 11 September 2013 they must advise the Ministry of this when they submit the form RFA1.

Such a person or company will then be required to work in good faith with the Ministry to determine the number of rural cellsites in operation at 11 September 2013, and therefore the number of rural cellsites required to be upgraded under the implementation requirement.

The number of rural cellsites required to be upgraded will be included in the Management Rights Contract.

6 **DEPOSITS**

6.1 Bidders to provide deposits

A deposit of five million dollars (\$5,000,000) is required as a part of the bidder registration process. The preferred form of deposit is a currently dated Banker's Certificate that has no expiry date. If a party requires an alternative form of deposit they must seek the agreement of the Chief Executive at the time they register. Alternative forms of deposit will only be agreed if the Chief Executive is satisfied that they provide equivalent value and continuous security for the Crown.

Registration will be confirmed once a deposit is provided.

The deposit must be received by the Auction Manager, at the address provided in clause 5.3, no later than 4.00 pm on 15 October 2013.

6.2 Deposits from Provisionally Successful Bidders held securely

Deposits paid by Provisionally Successful Bidders will be held secure until that bidder has made payment either in full, or the first part payment, under clause 12.7. Upon such payment, the deposit will be returned to the bidder, together with a letter of release to the bank if appropriate to the form of deposit.

Provisionally Successful Bidders may elect to use their deposits as part payment of the payment in full, or first part payment. Provisionally Successful Bidders must inform the Auction Manager if they intend to use the deposit as part payment no later than 10 Working Days after the names of the Provisionally Successful Bidders have been published.

6.3 Return of deposits to unsuccessful bidders

Deposits provided by unsuccessful Registered Bidders will be held securely. Bankers' Certificates will be returned to unsuccessful Bidders, together with a letter of release to the bank if appropriate to the form of deposit, after the names of Provisionally Successful Bidders have been published.

7 THE LOTS

7.1 Schedules 1 and 2 contain details of Lots

Lots are subject to any restriction specified in these Terms and Conditions, including Schedules 1, 2, and 3 as applying to that Lot. In particular, Registered Bidders should note the commencement and expiry dates for the Management Rights and the licence that is registered in relation to those Management Rights (including the licence expiry date). Each Lot comprises four Management Rights: two Early Management Rights, and two Conditional Management Rights. The Early Management Rights expire on 11 March 2020. The dates on which the implementation requirements and new coverage requirements must be met are set out in the Management Rights Contract.

7.2 Reserve price

The following reserve price will apply in the auction:

Twenty-two million New Zealand Dollars (\$22,000,000) per Lot (plus GST).

7.3 Creation of Licences

Use of the Management Rights requires Successful Bidders to register licences under the Act. In creating licences Successful Bidders must comply with the specific parameters of the Management Rights. These parameters may not be sufficient to ensure that the licences can be certified under the Act and Successful Bidders should therefore also coordinate with the existing and planned use by managers or licensees in the adjacent Management Rights and adjacent bands in accordance with the conditions of the Management Rights.

7.4 Incumbent Licences

An Incumbent Licence has been registered in the bands 703-748 MHz and 758-803 MHz. Reference information relating to this licence is provided in Schedule 3.

7.5 No representation regarding suitability

It is the responsibility of Registered Bidders to ensure that all Lots are suitable for their purpose. Despite anything to the contrary in these Terms and Conditions, including the call for bids, the Chief Executive and the Auction Manager make no representations in this respect.

8 THE AUCTION

8.1 Combinatorial Clock Auction

The auction will be a simplified combinatorial clock auction conducted by the Auction Manager in accordance with these Terms and Conditions. The Chief Executive or the Auction Manager may refuse to accept any bid that does not comply with these Terms and Conditions.

8.2 Auction to consist of successive rounds until conclusion

The auction will consist of a number of successive rounds until the auction is concluded in accordance with clause 8.24. Registered Bidders may lodge bids in accordance with these Terms and Conditions. The auction rounds are of three types:

- 8.2.1 Clock Rounds, in which the price per Lot is progressively increased until the aggregate number of Lots bid for is not greater than the number of Lots available. The auction will commence using Clock Rounds.
- 8.2.2 Supplementary Rounds, which may be held if the aggregate number of bids in a Clock Round falls below the number of Lots available. These may be used to offer any remaining Lots unsold in the Clock Rounds.
- 8.2.3 Assignment Round, which is a single round in which Provisionally Successful Bidders, having established the number of Lots they are to acquire through the Clock Rounds and Supplementary Rounds (if applicable), are able to bid for which specific Lots they will acquire according to the options offered and their preference for each of the offered options. Bidding in the Assignment Round is optional and the value bid is in addition to the price per Lot determined during the Clock Round and Supplementary Round (if applicable).

8.3 Rounds held according to time schedule

Bidding rounds will be held in accordance with the time schedule advised by the Auction Manager. The Auction Manager may vary the duration of bidding rounds and the time interval between rounds.

8.4 Clock Round bidding requirements

Bidders are required to bid for the number of Lots they wish to acquire at the price per Lot specified for each clock round. The price per Lot for the commencement round will be the reserve price as stated in clause 7.2. A bidder may not increase the number of Lots bid for in subsequent clock rounds. Bidders may reduce the number of Lots bid for in Clock Rounds in response to the price per Lot advised for each round.

If a Registered Bidder fails to bid during any Clock Round they are ineligible to lodge further bids during the Clock Rounds.

8.5 Clock Round bids are unconditional

All bids in the Clock Rounds are to be unconditional.

8.6 Advice of Clock Round outcome

Following the close of each round, the Auction Manager will advise Registered Bidders whether a further Clock Round is to take place. Where the aggregate demand for Lots is greater than the number available, a further round will be held.

8.7 Auction Manager will vary the price for subsequent Clock Rounds

The Auction Manager will specify the price per Lot applicable in each Clock Round. The price per Lot is at the sole discretion of the Auction Manager. The Auction Manager will notify Registered Bidders of the change to the price per Lot at, or before, the commencement of a new round.

8.8 Completion of Clock Rounds

When the aggregate demand for Lots in a Clock Round is not greater than the number of Lots available, the Auction Manager will advise the bidders that they are the Provisionally Successful Bidder for the number of Lots on which they have bid. At this point the Clock Rounds have been completed and Provisionally Successful Bidders are bound to purchase the Lots they bid for at no less than the price per Lot of the final Clock Round.

8.9 Commencement of Supplementary Rounds

If the aggregate demand for Lots in the final Clock Round is less than the number of Lots available the Auction Manager may initiate Supplementary Rounds. The Auction Manager will advise Registered Bidders by email if Supplementary Rounds are to take place.

All Registered Bidders may initially bid on Lots offered in the Supplementary Rounds subject to their previous acquisitions in the final Clock Round and application of the Acquisition Limit.

8.10 Eligibility to Bid in Supplementary Rounds

If the Supplementary Rounds commence following only one (1) Clock Round, all Registered Bidders are eligible to bid in the first Supplementary Round.

If the Supplementary Rounds commence following two (2) or more Clock Rounds, all Registered Bidders who placed bids in the penultimate Clock Round are eligible to bid in the first Supplementary Round.

8.11 Lots available in Supplementary Rounds

If the Auction Manager elects to have Supplementary Rounds the Auction Manager will advise bidders of the number of Lots available in the Supplementary Rounds. The Auction Manager may choose not to offer all unsold Lots for sale in Supplementary Rounds.

8.12 Acquisition Limit altered for Supplementary Rounds

The Auction Manager may alter the Acquisition Limit for any Supplementary Round at his or her sole discretion.

If the Auction Manager alters the Acquisition Limit, all Registered Bidders will be eligible to bid in the following Supplementary Round, or Rounds. The relevant bidding requirements in clause 8.13 apply.

8.13 Supplementary Round bidding requirements

The process for holding each Supplementary Round is broadly the same as the Clock Rounds.

Bidders are required to bid for the number of Lots they wish to acquire at the price per Lot specified for each Supplementary Round. The price per Lot for the initial Supplementary Round will be a price determined by the Auction Manager. A bidder may not increase the number of Lots bid for in subsequent Supplementary Rounds. Bidders may reduce the number of Lots bid for in Supplementary Rounds in response to the price per Lot advised for each round.

If a Registered Bidder fails to bid during any Supplementary Round they are ineligible to lodge further bids during the Supplementary Rounds.

8.14 Advice of Supplementary Round outcome

Following the close of each round, the Auction Manager will advise Registered Bidders whether a further Supplementary Round is to take place. Where the aggregate demand for Lots is greater than the number available, a further round will be held.

8.15 Auction Manager will vary the price for subsequent Supplementary Rounds

The Auction Manager will specify the price per Lot applicable in each Supplementary Round. The price per Lot is at the sole discretion of the Auction Manager. The Auction Manager will notify Registered Bidders of the change to the price per Lot at, or before, the commencement of a new round.

8.16 Completion of Supplementary Rounds

When the aggregate demand for Lots in a Supplementary Round is not greater than the number of Lots available, the Auction Manager will advise the bidders that they are the Provisionally Successful Bidder for the number of Lots on which they have bid. At this point the Supplementary Rounds have been completed and Provisionally Successful Bidders are bound to purchase the Lots they bid for at no less than the price per Lot in that final Supplementary Round.

If no bids are received in the first Supplementary Round the Auction Manager may declare that the Supplementary Rounds are completed.

8.17 Assignment Round bidding

The conclusion of bidding in the Clock Rounds and Supplementary Rounds (if applicable) determines the number of Lots that are purchased by the Provisionally Successful Bidders.

As the Lots will be provided as a contiguous group, the Assignment Round provides Provisionally Successful Bidders with an opportunity to identify their preferred option of contiguous Lots. Provisionally Successful Bidders are not required to bid for any option or options offered in the Assignment Round. Where a Provisionally Successful Bidder does not bid for any option offered in the Assignment Round, they will be deemed to have bid zero dollars (\$0) for that option or options.

There is one round of bidding in the Assignment Round.

8.18 Associated Bidders to inform of intention to share spectrum

If Associated Bidders or an Associated Group intends or is likely to intend to construct a network that shares spectrum (for example, two parties each own 2x5 MHz and intend to construct a network that uses 10 MHz carriers across both parties' spectrum holdings), the Associated Bidders or Associated Group must notify the Auction Manager of this before the Assignment Round commences.

The Auction Manager may choose to take this into account when deciding on options for contiguous lots in accordance with clause 8.19.

8.19 Auction Manager to identify options for contiguous Lots

The Auction Manager will advise each Provisionally Successful Bidder of the options available for the contiguous Lots they are able to bid on in the Assignment Round.

8.20 Not all options for contiguous Lots available

The identification of options of contiguous Lots to be offered to Provisionally Successful Bidders is to be determined solely by the Auction Manager. Not all options for contiguous Lots may be offered.

8.21 Assignment Round bidding requirements

All Provisionally Successful Bidders will be invited to bid in whole New Zealand dollars for each of the option or options offered. The timetable for the commencement and conclusion of the Assignment Round will be provided to Provisionally Successful Bidders by the Auction Manager.

8.22 Result of Assignment Round

The result of the Assignment Round will be determined by the Auction Manager accepting the Assignment Round bids that result in each Provisionally Successful Bidder gaining the number of Lots they have purchased and a maximization of revenue to the Crown. The revenue assessment is based on bidding in the Assignment Round only.

8.23 Tied bids

Where two or more combinations of bids result in the same revenue to the Crown, the bids are considered to be tied. The winning combination of bids will be determined by random selection, supervised by a Justice of the Peace.

8.24 Conclusion of the auction

The Auction Manager will advise each Provisionally Successful Bidder which of their bids made in the Assignment Round were accepted and the associated Lots assigned to them following the Assignment Round for which they are required to make settlement.

The Auction Manager will also advise all Registered Bidders that the Assignment Round has concluded and that the auction is completed.

8.25 Bids must meet requirements to be valid

For a bid to be valid it must:

- (a) be made in accordance with any applicable instructions in the Registered Bidder's Pack; and
- (b) be received by the Auction Manager during the prescribed time period of a round; and
- (c) in a Clock Round must not be for a greater number of Lots than the number of Lots bid for in a previous Clock Round; and
- (d) in a Supplementary Round must not be for a greater number of Lots than the number of Lots bid for in a previous Supplementary Round, where the Acquisition Limit has not changed between the rounds; and
- (e) not be invalid under clause 9.1 (acquisition limit); and
- (f) comply with the provisions of this clause and these Terms and Conditions.

8.26 Bids by Ministry employees invalid

Any bid made by or on behalf of an employee of the Ministry will be invalid unless the prior written consent of the Chief Executive is obtained to that employee participating in the auction. If the Chief Executive has consented to an employee participating in the auction this will be advertised on the Ministry's website before the commencement of the auction.

8.27 Bidders to advise of Technical Difficulties

If any Registered Bidder is prevented from placing a bid in any round by Technical Difficulties, the Registered Bidder must promptly (and in any event no later than completion of the round in which the Technical Difficulties first arose) advise the Auction Manager by telephone or email that he or she is unable to place a bid.

8.28 Auction Manager may halt auction if Technical Difficulty arises

Where the Auction Manager is advised under clause 8.28 that Technical Difficulties are preventing any Registered Bidder from placing bids, or if the Auction Manager experiences Technical Difficulties, the Auction Manager may advise Registered Bidders by email, or by the telephone number provided on the bidder registration form, of a temporary halt to the auction to allow the Technical Difficulty to be resolved.

8.29 Auction Manager may choose to not conclude auction

Where Technical Difficulties have prevented any Registered Bidder from placing bids or prevented the Auction Manager from receiving bids, or where other events beyond the control of the Auction Manager force the Auction Manager to do so, the Auction Manager may elect to reset the auction to the previous round, restart the auction, not conclude the auction, or take other steps as appropriate including halting or abandoning the auction, notwithstanding that one or more rounds may have occurred.

If the Auction Manager takes any of the steps described above the Auction Manager will, to their best endeavour, keep Registered Bidders regularly updated.

9 **ACQUISITION LIMIT APPLIES TO BIDDING**

9.1 Acquisition Limit

The Acquisition Limit is initially set at three (3) Lots for the Clock Rounds.

The Auction Manager may alter the limit to four (4) Lots for Supplementary Rounds and will advise Registered Bidders by email should this occur.

9.2 Bidders must not bid if success would exceed Acquisition Limit

Registered Bidders are not permitted to make bids for Lots which, if successful, would result in the bidder or its Associate Group exceeding the Acquisition Limit. The order in which such bids are received will be the basis for determining which bid will be accepted. Where it is not possible to determine the order in which bids are received, the Auction Manager will have the sole discretion to determine which bid or bids causes a bidder to exceed the Acquisition Limit and accordingly which bid or bids will be treated as invalid.

9.3 Associate Groups bidding separately

Where Associate Groups are bidding separately the Acquisition Limit will apply to the Associate Groups as if they are a single bidder. If a Registered Bidder lodges a bid that is within the Acquisition Limit, a later bid in that round by a different Registered Bidder that is an Associate Group will only be valid if the sum of the bids is within the Acquisition Limit.

9.4 Crown has no obligation to notify about Acquisition Limit

The Auction Manager has no obligation to notify any member of an Associate Group whether a bid by a member of an Associate Group would exceed the Acquisition Limit and, therefore, be invalid.

10 WITHDRAWAL OF LOTS

10.1 Auction Manager may withdraw Lots

All or any of the Lots may be withdrawn from the auction at the discretion of the Auction Manager at any time, providing that sufficient Lots remain in the auction to meet the purchases of Provisionally Successful Bidders (if any).

10.2 Withdrawals to be announced

If the Auction Manager decides to withdraw all or any of the Lots from the auction, the decision will be announced by email to Registered Bidders.

10.3 No claims if Lots withdrawn

No Registered Bidder or prospective bidder will have any claim against the Chief Executive or the Ministry for any expenses or other compensation as a direct or indirect consequence of such withdrawal.

11 POST AUCTION PROCESSES

11.1 Provisional Auction Results Announced

The Auction Manager will arrange for the publication of the provisional auction results. These will be made available on the Ministry's website.

11.2 Statutory Declaration to be provided confirming matters

A Provisionally Successful Bidder must, before 4.00 pm on a date within five (5) Working Days of the publication of the provisional auction results by the Auction Manager (time being of the essence), deliver to the Auction Manager a statutory declaration confirming that the Provisionally Successful Bidder's Associate Group (if any) has not exceeded the Acquisition Limit and:

- (a) confirming that the bidder is not an Associate of any other Provisionally Successful Bidder; or
- (b) identifying any Provisionally Successful Bidders that are Associates of that bidder.

An example statutory declaration is contained in Schedule 4.

11.3 Changes to details in statutory declaration

A Provisionally Successful Bidder must notify the Auction Manager immediately in writing if any of the details provided in the statutory declaration under clause 11.2 change prior to settlement.

12 **SETTLEMENT REQUIREMENTS**

12.1 Settlement amount

The amount required from each Provisionally Successful Bidder in settlement is the sum of the:

- (a) price per Lot in the final Clock Round for the number of Lots that they were a Provisionally Successful Bidder; and
- (b) price per Lot in the final Supplementary Round for the number of Lots that they were a Provisionally Successful Bidder; and
- (c) accepted Assignment Round bid from that bidder.

12.2 Invoices to be provided

Each Provisionally Successful Bidder will be invoiced for the amount payable in settlement as soon as possible after the conditions in clause 11.2 and 12.4 have been complied with.

12.3 **GST** is payable

The Inland Revenue Department has advised the Ministry that GST is payable in respect of successful bids. For the purposes of determining the results of this auction, all bids will be considered to exclude GST. GST will be recovered from Successful Bidders at the time that they are invoiced for payments in settlement. GST will be additional to the amount otherwise payable by the Provisionally Successful Bidder.

12.4 Payment Option

Payment may be made in full or by a payment plan.

Provisionally Successful Bidders must, before 4.00 pm on a date within 5 Working Days of the publication of the provisional auction results by the Auction Manager (time being of the essence), advise the Auction Manager whether they wish to make payment in full or by payment plan.

12.5 Payment Plan

Where Provisionally Successful Bidders elect the payment plan, it is intended that the terms outlined in the payment plan documentation will apply.

The structure of the payment plan will consist of five (5) equal installments (comprising various proportions of principal and interest) over five (5) years. The outstanding principal sum will be subject to an annual interest rate set in the Management Rights Contract.

Where Provisionally Successful Bidders elect to make payment in full, any terms outlined in the Management Rights Contract that relate to the payment plan will not apply.

12.6 Payment in full by bank cheque or electronic funds transfer

Any payment, including payment in full or a part payment under the payment plan, must be made in New Zealand dollars by:

(a) a currently dated Bank Cheque drawn on a bank registered in New Zealand; or

(b) electronic funds transfer (in same day cleared funds). Account details will be provided to Provisionally Successful Bidders upon request.

12.7 Payment in full within 40 Working Days of invoice

For payment in full, settlement is due within 40 Working Days of the invoice date. Bank Cheques are to be made payable to the Ministry of Business, Innovation & Employment and must be sent to the Auction Manager at the address in clause 17.1.

For payment by Payment Plan, the first payment is due within 40 Working Days of the invoice date. Bank Cheques are to be made payable to the Ministry of Business, Innovation & Employment and must be sent to the Auction Manager at the address in clause 17.1.

12.8 Management Rights Contract is a condition of settlement

As a further condition of settlement, each Provisionally Successful Bidder, and such members of its Associate Group as the Provisionally Successful Bidder may nominate (if any), will be required to enter into the Management Rights Contract with the Chief Executive (and with the relevant Lot details included) on or before the date on which payment of the settlement amount is due.

12.9 Management Rights Contract conditional on security being given

- (a) The Management Rights Contract will be conditional on the Crown lodging a registered caveat over the Early Management Rights; and
- (b) Where a Provisionally Successful Bidder elects the payment plan option, in addition to the caveat in clause 12.9(a), the Management Rights Contract will be conditional on the implementation of appropriate security arrangements.

12.10 Contract imposes acquisition limit and implementation obligation

The Management Rights Contract (among other things):

- (a) requires, by a set date, implementation of services;
- (b) requires a continuous ongoing service to be provided;
- (c) sets out the consequences of implementation, which include the transfer of the Conditional Management Right;
- (d) ensures, for a set period of time, the Acquisition Limit continues to apply to the Successful Bidder and to any party to which the Successful Bidder transfers or assigns the Management Rights in accordance with the Management Rights Contract;
- (e) requires that caveats over the Management Rights be lodged with the Registrar of Radio Frequencies; and
- (f) provides a plan allowing Successful Bidders to make payment over time.

13 CANCELLATION AND LIABILITY

13.1 Cancellation events

The cancellation events are:

- (a) a Provisionally Successful Bidder provides the Auction Manager with information under clause 5.5 or 5.7 that omits a particular, is or becomes incorrect or misleading, or is not provided within the required timeframe (without limitation to any other legal rights and remedies available to the Crown);
- (b) a Provisionally Successful Bidder fails to provide a statutory declaration under clause 11.2, including failing to provide that declaration on time or being unable to declare those matters set out under clause 11.2;
- (c) the Commerce Commission advises the Chief Executive or the Ministry that the acquisition of Lots by a Provisionally Successful Bidder would breach the Commerce Act;
- (d) a statutory declaration provided by a Provisionally Successful Bidder under clause 11.2 which, in the opinion of the Chief Executive, omits a material particular, is incorrect, misleading or incomplete, or the Provisionally Successful Bidder can no longer declare those matters in clause 11.2; or
- (e) if a Provisionally Successful Bidder fails to pay the sum owing under clause 12.1 or fails to enter into a Management Rights Contract in terms of clause 12.8.

13.2 Effect of cancellation event

This clause is for the benefit of the Crown and may be imposed at the Crown's discretion.

If an event set out in clause 13.1 occurs, then (without limit to any other legal rights and remedies available to the Crown and despite anything to the contrary in these Terms and Conditions):

- (a) the contract for the purchase of a Lot or Lots by the Provisionally Successful Bidder is deemed to be cancelled;
- (b) the Provisionally Successful Bidder will no longer be eligible to purchase the Lot or Lots nor will the Provisionally Successful Bidder (or any member of its Associate Group) be eligible to participate in any re-allocation process for the Lot or Lots; and
- (c) the following liquidated damages will be payable to the Crown by the Provisionally Successful Bidder:
 - (i) a sum of money equal to the difference between the final amount bid for the Lot or Lots, as per clause 12.1, and the amount eventually paid to the Ministry for that Lot or Lots, if that amount is lower than the value of the successful bid; plus

- (ii) a sum of money which fully recovers any expenses (including staff time) incurred by the Auction Manager in seeking payment from the bidder. A certificate from the Auction Manager of such losses, costs or expenses is prima facie evidence of such loss, cost or expense; plus
- (iii) a sum of money which fully recovers any losses, costs or expenses suffered or incurred by the Crown as a result of processing the bidder's registration and any reallocation of the Lot. A certificate from the Auction Manager of such losses, costs or expenses is prima facie evidence of such loss, cost or expense.

14 EARLY MANAGEMENT RIGHT TO BE TRANSFERRED TO PURCHASER

14.1 Management Right will be transferred

Subject to compliance with all conditions under these Terms and Conditions, including clause 12.8, the Early Management Right will be transferred to the Successful Bidder within 30 Working Days of the Auction Manager receiving full payment in settlement for the Lot or Lots in accordance with clause 12.7.

14.2 Transfer in accordance with payment plan

Where the Provisionally Successful Bidder has elected under clause 12.4 to use the payment plan, transfer will be in accordance with the terms of the payment plan, subject to compliance with all conditions under these Terms and Conditions including clause 12.8.

14.3 Ability to nominate licence and Management Right holder

Within 10 Working Days of the completion of the Auction, a Provisionally Successful Bidder may notify the Auction Manager that it intends to nominate another party (nominee) to:

- Take ownership of the Management Right(s), or
- In the case of a Provisionally Successful Bidder that elects to pay through the payment plan, take the benefit of the power of attorney arrangements set out in the payment plan.

Provisionally Successful Bidders must provide sufficient information and evidence to satisfy the Chief Executive that the nominee does and will continue to comply with the Terms and Conditions of the auction.

The nominee must agree to enter into a Management Rights Agreement with the Crown on substantially the same terms as set out in this Auction Catalogue.

15 PUBLICATION OF FINAL RESULTS AND OTHER INFORMATION

15.1 Results published

Final results will be published by the Auction Manager on the Ministry's website as and when all Management Rights Contracts have been executed.

15.2 Agreement to Publication of Results

Registered Bidders agree that the results of the auction (including the names and details of Provisionally Successful Bidders, Successful Bidders, and the Lot details) and any other information related to this auction that the Auction Manager believes to be of general interest, may be published on the Ministry's website or anywhere else.

15.3 Information relating to bids

To ensure transparency, upon request, information relating to all bids will be made available to Registered Bidders. This information will not be available until after the publication of the final results.

16 **CROWN NOT LIABLE**

The Crown will not be liable in any way to a Registered Bidder (including a Provisionally Successful Bidder or Successful Bidder) for the exercise of any right or obligation set out in these Terms and Conditions, including (to avoid doubt) for any claim for direct or indirect losses, costs or expenses as a result of, or in connection with, that exercise of the right or obligation.

17 NOTICES

17.1 Notices by bidders to be in writing

Any notice or other communication, e.g. provision of information (notice) required to be given under these Terms and Conditions by a Registered Bidder (including a Provisionally Successful Bidder or Successful Bidder), not including bids in the auction, must be in writing and hand delivered or sent by registered post to the appropriate address set out in this clause.

The address for registered post is:

Auction Manager (700 MHz)
Resources, Energy and Communications Branch
Ministry of Business, Innovation and Employment
PO Box 1473
Wellington 6140

The address for hand delivery is:

Auction Manager (700 MHz)
Resources, Energy and Communications Branch
Ministry of Business, Innovation and Employment
33 Bowen St
Wellington 6011

17.2 Notices to meet requirements to be effective

A notice will only be effective:

(a) if hand delivered, when delivered; or

(b) if sent by registered post, two (2) Working Days after posting (in proving such posting, it is sufficient to show that the envelope was correctly addressed and posted).

17.3 Email notices

Despite clause 17.2, a Registered Bidder may also provide such notice by email, provided that the Registered Bidder immediately forwards the original notice to the relevant person in accordance with clause 17.2, and receipt of the email is acknowledged by the Auction Manager.

17.4 Timing of Notices and Working Days

A notice received after 5.00 pm on a Working Day or on a day which is not a Working Day shall be deemed not to have been received until the next Working Day.

SCHEDULE 1 – SCHEDULE OF LOTS

This auction comprises nine lots within the bands 703-748 MHz and 758-803 MHz.

Each lot comprises four management rights of 5 MHz. One pair of management rights (Early Management Rights) is for the initial period expected to be on or before 1 January 2014 to 11 March 2020 and a further pair (Conditional Management Rights) is for the period 12 March 2020 to 28 November 2031, to be made available to successful bidders when implementation requirements have been met.

The Early Management Rights will be created by the transfer of a range of frequencies (with appropriate boundary conditions) from a pre-existing Management Right. The pre-existing right commenced on 12 March 2010 and has a number of television licences which will either be cancelled or expire shortly after 30 November 2013. The Early Management Rights will therefore be in force at the time of transfer and may have current television licences which continue until early December 2013.

The management rights' range of frequencies, adjacent frequencies emission limits, and protection limits are based on limits for equipment specified in the 3rd Generation Partnership Project (3GPP) standards 3GPP TS 36.101, 3GPP TS 36.104 and 3GPP TR 36.820.

Each lot is described as follows:

Lot No.	Lower Boundary	Upper Boundary	Commencement Date	Expiry Date
	703.0 MHz	708.0 MHz	Date of transfer	11 March 2020
1	758.0 MHz	763.0 MHz	Date of transfer	11 March 2020
1	703.0 MHz	708.0 MHz	12 March 2020	28 November 2031
	758.0 MHz	763.0 MHz	12 March 2020	28 November 2031
	708.0 MHz	713.0 MHz	Date of transfer	11 March 2020
2	763.0 MHz	768.0 MHz	Date of transfer	11 March 2020
2	708.0 MHz	713.0 MHz	12 March 2020	28 November 2031
	763.0 MHz	768.0 MHz	12 March 2020	28 November 2031
	713.0 MHz	718.0 MHz	Date of transfer	11 March 2020
3	768.0 MHz	773.0 MHz	Date of transfer	11 March 2020
5	713.0 MHz	718.0 MHz	12 March 2020	28 November 2031
	768.0 MHz	773.0 MHz	12 March 2020	28 November 2031
	718.0 MHz	723.0 MHz	Date of transfer	11 March 2020
4	773.0 MHz	778.0 MHz	Date of transfer	11 March 2020
4	718.0 MHz	723.0 MHz	12 March 2020	28 November 2031
	773.0 MHz	778.0 MHz	12 March 2020	28 November 2031
5	723.0 MHz	728.0 MHz	Date of transfer	11 March 2020
5	778.0 MHz	783.0 MHz	Date of transfer	11 March 2020

	723.0 MHz	728.0 MHz	12 March 2020	28 November 2031
	778.0 MHz	783.0 MHz	12 March 2020	28 November 2031
	728.0 MHz	733.0 MHz	Date of transfer	11 March 2020
	783.0 MHz	788.0 MHz	Date of transfer	11 March 2020
6	728.0 MHz	733.0 MHz	12 March 2020	28 November 2031
	783.0 MHz	788.0 MHz	12 March 2020	28 November 2031
	733.0 MHz	738.0 MHz	Date of transfer	11 March 2020
7	788.0 MHz	793.0 MHz	Date of transfer	11 March 2020
/	733.0 MHz	738.0 MHz	12 March 2020	28 November 2031
	788.0 MHz	793.0 MHz	12 March 2020	28 November 2031
	738.0 MHz	743.0 MHz	Date of transfer	11 March 2020
8	793.0 MHz	798.0 MHz	Date of transfer	11 March 2020
8	738.0 MHz	743.0 MHz	12 March 2020	28 November 2031
	793.0 MHz	798.0 MHz	12 March 2020	28 November 2031
	743.0 MHz	748.0 MHz	Date of transfer	11 March 2020
9	798.0 MHz 803.0 MHz 743.0 MHz 748.0 MHz	803.0 MHz	Date of transfer	11 March 2020
9		748.0 MHz	12 March 2020	28 November 2031
	798.0 MHz	803.0 MHz	12 March 2020	28 November 2031

The details for each Early Management Right are outlined in Schedule 2. Conditional Management Rights will be identical, except will cover the period 12 March 2020 to 28 November 2031.

SCHEDULE 2 – RECORDS OF MANAGEMENT RIGHTS

Record of management rights

1 Range of frequencies to be recorded in the Register:

Lower Boundary Frequency: 703.000 MHz Upper Boundary Frequency: 708.000 MHz

Adjacent frequencies emission limits (expressed as the maximum e.i.r.p. (in dBW) of those emissions):

Below lower boundary frequency:

-64.0 dBW at 650.000 MHz to -64.0 dBW at 694.000 MHz

-64.0 dBW at 694.000 MHz to -43.0 dBW at 694.000 MHz

-43.0 dBW at 694.000 MHz to -43.0 dBW at 698.000 MHz

-43.0 dBW at 698.000 MHz to -40.0 dBW at 698.000 MHz

-40.0 dBW at 698.000 MHz to -40.0 dBW at 702.000 MHz

-40.0 dBW at 702.000 MHz to -30.0 dBW at 702.000 MHz

-30.0 dBW at 702.000 MHz to -30.0 dBW at 703.000 MHz

Above upper boundary frequency:

-30.0 dBW at 708.000 MHz to -30.0 dBW at 709.000 MHz

-30.0 dBW at 709.000 MHz to -40.0 dBW at 709.000 MHz

-40.0 dBW at 709.000 MHz to -40.0 dBW at 713.000 MHz

-40.0 dBW at 713.000 MHz to -43.0 dBW at 713.000 MHz

-43.0 dBW at 713.000 MHz to -43.0 dBW at 728.000 MHz

-43.0 dBW at 728.000 MHz to -55.0 dBW at 728.000 MHz

-55.0 dBW at 728.000 MHz to -55.0 dBW at 758.000 MHz

-55.0 dBW at 758.000 MHz to -62.0 dBW at 758.000 MHz

-62.0 dBW at 758.000 MHz to -62.0 dBW at 773.000 MHz

-62.0 dBW at 773.000 MHz to -80.0 dBW at 773.000 MHz

-80.0 dBW at 773.000 MHz to -80.0 dBW at 803.000 MHz

Note: The adjacent frequencies emission limits applicable to frequencies within each specified range must be determined in accordance with the following formula:

$$y = mx + C$$

where
$$y = dBW$$
, $x = MHz$, $m = \frac{dy}{dx}$

C =the value of y where x = 0 (the y intercept).

3 Protection limit (expressed as the e.i.r.p. (in dBW) of that limit):

-30.0 dBW at 703.000 MHz to -30.0 dBW at 704.000 MHz

-30.0 dBW at 704.000 MHz to -40.0 dBW at 704.000 MHz

-40.0 dBW at 704.000 MHz to -40.0 dBW at 707.000 MHz

-40.0 dBW at 707.000 MHz to -30.0 dBW at 707.000 MHz

Note: The protection limit applicable to frequencies within each specified range must be determined in accordance with the following formula:

$$y = mx + C$$

where
$$y = dBW$$
, $x = MHz$, $m = \frac{dy}{dx}$

C =the value of y where x = 0 (the y intercept).

4 Power floor levels (expressed as the e.i.r.p. (in dBW) of that level):

-50.0 dBW at 703.000 MHz to -50.0 dBW at 708.000 MHz

5 The conditions that apply to licences created in relation to the record of management rights are:

The manager shall not transfer the manager's interest in this Management Right, or issue any licence, to any foreign government, or to any party on behalf of any foreign government, without first obtaining the written approval of the Chief Executive of the Ministry of Business, Innovation and Employment.

Any licences created that are not frequency division duplex (FDD) services must not cause harmful interference to, and shall not claim protection from, licences in other management rights that are created for FDD services.

Where systems in adjacent or nearby bands are operated by different licensees or rightholders, bilateral coordination may be necessary to ensure mitigation techniques are introduced to manage interference between bands in accordance with the Act. In particular the implementation of, on a local basis, reasonable network and operational deployment measures (having regard to the relative costs of these measures and alternative non-network measures) may be appropriate where these are necessary to mitigate harmful interference with spectrum licences used to provide broadcast services on frequencies below 694 MHz.

Limits relating to the adjacent frequencies emissions limits, protection limits and power floors on this management right are based on the limits specified in the 3rd Generation Partnership Project (3GPP) standards 3GPP TS 36.101, 3GPP TS 36.104 and 3GPP TR 36.820 and have been normalized to a bandwidth of 1 MHz.

6 The commencement date of the record of management rights is

12 March 2010

7 The expiry date of the record of management rights is

11 March 2020

SCHEDULE to Form 1

Record of management rights

1 Range of frequencies to be recorded in the Register:

Lower Boundary Frequency: 758.000 MHz Upper Boundary Frequency: 763.000 MHz

2 Adjacent frequencies emission limits (expressed as the maximum e.i.r.p. (in dBW) of those emissions):

Below lower boundary frequency:

-64.0 dBW at 650.000 MHz to -64.0 dBW at 703.000 MHz

-64.0 dBW at 703.000 MHz to -99.0 dBW at 703.000 MHz

-99.0 dBW at 703.000 MHz to -99.0 dBW at 748.000 MHz

-99.0 dBW at 748.000 MHz to -17.0 dBW at 748.000 MHz

-17.0 dBW at 748.000 MHz to -17.0 dBW at 753.000 MHz

-17.0 dBW at 753.000 MHz to -10.0 dBW at 758.000 MHz

Above upper boundary frequency:

-10.0 dBW at 763.000 MHz to -17.0 dBW at 768.000 MHz

-17.0 dBW at 768.000 MHz to -17.0 dBW at 773.000 MHz

-17.0 dBW at 773.000 MHz to -16.0 dBW at 773.000 MHz

-16.0 dBW at 773.000 MHz to -16.0 dBW at 807.000 MHz

-16.0 dBW at 807.000 MHz to -62.0 dBW at 807.000 MHz

-62.0 dBW at 807.000 MHz to -62.0 dBW at 825.000 MHz

Note: The adjacent frequencies emission limits applicable to frequencies within each specified range must be determined in accordance with the following formula:

$$y = mx + C$$

where
$$y = dBW$$
, $x = MHz$, $m = \frac{dy}{dx}$

C =the value of y where x = 0 (the y intercept).

3 Protection limit (expressed as the e.i.r.p. (in dBW) of that limit):

-10.0 dBW at 758.000 MHz to -13.5 dBW at 760.500 MHz

-13.5 dBW at 760.500 MHz to -10.0 dBW at 763.000 MHz

Note: The protection limit applicable to frequencies within each specified range must be determined in accordance with the following formula:

$$y = mx + C$$

where
$$y = dBW$$
, $x = MHz$, $m = \frac{dy}{dx}$

- C =the value of y where x = 0 (the y intercept).
- 4 Power floor levels (expressed as the e.i.r.p. (in dBW) of that level):

-50.0 dBW at 758.000 MHz to -50.0 dBW at 763.000 MHz

5 The conditions that apply to licences created in relation to the record of management rights are:

The manager shall not transfer the manager's interest in this Management Right, or issue any licence, to any foreign government, or to any party on behalf of any foreign government, without first obtaining the written approval of the Chief Executive of the Ministry of Business, Innovation and Employment.

Any licences created that are not frequency division duplex (FDD) services must not cause harmful interference to, and shall not claim protection from, licences in other management rights that are created for FDD services.

Where systems in adjacent or nearby bands are operated by different licensees or rightholders, bilateral coordination may be necessary to ensure mitigation techniques are introduced to manage interference between bands in accordance with the Act. In particular the implementation of, on a local basis, reasonable network and operational deployment measures (having regard to the relative costs of these measures and alternative non-network measures) may be appropriate where these are necessary to mitigate harmful interference with spectrum licences used to provide broadcast services on frequencies below 694 MHz.

Limits relating to the adjacent frequencies emissions limits, protection limits and power floors on this management right are based on the limits specified in the 3rd Generation Partnership Project (3GPP) standards 3GPP TS 36.101, 3GPP TS 36.104 and 3GPP TR 36.820 and have been normalized to a bandwidth of 1 MHz.

6 The commencement date of the record of management rights is

12 March 2010

7 The expiry date of the record of management rights is

11 March 2020

SCHEDULE to Form 1

Record of management rights

1 Range of frequencies to be recorded in the Register:

Lower Boundary Frequency: 708.000 MHz Upper Boundary Frequency: 713.000 MHz

2 Adjacent frequencies emission limits (expressed as the maximum e.i.r.p. (in dBW) of those emissions):

Below lower boundary frequency:

-64.0 dBW at 650.000 MHz to -64.0 dBW at 694.000 MHz

-64.0 dBW at 694.000 MHz to -43.0 dBW at 694.000 MHz

-43.0 dBW at 694.000 MHz to -43.0 dBW at 703.000 MHz

-43.0 dBW at 703.000 MHz to -40.0 dBW at 703.000 MHz

-40.0 dBW at 703.000 MHz to -40.0 dBW at 707.000 MHz

-40.0 dBW at 707.000 MHz to -30.0 dBW at 707.000 MHz

-30.0 dBW at 707.000 MHz to -30.0 dBW at 708.000 MHz

Above upper boundary frequency:

-30.0 dBW at 713.000 MHz to -30.0 dBW at 714.000 MHz

-30.0 dBW at 714.000 MHz to -40.0 dBW at 714.000 MHz

-40.0 dBW at 714.000 MHz to -40.0 dBW at 718.000 MHz

-40.0 dBW at 718.000 MHz to -43.0 dBW at 718.000 MHz

-43.0 dBW at 718.000 MHz to -43.0 dBW at 733.000 MHz

-43.0 dBW at 733.000 MHz to -55.0 dBW at 733.000 MHz

-55.0 dBW at 733.000 MHz to -55.0 dBW at 758.000 MHz

-55.0 dBW at 758.000 MHz to -62.0 dBW at 758.000 MHz

-62.0 dBW at 758.000 MHz to -62.0 dBW at 773.000 MHz

-62.0 dBW at 773.000 MHz to -80.0 dBW at 773.000 MHz

-80.0 dBW at 773.000 MHz to -80.0 dBW at 803.000 MHz

Note: The adjacent frequencies emission limits applicable to frequencies within each specified range must be determined in accordance with the following formula:

$$y = mx + C$$

where
$$y = dBW$$
, $x = MHz$, $m = \frac{dy}{dx}$

C =the value of y where x = 0 (the y intercept).

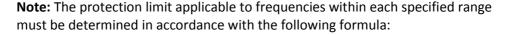
3 Protection limit (expressed as the e.i.r.p. (in dBW) of that limit):

-30.0 dBW at 708.000 MHz to -30.0 dBW at 709.000 MHz

-30.0 dBW at 709.000 MHz to -40.0 dBW at 709.000 MHz

-40.0 dBW at 709.000 MHz to -40.0 dBW at 712.000 MHz

-40.0 dBW at 712.000 MHz to -30.0 dBW at 712.000 MHz



$$y = mx + C$$

where
$$y = dBW$$
, $x = MHz$, $m = \frac{dy}{dx}$

C =the value of y where x = 0 (the y intercept).

4 Power floor levels (expressed as the e.i.r.p. (in dBW) of that level):

-50.0 dBW at 708.000 MHz to -50.0 dBW at 713.000 MHz

5 The conditions that apply to licences created in relation to the record of management rights are:

The manager shall not transfer the manager's interest in this Management Right, or issue any licence, to any foreign government, or to any party on behalf of any foreign government, without first obtaining the written approval of the Chief Executive of the Ministry of Business, Innovation and Employment.

Any licences created that are not frequency division duplex (FDD) services must not cause harmful interference to, and shall not claim protection from, licences in other management rights that are created for FDD services.

Where systems in adjacent or nearby bands are operated by different licensees or rightholders, bilateral coordination may be necessary to ensure mitigation techniques are introduced to manage interference between bands in accordance with the Act. In particular the implementation of, on a local basis, reasonable network and operational deployment measures (having regard to the relative costs of these measures and alternative non-network measures) may be appropriate where these are necessary to mitigate harmful interference with spectrum licences used to provide broadcast services on frequencies below 694 MHz.

Limits relating to the adjacent frequencies emissions limits, protection limits and power floors on this management right are based on the limits specified in the 3rd Generation Partnership Project (3GPP) standards 3GPP TS 36.101, 3GPP TS 36.104 and 3GPP TR 36.820 and have been normalized to a bandwidth of 1 MHz.

6 The commencement date of the record of management rights is

12 March 2010

7 The expiry date of the record of management rights is

11 March 2020

Record of management rights

1 Range of frequencies to be recorded in the Register:

Lower Boundary Frequency: 763.000 MHz Upper Boundary Frequency: 768.000 MHz

2 Adjacent frequencies emission limits (expressed as the maximum e.i.r.p. (in dBW) of those emissions):

Below lower boundary frequency:

-64.0 dBW at 650.000 MHz to -64.0 dBW at 703.000 MHz

-64.0 dBW at 703.000 MHz to -99.0 dBW at 703.000 MHz

-99.0 dBW at 703.000 MHz to -99.0 dBW at 748.000 MHz

-99.0 dBW at 748.000 MHz to -16.0 dBW at 748.000 MHz

-16.0 dBW at 748.000 MHz to -16.0 dBW at 753.000 MHz

-16.0 dBW at 753.000 MHz to -17.0 dBW at 753.000 MHz

-17.0 dBW at 753.000 MHz to -17.0 dBW at 758.000 MHz

-17.0 dBW at 758.000 MHz to -10.0 dBW at 763.000 MHz

Above upper boundary frequency:

-10.0 dBW at 768.000 MHz to -17.0 dBW at 773.000 MHz

-17.0 dBW at 773.000 MHz to -17.0 dBW at 778.000 MHz

-17.0 dBW at 778.000 MHz to -16.0 dBW at 778.000 MHz

-16.0 dBW at 778.000 MHz to -16.0 dBW at 807.000 MHz

-16.0 dBW at 807.000 MHz to -62.0 dBW at 807.000 MHz

-62.0 dBW at 807.000 MHz to -62.0 dBW at 825.000 MHz

Note: The adjacent frequencies emission limits applicable to frequencies within each specified range must be determined in accordance with the following formula:

$$y = mx + C$$

where
$$y = dBW$$
, $x = MHz$, $m = \frac{dy}{dx}$

C =the value of y where x = 0 (the y intercept).

3 Protection limit (expressed as the e.i.r.p. (in dBW) of that limit):

-10.0 dBW at 763.000 MHz to -13.5 dBW at 765.500 MHz

-13.5 dBW at 765.500 MHz to -10.0 dBW at 768.000 MHz

$$y = mx + C$$

where
$$y = dBW$$
, $x = MHz$, $m = \frac{dy}{dx}$

C =the value of y where x = 0 (the y intercept).

4 Power floor levels (expressed as the e.i.r.p. (in dBW) of that level):

-50.0 dBW at 763.000 MHz to -50.0 dBW at 768.000 MHz

5 The conditions that apply to licences created in relation to the record of management rights are:

The manager shall not transfer the manager's interest in this Management Right, or issue any licence, to any foreign government, or to any party on behalf of any foreign government, without first obtaining the written approval of the Chief Executive of the Ministry of Business, Innovation and Employment.

Any licences created that are not frequency division duplex (FDD) services must not cause harmful interference to, and shall not claim protection from, licences in other management rights that are created for FDD services.

Where systems in adjacent or nearby bands are operated by different licensees or rightholders, bilateral coordination may be necessary to ensure mitigation techniques are introduced to manage interference between bands in accordance with the Act. In particular the implementation of, on a local basis, reasonable network and operational deployment measures (having regard to the relative costs of these measures and alternative non-network measures) may be appropriate where these are necessary to mitigate harmful interference with spectrum licences used to provide broadcast services on frequencies below 694 MHz.

Limits relating to the adjacent frequencies emissions limits, protection limits and power floors on this management right are based on the limits specified in the 3rd Generation Partnership Project (3GPP) standards 3GPP TS 36.101, 3GPP TS 36.104 and 3GPP TR 36.820 and have been normalized to a bandwidth of 1 MHz.

6 The commencement date of the record of management rights is

12 March 2010

7 The expiry date of the record of management rights is

Record of management rights

1 Range of frequencies to be recorded in the Register:

Lower Boundary Frequency: 713.000 MHz Upper Boundary Frequency: 718.000 MHz

2 Adjacent frequencies emission limits (expressed as the maximum e.i.r.p. (in dBW) of those emissions):

Below lower boundary frequency:

-64.0 dBW at 650.000 MHz to -64.0 dBW at 694.000 MHz -64.0 dBW at 694.000 MHz to -43.0 dBW at 694.000 MHz -43.0 dBW at 708.000 MHz to -43.0 dBW at 708.000 MHz -43.0 dBW at 708.000 MHz to -40.0 dBW at 708.000 MHz -40.0 dBW at 708.000 MHz to -40.0 dBW at 712.000 MHz -40.0 dBW at 712.000 MHz to -30.0 dBW at 712.000 MHz -30.0 dBW at 712.000 MHz -30.0 dBW at 713.000 MHz

Above upper boundary frequency:

-30.0 dBW at 718.000 MHz to -30.0 dBW at 719.000 MHz -30.0 dBW at 719.000 MHz to -40.0 dBW at 719.000 MHz -40.0 dBW at 719.000 MHz to -40.0 dBW at 723.000 MHz -40.0 dBW at 723.000 MHz to -43.0 dBW at 723.000 MHz -43.0 dBW at 723.000 MHz to -43.0 dBW at 738.000 MHz -43.0 dBW at 738.000 MHz to -55.0 dBW at 738.000 MHz -55.0 dBW at 738.000 MHz to -55.0 dBW at 758.000 MHz -55.0 dBW at 758.000 MHz to -62.0 dBW at 758.000 MHz -62.0 dBW at 773.000 MHz -62.0 dBW at 773.000 MHz to -80.0 dBW at 773.000 MHz -80.0 dBW at 773.000 MHz to -80.0 dBW at 803.000 MHz

Note: The adjacent frequencies emission limits applicable to frequencies within each specified range must be determined in accordance with the following formula:

$$y = mx + C$$

where
$$y = dBW$$
, $x = MHz$, $m = \frac{dy}{dx}$

C =the value of y where x = 0 (the y intercept).

3 Protection limit (expressed as the e.i.r.p. (in dBW) of that limit):

-30.0 dBW at 713.000 MHz to -30.0 dBW at 714.000 MHz -30.0 dBW at 714.000 MHz to -40.0 dBW at 714.000 MHz -40.0 dBW at 717.000 MHz to -40.0 dBW at 717.000 MHz -40.0 dBW at 717.000 MHz to -30.0 dBW at 717.000 MHz

-30.0 dBW at 717.000 MHz to -30.0 dBW at 718.000 MHz

Note: The protection limit applicable to frequencies within each specified range must be determined in accordance with the following formula:

$$v = mx + C$$

where
$$y = dBW$$
, $x = MHz$, $m = \frac{dy}{dx}$

C =the value of y where x = 0 (the y intercept).

4 Power floor levels (expressed as the e.i.r.p. (in dBW) of that level):

-50.0 dBW at 713.000 MHz to -50.0 dBW at 718.000 MHz

5 The conditions that apply to licences created in relation to the record of management rights are:

The manager shall not transfer the manager's interest in this Management Right, or issue any licence, to any foreign government, or to any party on behalf of any foreign government, without first obtaining the written approval of the Chief Executive of the Ministry of Business, Innovation and Employment.

Any licences created that are not frequency division duplex (FDD) services must not cause harmful interference to, and shall not claim protection from, licences in other management rights that are created for FDD services.

Where systems in adjacent or nearby bands are operated by different licensees or rightholders, bilateral coordination may be necessary to ensure mitigation techniques are introduced to manage interference between bands in accordance with the Act. In particular the implementation of, on a local basis, reasonable network and operational deployment measures (having regard to the relative costs of these measures and alternative non-network measures) may be appropriate where these are necessary to mitigate harmful interference with spectrum licences used to provide broadcast services on frequencies below 694 MHz.

Limits relating to the adjacent frequencies emissions limits, protection limits and power floors on this management right are based on the limits specified in the 3rd Generation Partnership Project (3GPP) standards 3GPP TS 36.101, 3GPP TS 36.104 and 3GPP TR 36.820 and have been normalized to a bandwidth of 1 MHz.

6 The commencement date of the record of management rights is

12 March 2010

7 The expiry date of the record of management rights is

Record of management rights

1 Range of frequencies to be recorded in the Register:

Lower Boundary Frequency: 768.000 MHz Upper Boundary Frequency: 773.000 MHz

2 Adjacent frequencies emission limits (expressed as the maximum e.i.r.p. (in dBW) of those emissions):

Below lower boundary frequency:

-64.0 dBW at 650.000 MHz to -64.0 dBW at 703.000 MHz

-64.0 dBW at 703.000 MHz to -99.0 dBW at 703.000 MHz

-99.0 dBW at 703.000 MHz to -99.0 dBW at 748.000 MHz

-99.0 dBW at 748.000 MHz to -16.0 dBW at 748.000 MHz

-16.0 dBW at 748.000 MHz to -16.0 dBW at 758.000 MHz

-16.0 dBW at 758.000 MHz to -17.0 dBW at 758.000 MHz

-17.0 dBW at 758.000 MHz to -17.0 dBW at 763.000 MHz

-17.0 dBW at 763.000 MHz to -10.0 dBW at 768.000 MHz

Above upper boundary frequency:

-10.0 dBW at 773.000 MHz to -17.0 dBW at 778.000 MHz

-17.0 dBW at 778.000 MHz to -17.0 dBW at 783.000 MHz

-17.0 dBW at 783.000 MHz to -16.0 dBW at 783.000 MHz

-16.0 dBW at 783.000 MHz to -16.0 dBW at 807.000 MHz

-16.0 dBW at 807.000 MHz to -62.0 dBW at 807.000 MHz

-62.0 dBW at 807.000 MHz to -62.0 dBW at 825.000 MHz

Note: The adjacent frequencies emission limits applicable to frequencies within each specified range must be determined in accordance with the following formula:

$$y = mx + C$$

where
$$y = dBW$$
, $x = MHz$, $m = \frac{dy}{dx}$

C =the value of y where x = 0 (the y intercept).

3 Protection limit (expressed as the e.i.r.p. (in dBW) of that limit):

-10.0 dBW at 768.000 MHz to -13.5 dBW at 770.500 MHz

-13.5 dBW at 770.500 MHz to -10.0 dBW at 773.000 MHz

$$y = mx + C$$

where
$$y = dBW$$
, $x = MHz$, $m = \frac{dy}{dx}$

C =the value of y where x = 0 (the y intercept).

4 Power floor levels (expressed as the e.i.r.p. (in dBW) of that level):

-50.0 dBW at 768.000 MHz to -50.0 dBW at 773.000 MHz

5 The conditions that apply to licences created in relation to the record of management rights are:

The manager shall not transfer the manager's interest in this Management Right, or issue any licence, to any foreign government, or to any party on behalf of any foreign government, without first obtaining the written approval of the Chief Executive of the Ministry of Business, Innovation and Employment.

Any licences created that are not frequency division duplex (FDD) services must not cause harmful interference to, and shall not claim protection from, licences in other management rights that are created for FDD services.

Where systems in adjacent or nearby bands are operated by different licensees or rightholders, bilateral coordination may be necessary to ensure mitigation techniques are introduced to manage interference between bands in accordance with the Act. In particular the implementation of, on a local basis, reasonable network and operational deployment measures (having regard to the relative costs of these measures and alternative non-network measures) may be appropriate where these are necessary to mitigate harmful interference with spectrum licences used to provide broadcast services on frequencies below 694 MHz.

Limits relating to the adjacent frequencies emissions limits, protection limits and power floors on this management right are based on the limits specified in the 3rd Generation Partnership Project (3GPP) standards 3GPP TS 36.101, 3GPP TS 36.104 and 3GPP TR 36.820 and have been normalized to a bandwidth of 1 MHz.

6 The commencement date of the record of management rights is

12 March 2010

7 The expiry date of the record of management rights is

Record of management rights

1 Range of frequencies to be recorded in the Register:

Lower Boundary Frequency: 718.000 MHz Upper Boundary Frequency: 723.000 MHz

2 Adjacent frequencies emission limits (expressed as the maximum e.i.r.p. (in dBW) of those emissions):

Below lower boundary frequency:

-64.0 dBW at 650.000 MHz to -64.0 dBW at 694.000 MHz -64.0 dBW at 694.000 MHz to -55.0 dBW at 694.000 MHz -55.0 dBW at 694.000 MHz to -55.0 dBW at 698.000 MHz -55.0 dBW at 698.000 MHz to -43.0 dBW at 698.000 MHz -43.0 dBW at 698.000 MHz to -43.0 dBW at 713.000 MHz -43.0 dBW at 713.000 MHz to -40.0 dBW at 713.000 MHz -40.0 dBW at 717.000 MHz -40.0 dBW at 717.000 MHz -30.0 dBW at 717.000 MHz -30.0 dBW at 717.000 MHz -30.0 dBW at 717.000 MHz

Above upper boundary frequency:

-30.0 dBW at 723.000 MHz to -30.0 dBW at 724.000 MHz -30.0 dBW at 724.000 MHz to -40.0 dBW at 724.000 MHz -40.0 dBW at 724.000 MHz to -40.0 dBW at 728.000 MHz -40.0 dBW at 728.000 MHz to -43.0 dBW at 728.000 MHz -43.0 dBW at 728.000 MHz to -43.0 dBW at 743.000 MHz -43.0 dBW at 743.000 MHz to -55.0 dBW at 743.000 MHz -55.0 dBW at 743.000 MHz to -55.0 dBW at 758.000 MHz -55.0 dBW at 758.000 MHz to -62.0 dBW at 758.000 MHz -62.0 dBW at 773.000 MHz -62.0 dBW at 773.000 MHz to -80.0 dBW at 773.000 MHz -80.0 dBW at 773.000 MHz to -80.0 dBW at 803.000 MHz

Note: The adjacent frequencies emission limits applicable to frequencies within each specified range must be determined in accordance with the following formula:

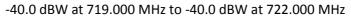
$$y = mx + C$$

where y = dBW, x = MHz, $m = \frac{dy}{dx}$

C =the value of y where x = 0 (the y intercept).

3 Protection limit (expressed as the e.i.r.p. (in dBW) of that limit):

-30.0 dBW at 718.000 MHz to -30.0 dBW at 719.000 MHz -30.0 dBW at 719.000 MHz to -40.0 dBW at 719.000 MHz



Note: The protection limit applicable to frequencies within each specified range must be determined in accordance with the following formula:

$$y = mx + C$$

where y = dBW, x = MHz, m =
$$\frac{dy}{dx}$$

C =the value of y where x = 0 (the y intercept).

4 Power floor levels (expressed as the e.i.r.p. (in dBW) of that level):

-50.0 dBW at 718.000 MHz to -50.0 dBW at 723.000 MHz

5 The conditions that apply to licences created in relation to the record of management rights are:

The manager shall not transfer the manager's interest in this Management Right, or issue any licence, to any foreign government, or to any party on behalf of any foreign government, without first obtaining the written approval of the Chief Executive of the Ministry of Business, Innovation and Employment.

Any licences created that are not frequency division duplex (FDD) services must not cause harmful interference to, and shall not claim protection from, licences in other management rights that are created for FDD services.

Where systems in adjacent or nearby bands are operated by different licensees or rightholders, bilateral coordination may be necessary to ensure mitigation techniques are introduced to manage interference between bands in accordance with the Act. In particular the implementation of, on a local basis, reasonable network and operational deployment measures (having regard to the relative costs of these measures and alternative non-network measures) may be appropriate where these are necessary to mitigate harmful interference with spectrum licences used to provide broadcast services on frequencies below 694 MHz.

Limits relating to the adjacent frequencies emissions limits, protection limits and power floors on this management right are based on the limits specified in the 3rd Generation Partnership Project (3GPP) standards 3GPP TS 36.101, 3GPP TS 36.104 and 3GPP TR 36.820 and have been normalized to a bandwidth of 1 MHz.

6 The commencement date of the record of management rights is

12 March 2010

7 The expiry date of the record of management rights is

Record of management rights

1 Range of frequencies to be recorded in the Register:

Lower Boundary Frequency: 773.000 MHz Upper Boundary Frequency: 778.000 MHz

2 Adjacent frequencies emission limits (expressed as the maximum e.i.r.p. (in dBW) of those emissions):

Below lower boundary frequency:

-64.0 dBW at 650.000 MHz to -64.0 dBW at 703.000 MHz

-64.0 dBW at 703.000 MHz to -99.0 dBW at 703.000 MHz

-99.0 dBW at 703.000 MHz to -99.0 dBW at 748.000 MHz

-99.0 dBW at 748.000 MHz to -16.0 dBW at 748.000 MHz

-16.0 dBW at 748.000 MHz to -16.0 dBW at 763.000 MHz

-16.0 dBW at 763.000 MHz to -17.0 dBW at 763.000 MHz

-17.0 dBW at 763.000 MHz to -17.0 dBW at 768.000 MHz

-17.0 dBW at 768.000 MHz to -10.0 dBW at 773.000 MHz

Above upper boundary frequency:

-10.0 dBW at 778.000 MHz to -17.0 dBW at 783.000 MHz

-17.0 dBW at 783.000 MHz to -17.0 dBW at 788.000 MHz

-17.0 dBW at 788.000 MHz to -16.0 dBW at 788.000 MHz

-16.0 dBW at 788.000 MHz to -16.0 dBW at 807.000 MHz

-16.0 dBW at 807.000 MHz to -62.0 dBW at 807.000 MHz

-62.0 dBW at 807.000 MHz to -62.0 dBW at 825.000 MHz

Note: The adjacent frequencies emission limits applicable to frequencies within each specified range must be determined in accordance with the following formula:

$$y = mx + C$$

where
$$y = dBW$$
, $x = MHz$, $m = \frac{dy}{dx}$

C =the value of y where x = 0 (the y intercept).

3 Protection limit (expressed as the e.i.r.p. (in dBW) of that limit):

-10.0 dBW at 773.000 MHz to -13.5 dBW at 775.500 MHz

-13.5 dBW at 775.500 MHz to -10.0 dBW at 778.000 MHz

$$y = mx + C$$

where
$$y = dBW$$
, $x = MHz$, $m = \frac{dy}{dx}$

C =the value of y where x = 0 (the y intercept).

4 Power floor levels (expressed as the e.i.r.p. (in dBW) of that level):

-50.0 dBW at 773.000 MHz to -50.0 dBW at 778.000 MHz

5 The conditions that apply to licences created in relation to the record of management rights are:

The manager shall not transfer the manager's interest in this Management Right, or issue any licence, to any foreign government, or to any party on behalf of any foreign government, without first obtaining the written approval of the Chief Executive of the Ministry of Business, Innovation and Employment.

Any licences created that are not frequency division duplex (FDD) services must not cause harmful interference to, and shall not claim protection from, licences in other management rights that are created for FDD services.

Where systems in adjacent or nearby bands are operated by different licensees or rightholders, bilateral coordination may be necessary to ensure mitigation techniques are introduced to manage interference between bands in accordance with the Act. In particular the implementation of, on a local basis, reasonable network and operational deployment measures (having regard to the relative costs of these measures and alternative non-network measures) may be appropriate where these are necessary to mitigate harmful interference with spectrum licences used to provide broadcast services on frequencies below 694 MHz.

Limits relating to the adjacent frequencies emissions limits, protection limits and power floors on this management right are based on the limits specified in the 3rd Generation Partnership Project (3GPP) standards 3GPP TS 36.101, 3GPP TS 36.104 and 3GPP TR 36.820 and have been normalized to a bandwidth of 1 MHz.

6 The commencement date of the record of management rights is

12 March 2010

7 The expiry date of the record of management rights is

Record of management rights

1 Range of frequencies to be recorded in the Register:

Lower Boundary Frequency: 723.000 MHz Upper Boundary Frequency: 728.000 MHz

2 Adjacent frequencies emission limits (expressed as the maximum e.i.r.p. (in dBW) of those emissions):

Below lower boundary frequency:

-64.0 dBW at 650.000 MHz to -64.0 dBW at 694.000 MHz -64.0 dBW at 694.000 MHz to -55.0 dBW at 694.000 MHz -55.0 dBW at 694.000 MHz to -55.0 dBW at 703.000 MHz -55.0 dBW at 703.000 MHz to -43.0 dBW at 703.000 MHz -43.0 dBW at 703.000 MHz to -43.0 dBW at 718.000 MHz -43.0 dBW at 718.000 MHz to -40.0 dBW at 718.000 MHz -40.0 dBW at 718.000 MHz to -40.0 dBW at 722.000 MHz -40.0 dBW at 722.000 MHz to -30.0 dBW at 723.000 MHz -30.0 dBW at 723.000 MHz

Above upper boundary frequency:

-30.0 dBW at 728.000 MHz to -30.0 dBW at 729.000 MHz -30.0 dBW at 729.000 MHz to -40.0 dBW at 729.000 MHz -40.0 dBW at 729.000 MHz to -40.0 dBW at 733.000 MHz -40.0 dBW at 733.000 MHz to -43.0 dBW at 733.000 MHz -43.0 dBW at 733.000 MHz to -43.0 dBW at 748.000 MHz -43.0 dBW at 748.000 MHz to -55.0 dBW at 748.000 MHz -55.0 dBW at 748.000 MHz to -55.0 dBW at 758.000 MHz -55.0 dBW at 758.000 MHz to -62.0 dBW at 758.000 MHz -62.0 dBW at 773.000 MHz -62.0 dBW at 773.000 MHz to -80.0 dBW at 773.000 MHz -80.0 dBW at 773.000 MHz to -80.0 dBW at 803.000 MHz

Note: The adjacent frequencies emission limits applicable to frequencies within each specified range must be determined in accordance with the following formula:

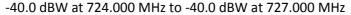
$$y = mx + C$$

where y = dBW, x = MHz, $m = \frac{dy}{dx}$

C =the value of y where x = 0 (the y intercept).

3 Protection limit (expressed as the e.i.r.p. (in dBW) of that limit):

-30.0 dBW at 723.000 MHz to -30.0 dBW at 724.000 MHz -30.0 dBW at 724.000 MHz to -40.0 dBW at 724.000 MHz



Note: The protection limit applicable to frequencies within each specified range must be determined in accordance with the following formula:

$$y = mx + C$$

where y = dBW, x = MHz, m =
$$\frac{dy}{dx}$$

C =the value of y where x = 0 (the y intercept).

4 Power floor levels (expressed as the e.i.r.p. (in dBW) of that level):

-50.0 dBW at 723.000 MHz to -50.0 dBW at 728.000 MHz

5 The conditions that apply to licences created in relation to the record of management rights are:

The manager shall not transfer the manager's interest in this Management Right, or issue any licence, to any foreign government, or to any party on behalf of any foreign government, without first obtaining the written approval of the Chief Executive of the Ministry of Business, Innovation and Employment.

Any licences created that are not frequency division duplex (FDD) services must not cause harmful interference to, and shall not claim protection from, licences in other management rights that are created for FDD services.

Where systems in adjacent or nearby bands are operated by different licensees or rightholders, bilateral coordination may be necessary to ensure mitigation techniques are introduced to manage interference between bands in accordance with the Act. In particular the implementation of, on a local basis, reasonable network and operational deployment measures (having regard to the relative costs of these measures and alternative non-network measures) may be appropriate where these are necessary to mitigate harmful interference with spectrum licences used to provide broadcast services on frequencies below 694 MHz.

Limits relating to the adjacent frequencies emissions limits, protection limits and power floors on this management right are based on the limits specified in the 3rd Generation Partnership Project (3GPP) standards 3GPP TS 36.101, 3GPP TS 36.104 and 3GPP TR 36.820 and have been normalized to a bandwidth of 1 MHz.

6 The commencement date of the record of management rights is

12 March 2010

7 The expiry date of the record of management rights is



Record of management rights

1 Range of frequencies to be recorded in the Register:

Lower Boundary Frequency: 778.000 MHz Upper Boundary Frequency: 783.000 MHz

2 Adjacent frequencies emission limits (expressed as the maximum e.i.r.p. (in dBW) of those emissions):

Below lower boundary frequency:

-64.0 dBW at 650.000 MHz to -64.0 dBW at 703.000 MHz

-64.0 dBW at 703.000 MHz to -99.0 dBW at 703.000 MHz

-99.0 dBW at 703.000 MHz to -99.0 dBW at 748.000 MHz

-99.0 dBW at 748.000 MHz to -16.0 dBW at 748.000 MHz

-16.0 dBW at 748.000 MHz to -16.0 dBW at 768.000 MHz

-16.0 dBW at 768.000 MHz to -17.0 dBW at 768.000 MHz

-17.0 dBW at 768.000 MHz to -17.0 dBW at 773.000 MHz

-17.0 dBW at 773.000 MHz to -10.0 dBW at 778.000 MHz

Above upper boundary frequency:

-10.0 dBW at 783.000 MHz to -17.0 dBW at 788.000 MHz

-17.0 dBW at 788.000 MHz to -17.0 dBW at 793.000 MHz

-17.0 dBW at 793.000 MHz to -16.0 dBW at 793.000 MHz

-16.0 dBW at 793.000 MHz to -16.0 dBW at 807.000 MHz

-16.0 dBW at 807.000 MHz to -62.0 dBW at 807.000 MHz

-62.0 dBW at 807.000 MHz to -62.0 dBW at 825.000 MHz

Note: The adjacent frequencies emission limits applicable to frequencies within each specified range must be determined in accordance with the following formula:

$$y = mx + C$$

where
$$y = dBW$$
, $x = MHz$, $m = \frac{dy}{dx}$

C =the value of y where x = 0 (the y intercept).

3 Protection limit (expressed as the e.i.r.p. (in dBW) of that limit):

-10.0 dBW at 778.000 MHz to -13.5 dBW at 780.500 MHz

-13.5 dBW at 780.500 MHz to -10.0 dBW at 783.000 MHz

$$y = mx + C$$

where
$$y = dBW$$
, $x = MHz$, $m = \frac{dy}{dx}$

C =the value of y where x = 0 (the y intercept).

4 Power floor levels (expressed as the e.i.r.p. (in dBW) of that level):

-50.0 dBW at 778.000 MHz to -50.0 dBW at 783.000 MHz

5 The conditions that apply to licences created in relation to the record of management rights are:

The manager shall not transfer the manager's interest in this Management Right, or issue any licence, to any foreign government, or to any party on behalf of any foreign government, without first obtaining the written approval of the Chief Executive of the Ministry of Business, Innovation and Employment.

Any licences created that are not frequency division duplex (FDD) services must not cause harmful interference to, and shall not claim protection from, licences in other management rights that are created for FDD services.

Where systems in adjacent or nearby bands are operated by different licensees or rightholders, bilateral coordination may be necessary to ensure mitigation techniques are introduced to manage interference between bands in accordance with the Act. In particular the implementation of, on a local basis, reasonable network and operational deployment measures (having regard to the relative costs of these measures and alternative non-network measures) may be appropriate where these are necessary to mitigate harmful interference with spectrum licences used to provide broadcast services on frequencies below 694 MHz.

Limits relating to the adjacent frequencies emissions limits, protection limits and power floors on this management right are based on the limits specified in the 3rd Generation Partnership Project (3GPP) standards 3GPP TS 36.101, 3GPP TS 36.104 and 3GPP TR 36.820 and have been normalized to a bandwidth of 1 MHz.

6 The commencement date of the record of management rights is

12 March 2010

7 The expiry date of the record of management rights is

Record of management rights

1 Range of frequencies to be recorded in the Register:

Lower Boundary Frequency: 728.000 MHz Upper Boundary Frequency: 733.000 MHz

2 Adjacent frequencies emission limits (expressed as the maximum e.i.r.p. (in dBW) of those emissions):

Below lower boundary frequency:

-64.0 dBW at 650.000 MHz to -64.0 dBW at 694.000 MHz -64.0 dBW at 694.000 MHz to -55.0 dBW at 694.000 MHz -55.0 dBW at 694.000 MHz to -55.0 dBW at 708.000 MHz -55.0 dBW at 708.000 MHz to -43.0 dBW at 708.000 MHz -43.0 dBW at 708.000 MHz to -43.0 dBW at 723.000 MHz -43.0 dBW at 723.000 MHz to -40.0 dBW at 723.000 MHz -40.0 dBW at 727.000 MHz -40.0 dBW at 727.000 MHz -30.0 dBW at 727.000 MHz -30.0 dBW at 727.000 MHz -30.0 dBW at 727.000 MHz

Above upper boundary frequency:

-30.0 dBW at 733.000 MHz to -30.0 dBW at 734.000 MHz -30.0 dBW at 734.000 MHz to -40.0 dBW at 734.000 MHz -40.0 dBW at 734.000 MHz to -40.0 dBW at 738.000 MHz -40.0 dBW at 738.000 MHz to -43.0 dBW at 738.000 MHz -43.0 dBW at 738.000 MHz to -43.0 dBW at 753.000 MHz -43.0 dBW at 753.000 MHz to -55.0 dBW at 753.000 MHz -55.0 dBW at 753.000 MHz to -55.0 dBW at 758.000 MHz -55.0 dBW at 758.000 MHz to -62.0 dBW at 758.000 MHz -62.0 dBW at 773.000 MHz -62.0 dBW at 773.000 MHz to -80.0 dBW at 773.000 MHz -80.0 dBW at 773.000 MHz to -80.0 dBW at 803.000 MHz

Note: The adjacent frequencies emission limits applicable to frequencies within each specified range must be determined in accordance with the following formula:

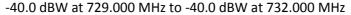
$$v = mx + C$$

where y = dBW, x = MHz, $m = \frac{dy}{dx}$

C =the value of y where x = 0 (the y intercept).

3 Protection limit (expressed as the e.i.r.p. (in dBW) of that limit):

-30.0 dBW at 728.000 MHz to -30.0 dBW at 729.000 MHz -30.0 dBW at 729.000 MHz to -40.0 dBW at 729.000 MHz



Note: The protection limit applicable to frequencies within each specified range must be determined in accordance with the following formula:

$$y = mx + C$$

where y = dBW, x = MHz, m =
$$\frac{dy}{dx}$$

C =the value of y where x = 0 (the y intercept).

4 Power floor levels (expressed as the e.i.r.p. (in dBW) of that level):

-50.0 dBW at 728.000 MHz to -50.0 dBW at 733.000 MHz

5 The conditions that apply to licences created in relation to the record of management rights are:

The manager shall not transfer the manager's interest in this Management Right, or issue any licence, to any foreign government, or to any party on behalf of any foreign government, without first obtaining the written approval of the Chief Executive of the Ministry of Business, Innovation and Employment.

Any licences created that are not frequency division duplex (FDD) services must not cause harmful interference to, and shall not claim protection from, licences in other management rights that are created for FDD services.

Where systems in adjacent or nearby bands are operated by different licensees or rightholders, bilateral coordination may be necessary to ensure mitigation techniques are introduced to manage interference between bands in accordance with the Act. In particular the implementation of, on a local basis, reasonable network and operational deployment measures (having regard to the relative costs of these measures and alternative non-network measures) may be appropriate where these are necessary to mitigate harmful interference with spectrum licences used to provide broadcast services on frequencies below 694 MHz.

Limits relating to the adjacent frequencies emissions limits, protection limits and power floors on this management right are based on the limits specified in the 3rd Generation Partnership Project (3GPP) standards 3GPP TS 36.101, 3GPP TS 36.104 and 3GPP TR 36.820 and have been normalized to a bandwidth of 1 MHz.

6 The commencement date of the record of management rights is

12 March 2010

7 The expiry date of the record of management rights is

Record of management rights

1 Range of frequencies to be recorded in the Register:

Lower Boundary Frequency: 783.000 MHz Upper Boundary Frequency: 788.000 MHz

2 Adjacent frequencies emission limits (expressed as the maximum e.i.r.p. (in dBW) of those emissions):

Below lower boundary frequency:

-64.0 dBW at 650.000 MHz to -64.0 dBW at 703.000 MHz

-64.0 dBW at 703.000 MHz to -99.0 dBW at 703.000 MHz

-99.0 dBW at 703.000 MHz to -99.0 dBW at 748.000 MHz

-99.0 dBW at 748.000 MHz to -16.0 dBW at 748.000 MHz

-16.0 dBW at 748.000 MHz to -16.0 dBW at 773.000 MHz

-16.0 dBW at 773.000 MHz to -17.0 dBW at 773.000 MHz

-17.0 dBW at 773.000 MHz to -17.0 dBW at 778.000 MHz

-17.0 dBW at 778.000 MHz to -10.0 dBW at 783.000 MHz

Above upper boundary frequency:

-10.0 dBW at 788.000 MHz to -17.0 dBW at 793.000 MHz

-17.0 dBW at 793.000 MHz to -17.0 dBW at 798.000 MHz

-17.0 dBW at 798.000 MHz to -16.0 dBW at 798.000 MHz

-16.0 dBW at 798.000 MHz to -16.0 dBW at 807.000 MHz

-16.0 dBW at 807.000 MHz to -62.0 dBW at 807.000 MHz

-62.0 dBW at 807.000 MHz to -62.0 dBW at 825.000 MHz

Note: The adjacent frequencies emission limits applicable to frequencies within each specified range must be determined in accordance with the following formula:

$$y = mx + C$$

where
$$y = dBW$$
, $x = MHz$, $m = \frac{dy}{dx}$

C =the value of y where x = 0 (the y intercept).

3 Protection limit (expressed as the e.i.r.p. (in dBW) of that limit):

-10.0 dBW at 783.000 MHz to -13.5 dBW at 785.500 MHz

-13.5 dBW at 785.500 MHz to -10.0 dBW at 788.000 MHz

$$y = mx + C$$

where
$$y = dBW$$
, $x = MHz$, $m = \frac{dy}{dx}$

C =the value of y where x = 0 (the y intercept).

4 Power floor levels (expressed as the e.i.r.p. (in dBW) of that level):

-50.0 dBW at 783.000 MHz to -50.0 dBW at 788.000 MHz

5 The conditions that apply to licences created in relation to the record of management rights are:

The manager shall not transfer the manager's interest in this Management Right, or issue any licence, to any foreign government, or to any party on behalf of any foreign government, without first obtaining the written approval of the Chief Executive of the Ministry of Business, Innovation and Employment.

Any licences created that are not frequency division duplex (FDD) services must not cause harmful interference to, and shall not claim protection from, licences in other management rights that are created for FDD services.

Where systems in adjacent or nearby bands are operated by different licensees or rightholders, bilateral coordination may be necessary to ensure mitigation techniques are introduced to manage interference between bands in accordance with the Act. In particular the implementation of, on a local basis, reasonable network and operational deployment measures (having regard to the relative costs of these measures and alternative non-network measures) may be appropriate where these are necessary to mitigate harmful interference with spectrum licences used to provide broadcast services on frequencies below 694 MHz.

Limits relating to the adjacent frequencies emissions limits, protection limits and power floors on this management right are based on the limits specified in the 3rd Generation Partnership Project (3GPP) standards 3GPP TS 36.101, 3GPP TS 36.104 and 3GPP TR 36.820 and have been normalized to a bandwidth of 1 MHz.

6 The commencement date of the record of management rights is

12 March 2010

7 The expiry date of the record of management rights is

Record of management rights

1 Range of frequencies to be recorded in the Register:

Lower Boundary Frequency: 733.000 MHz Upper Boundary Frequency: 738.000 MHz

2 Adjacent frequencies emission limits (expressed as the maximum e.i.r.p. (in dBW) of those emissions):

Below lower boundary frequency:

-64.0 dBW at 650.000 MHz to -64.0 dBW at 694.000 MHz -64.0 dBW at 694.000 MHz to -55.0 dBW at 694.000 MHz -55.0 dBW at 694.000 MHz to -55.0 dBW at 713.000 MHz -55.0 dBW at 713.000 MHz to -43.0 dBW at 713.000 MHz -43.0 dBW at 713.000 MHz to -43.0 dBW at 728.000 MHz -43.0 dBW at 728.000 MHz to -40.0 dBW at 728.000 MHz -40.0 dBW at 732.000 MHz -40.0 dBW at 732.000 MHz to -30.0 dBW at 732.000 MHz -30.0 dBW at 732.000 MHz -30.0 dBW at 733.000 MHz

Above upper boundary frequency:

-30.0 dBW at 738.000 MHz to -30.0 dBW at 739.000 MHz -30.0 dBW at 739.000 MHz to -40.0 dBW at 739.000 MHz -40.0 dBW at 739.000 MHz to -40.0 dBW at 743.000 MHz -40.0 dBW at 743.000 MHz to -43.0 dBW at 743.000 MHz -43.0 dBW at 743.000 MHz to -43.0 dBW at 758.000 MHz -43.0 dBW at 758.000 MHz to -62.0 dBW at 758.000 MHz -62.0 dBW at 758.000 MHz to -62.0 dBW at 773.000 MHz -62.0 dBW at 773.000 MHz to -80.0 dBW at 773.000 MHz -80.0 dBW at 773.000 MHz

Note: The adjacent frequencies emission limits applicable to frequencies within each specified range must be determined in accordance with the following formula:

$$y = mx + C$$

where
$$y = dBW$$
, $x = MHz$, $m = \frac{dy}{dx}$

C =the value of y where x = 0 (the y intercept).

3 Protection limit (expressed as the e.i.r.p. (in dBW) of that limit):

-30.0 dBW at 733.000 MHz to -30.0 dBW at 734.000 MHz -30.0 dBW at 734.000 MHz to -40.0 dBW at 734.000 MHz -40.0 dBW at 737.000 MHz to -40.0 dBW at 737.000 MHz -40.0 dBW at 737.000 MHz to -30.0 dBW at 737.000 MHz

-30.0 dBW at 737.000 MHz to -30.0 dBW at 738.000 MHz

Note: The protection limit applicable to frequencies within each specified range must be determined in accordance with the following formula:

$$v = mx + C$$

where y = dBW, x = MHz, $m = \frac{dy}{dx}$

C =the value of y where x = 0 (the y intercept).

4 Power floor levels (expressed as the e.i.r.p. (in dBW) of that level):

-50.0 dBW at 733.000 MHz to -50.0 dBW at 738.000 MHz

5 The conditions that apply to licences created in relation to the record of management rights are:

The manager shall not transfer the manager's interest in this Management Right, or issue any licence, to any foreign government, or to any party on behalf of any foreign government, without first obtaining the written approval of the Chief Executive of the Ministry of Business, Innovation and Employment.

Any licences created that are not frequency division duplex (FDD) services must not cause harmful interference to, and shall not claim protection from, licences in other management rights that are created for FDD services.

Where systems in adjacent or nearby bands are operated by different licensees or rightholders, bilateral coordination may be necessary to ensure mitigation techniques are introduced to manage interference between bands in accordance with the Act. In particular the implementation of, on a local basis, reasonable network and operational deployment measures (having regard to the relative costs of these measures and alternative non-network measures) may be appropriate where these are necessary to mitigate harmful interference with spectrum licences used to provide broadcast services on frequencies below 694 MHz.

Limits relating to the adjacent frequencies emissions limits, protection limits and power floors on this management right are based on the limits specified in the 3rd Generation Partnership Project (3GPP) standards 3GPP TS 36.101, 3GPP TS 36.104 and 3GPP TR 36.820 and have been normalized to a bandwidth of 1 MHz.

6 The commencement date of the record of management rights is

12 March 2010

7 The expiry date of the record of management rights is

Record of management rights

1 Range of frequencies to be recorded in the Register:

Lower Boundary Frequency: 788.000 MHz Upper Boundary Frequency: 793.000 MHz

2 Adjacent frequencies emission limits (expressed as the maximum e.i.r.p. (in dBW) of those emissions):

Below lower boundary frequency:

-64.0 dBW at 650.000 MHz to -64.0 dBW at 703.000 MHz

-64.0 dBW at 703.000 MHz to -99.0 dBW at 703.000 MHz

-99.0 dBW at 703.000 MHz to -99.0 dBW at 748.000 MHz

-99.0 dBW at 748.000 MHz to -16.0 dBW at 748.000 MHz

-16.0 dBW at 748.000 MHz to -16.0 dBW at 778.000 MHz

-16.0 dBW at 778.000 MHz to -17.0 dBW at 778.000 MHz

-17.0 dBW at 778.000 MHz to -17.0 dBW at 783.000 MHz

-17.0 dBW at 783.000 MHz to -10.0 dBW at 788.000 MHz

Above upper boundary frequency:

-10.0 dBW at 793.000 MHz to -17.0 dBW at 798.000 MHz

-17.0 dBW at 798.000 MHz to -17.0 dBW at 803.000 MHz

-17.0 dBW at 803.000 MHz to -16.0 dBW at 803.000 MHz

-16.0 dBW at 803.000 MHz to -16.0 dBW at 807.000 MHz

-16.0 dBW at 807.000 MHz to -62.0 dBW at 807.000 MHz

-62.0 dBW at 807.000 MHz to -62.0 dBW at 825.000 MHz

Note: The adjacent frequencies emission limits applicable to frequencies within each specified range must be determined in accordance with the following formula:

$$y = mx + C$$

where
$$y = dBW$$
, $x = MHz$, $m = \frac{dy}{dx}$

C =the value of y where x = 0 (the y intercept).

3 Protection limit (expressed as the e.i.r.p. (in dBW) of that limit):

-10.0 dBW at 788.000 MHz to -13.5 dBW at 790.500 MHz

-13.5 dBW at 790.500 MHz to -10.0 dBW at 793.000 MHz

$$v = mx + C$$

where
$$y = dBW$$
, $x = MHz$, $m = \frac{dy}{dx}$

C =the value of y where x = 0 (the y intercept).

4 Power floor levels (expressed as the e.i.r.p. (in dBW) of that level):

-50.0 dBW at 788.000 MHz to -50.0 dBW at 793.000 MHz

5 The conditions that apply to licences created in relation to the record of management rights are:

The manager shall not transfer the manager's interest in this Management Right, or issue any licence, to any foreign government, or to any party on behalf of any foreign government, without first obtaining the written approval of the Chief Executive of the Ministry of Business, Innovation and Employment.

Any licences created that are not frequency division duplex (FDD) services must not cause harmful interference to, and shall not claim protection from, licences in other management rights that are created for FDD services.

Where systems in adjacent or nearby bands are operated by different licensees or rightholders, bilateral coordination may be necessary to ensure mitigation techniques are introduced to manage interference between bands in accordance with the Act. In particular the implementation of, on a local basis, reasonable network and operational deployment measures (having regard to the relative costs of these measures and alternative non-network measures) may be appropriate where these are necessary to mitigate harmful interference with spectrum licences used to provide broadcast services on frequencies below 694 MHz.

Limits relating to the adjacent frequencies emissions limits, protection limits and power floors on this management right are based on the limits specified in the 3rd Generation Partnership Project (3GPP) standards 3GPP TS 36.101, 3GPP TS 36.104 and 3GPP TR 36.820 and have been normalized to a bandwidth of 1 MHz.

6 The commencement date of the record of management rights is

12 March 2010

7 The expiry date of the record of management rights is

Record of management rights

1 Range of frequencies to be recorded in the Register:

Lower Boundary Frequency: 738.000 MHz Upper Boundary Frequency: 743.000 MHz

2 Adjacent frequencies emission limits (expressed as the maximum e.i.r.p. (in dBW) of those emissions):

Below lower boundary frequency:

-64.0 dBW at 650.000 MHz to -64.0 dBW at 694.000 MHz -64.0 dBW at 694.000 MHz to -55.0 dBW at 694.000 MHz -55.0 dBW at 694.000 MHz to -55.0 dBW at 718.000 MHz -55.0 dBW at 718.000 MHz to -43.0 dBW at 718.000 MHz -43.0 dBW at 718.000 MHz to -43.0 dBW at 733.000 MHz -43.0 dBW at 733.000 MHz to -40.0 dBW at 733.000 MHz -40.0 dBW at 737.000 MHz -40.0 dBW at 737.000 MHz to -30.0 dBW at 737.000 MHz -30.0 dBW at 737.000 MHz -30.0 dBW at 737.000 MHz

Above upper boundary frequency:

-30.0 dBW at 743.000 MHz to -30.0 dBW at 744.000 MHz -30.0 dBW at 744.000 MHz to -40.0 dBW at 744.000 MHz -40.0 dBW at 744.000 MHz to -40.0 dBW at 748.000 MHz -40.0 dBW at 748.000 MHz to -43.0 dBW at 748.000 MHz -43.0 dBW at 748.000 MHz to -43.0 dBW at 758.000 MHz -43.0 dBW at 758.000 MHz to -62.0 dBW at 758.000 MHz -62.0 dBW at 758.000 MHz to -62.0 dBW at 773.000 MHz -62.0 dBW at 773.000 MHz to -80.0 dBW at 773.000 MHz -80.0 dBW at 773.000 MHz

Note: The adjacent frequencies emission limits applicable to frequencies within each specified range must be determined in accordance with the following formula:

$$y = mx + C$$

where
$$y = dBW$$
, $x = MHz$, $m = \frac{dy}{dx}$

C =the value of y where x = 0 (the y intercept).

3 Protection limit (expressed as the e.i.r.p. (in dBW) of that limit):

-30.0 dBW at 738.000 MHz to -30.0 dBW at 739.000 MHz -30.0 dBW at 739.000 MHz to -40.0 dBW at 739.000 MHz -40.0 dBW at 742.000 MHz to -40.0 dBW at 742.000 MHz -40.0 dBW at 742.000 MHz to -30.0 dBW at 742.000 MHz

-30.0 dBW at 742.000 MHz to -30.0 dBW at 743.000 MHz

Note: The protection limit applicable to frequencies within each specified range must be determined in accordance with the following formula:

$$v = mx + C$$

where y = dBW, x = MHz, $m = \frac{dy}{dx}$

C =the value of y where x = 0 (the y intercept).

4 Power floor levels (expressed as the e.i.r.p. (in dBW) of that level):

-50.0 dBW at 738.000 MHz to -50.0 dBW at 743.000 MHz

5 The conditions that apply to licences created in relation to the record of management rights are:

The manager shall not transfer the manager's interest in this Management Right, or issue any licence, to any foreign government, or to any party on behalf of any foreign government, without first obtaining the written approval of the Chief Executive of the Ministry of Business, Innovation and Employment.

Any licences created that are not frequency division duplex (FDD) services must not cause harmful interference to, and shall not claim protection from, licences in other management rights that are created for FDD services.

Where systems in adjacent or nearby bands are operated by different licensees or rightholders, bilateral coordination may be necessary to ensure mitigation techniques are introduced to manage interference between bands in accordance with the Act. In particular the implementation of, on a local basis, reasonable network and operational deployment measures (having regard to the relative costs of these measures and alternative non-network measures) may be appropriate where these are necessary to mitigate harmful interference with spectrum licences used to provide broadcast services on frequencies below 694 MHz.

Limits relating to the adjacent frequencies emissions limits, protection limits and power floors on this management right are based on the limits specified in the 3rd Generation Partnership Project (3GPP) standards 3GPP TS 36.101, 3GPP TS 36.104 and 3GPP TR 36.820 and have been normalized to a bandwidth of 1 MHz.

6 The commencement date of the record of management rights is

12 March 2010

7 The expiry date of the record of management rights is

Record of management rights

1 Range of frequencies to be recorded in the Register:

Lower Boundary Frequency: 793.000 MHz Upper Boundary Frequency: 798.000 MHz

2 Adjacent frequencies emission limits (expressed as the maximum e.i.r.p. (in dBW) of those emissions):

Below lower boundary frequency:

-64.0 dBW at 650.000 MHz to -64.0 dBW at 703.000 MHz

-64.0 dBW at 703.000 MHz to -99.0 dBW at 703.000 MHz

-99.0 dBW at 703.000 MHz to -99.0 dBW at 748.000 MHz

-99.0 dBW at 748.000 MHz to -16.0 dBW at 748.000 MHz

-16.0 dBW at 748.000 MHz to -16.0 dBW at 783.000 MHz

-16.0 dBW at 783.000 MHz to -17.0 dBW at 783.000 MHz

-17.0 dBW at 783.000 MHz to -17.0 dBW at 788.000 MHz

-17.0 dBW at 788.000 MHz to -10.0 dBW at 793.000 MHz

Above upper boundary frequency:

-10.0 dBW at 798.000 MHz to -17.0 dBW at 803.000 MHz

-17.0 dBW at 803.000 MHz to -17.0 dBW at 807.000 MHz

-17.0 dBW at 807.000 MHz to -62.0 dBW at 807.000 MHz

-62.0 dBW at 807.000 MHz to -62.0 dBW at 825.000 MHz

Note: The adjacent frequencies emission limits applicable to frequencies within each specified range must be determined in accordance with the following formula:

$$y = mx + C$$

where
$$y = dBW$$
, $x = MHz$, $m = \frac{dy}{dx}$

C =the value of y where x = 0 (the y intercept).

3 Protection limit (expressed as the e.i.r.p. (in dBW) of that limit):

-10.0 dBW at 793.000 MHz to -13.5 dBW at 795.500 MHz

-13.5 dBW at 795.500 MHz to -10.0 dBW at 798.000 MHz

$$y = mx + C$$

where
$$y = dBW$$
, $x = MHz$, $m = \frac{dy}{dx}$

- C =the value of y where x = 0 (the y intercept).
- 4 Power floor levels (expressed as the e.i.r.p. (in dBW) of that level):

-50.0 dBW at 793.000 MHz to -50.0 dBW at 798.000 MHz

5 The conditions that apply to licences created in relation to the record of management rights are:

The manager shall not transfer the manager's interest in this Management Right, or issue any licence, to any foreign government, or to any party on behalf of any foreign government, without first obtaining the written approval of the Chief Executive of the Ministry of Business, Innovation and Employment.

Any licences created that are not frequency division duplex (FDD) services must not cause harmful interference to, and shall not claim protection from, licences in other management rights that are created for FDD services.

Where systems in adjacent or nearby bands are operated by different licensees or rightholders, bilateral coordination may be necessary to ensure mitigation techniques are introduced to manage interference between bands in accordance with the Act. In particular the implementation of, on a local basis, reasonable network and operational deployment measures (having regard to the relative costs of these measures and alternative non-network measures) may be appropriate where these are necessary to mitigate harmful interference with spectrum licences used to provide broadcast services on frequencies below 694 MHz.

Limits relating to the adjacent frequencies emissions limits, protection limits and power floors on this management right are based on the limits specified in the 3rd Generation Partnership Project (3GPP) standards 3GPP TS 36.101, 3GPP TS 36.104 and 3GPP TR 36.820 and have been normalized to a bandwidth of 1 MHz.

6 The commencement date of the record of management rights is

12 March 2010

7 The expiry date of the record of management rights is

Record of management rights

1 Range of frequencies to be recorded in the Register:

Lower Boundary Frequency: 743.000 MHz Upper Boundary Frequency: 748.000 MHz

2 Adjacent frequencies emission limits (expressed as the maximum e.i.r.p. (in dBW) of those emissions):

Below lower boundary frequency:

-64.0 dBW at 650.000 MHz to -64.0 dBW at 694.000 MHz

-64.0 dBW at 694.000 MHz to -55.0 dBW at 694.000 MHz

-55.0 dBW at 694.000 MHz to -55.0 dBW at 723.000 MHz

-55.0 dBW at 723.000 MHz to -43.0 dBW at 723.000 MHz

-43.0 dBW at 723.000 MHz to -43.0 dBW at 738.000 MHz

-43.0 dBW at 738.000 MHz to -40.0 dBW at 738.000 MHz

-40.0 dBW at 738.000 MHz to -40.0 dBW at 742.000 MHz

-40.0 dBW at 742.000 MHz to -30.0 dBW at 742.000 MHz

-30.0 dBW at 742.000 MHz to -30.0 dBW at 743.000 MHz

Above upper boundary frequency:

-30.0 dBW at 748.000 MHz to -30.0 dBW at 749.000 MHz

-30.0 dBW at 749.000 MHz to -40.0 dBW at 749.000 MHz

-40.0 dBW at 749.000 MHz to -40.0 dBW at 753.000 MHz

-40.0 dBW at 753.000 MHz to -43.0 dBW at 753.000 MHz

-43.0 dBW at 753.000 MHz to -43.0 dBW at 758.000 MHz

-43.0 dBW at 758.000 MHz to -62.0 dBW at 758.000 MHz

-62.0 dBW at 758.000 MHz to -62.0 dBW at 773.000 MHz

-62.0 dBW at 773.000 MHz to -80.0 dBW at 773.000 MHz -80.0 dBW at 773.000 MHz to -80.0 dBW at 803.000 MHz

Note: The adjacent frequencies emission limits applicable to frequencies within each specified range must be determined in accordance with the following formula:

$$y = mx + C$$

where
$$y = dBW$$
, $x = MHz$, $m = \frac{dy}{dx}$

C =the value of y where x = 0 (the y intercept).

3 Protection limit (expressed as the e.i.r.p. (in dBW) of that limit):

-30.0 dBW at 743.000 MHz to -30.0 dBW at 744.000 MHz

-30.0 dBW at 744.000 MHz to -40.0 dBW at 744.000 MHz

-40.0 dBW at 744.000 MHz to -40.0 dBW at 747.000 MHz



-40.0 dBW at 747.000 MHz to -30.0 dBW at 747.000 MHz -30.0 dBW at 747.000 MHz to -30.0 dBW at 748.000 MHz

Note: The protection limit applicable to frequencies within each specified range must be determined in accordance with the following formula:

$$y = mx + C$$

where
$$y = dBW$$
, $x = MHz$, $m = \frac{dy}{dx}$

C =the value of y where x = 0 (the y intercept).

4 Power floor levels (expressed as the e.i.r.p. (in dBW) of that level):

-50.0 dBW at 743.000 MHz to -50.0 dBW at 748.000 MHz

5 The conditions that apply to licences created in relation to the record of management rights are:

The manager shall not transfer the manager's interest in this Management Right, or issue any licence, to any foreign government, or to any party on behalf of any foreign government, without first obtaining the written approval of the Chief Executive of the Ministry of Business, Innovation and Employment.

Any licences created that are not frequency division duplex (FDD) services must not cause harmful interference to, and shall not claim protection from, licences in other management rights that are created for FDD services.

Where systems in adjacent or nearby bands are operated by different licensees or rightholders, bilateral coordination may be necessary to ensure mitigation techniques are introduced to manage interference between bands in accordance with the Act. In particular the implementation of, on a local basis, reasonable network and operational deployment measures (having regard to the relative costs of these measures and alternative non-network measures) may be appropriate where these are necessary to mitigate harmful interference with spectrum licences used to provide broadcast services on frequencies below 694 MHz.

Limits relating to the adjacent frequencies emissions limits, protection limits and power floors on this management right are based on the limits specified in the 3rd Generation Partnership Project (3GPP) standards 3GPP TS 36.101, 3GPP TS 36.104 and 3GPP TR 36.820 and have been normalized to a bandwidth of 1 MHz.

6 The commencement date of the record of management rights is

12 March 2010

7 The expiry date of the record of management rights is

Record of management rights

1 Range of frequencies to be recorded in the Register:

Lower Boundary Frequency: 798.000 MHz Upper Boundary Frequency: 803.000 MHz

2 Adjacent frequencies emission limits (expressed as the maximum e.i.r.p. (in dBW) of those emissions):

Below lower boundary frequency:

- -64.0 dBW at 650.000 MHz to -64.0 dBW at 703.000 MHz
- -64.0 dBW at 703.000 MHz to -99.0 dBW at 703.000 MHz
- -99.0 dBW at 703.000 MHz to -99.0 dBW at 748.000 MHz
- -99.0 dBW at 748.000 MHz to -16.0 dBW at 748.000 MHz
- -16.0 dBW at 748.000 MHz to -16.0 dBW at 788.000 MHz
- -16.0 dBW at 788.000 MHz to -17.0 dBW at 788.000 MHz
- -17.0 dBW at 788.000 MHz to -17.0 dBW at 793.000 MHz
- -17.0 dBW at 793.000 MHz to -10.0 dBW at 798.000 MHz
- Above upper boundary frequency:
 - -10.0 dBW at 803.000 MHz to -15.0 dBW at 807.000 MHz
 - -15.0 dBW at 807.000 MHz to -62.0 dBW at 807.000 MHz
 - -62.0 dBW at 807.000 MHz to -62.0 dBW at 825.000 MHz

Note: The adjacent frequencies emission limits applicable to frequencies within each specified range must be determined in accordance with the following formula:

$$y = mx + C$$

where y = dBW, x = MHz, $m = \frac{dy}{dx}$

C =the value of y where x = 0 (the y intercept).

- 3 Protection limit (expressed as the e.i.r.p. (in dBW) of that limit):
 - -10.0 dBW at 798.000 MHz to -13.5 dBW at 800.500 MHz
 - -13.5 dBW at 800.500 MHz to -10.0 dBW at 803.000 MHz

Note: The protection limit applicable to frequencies within each specified range must be determined in accordance with the following formula:

$$y = mx + C$$

where y = dBW, x = MHz, $m = \frac{dy}{dx}$

C =the value of y where x = 0 (the y intercept).

4 Power floor levels (expressed as the e.i.r.p. (in dBW) of that level):

-50.0 dBW at 798.000 MHz to -50.0 dBW at 803.000 MHz

5 The conditions that apply to licences created in relation to the record of management rights are:

The manager shall not transfer the manager's interest in this Management Right, or issue any licence, to any foreign government, or to any party on behalf of any foreign government, without first obtaining the written approval of the Chief Executive of the Ministry of Business, Innovation and Employment.

Any licences created that are not frequency division duplex (FDD) services must not cause harmful interference to, and shall not claim protection from, licences in other management rights that are created for FDD services.

Where systems in adjacent or nearby bands are operated by different licensees or rightholders, bilateral coordination may be necessary to ensure mitigation techniques are introduced to manage interference between bands in accordance with the Act. In particular the implementation of, on a local basis, reasonable network and operational deployment measures (having regard to the relative costs of these measures and alternative non-network measures) may be appropriate where these are necessary to mitigate harmful interference with spectrum licences used to provide broadcast services on frequencies below 694 MHz.

Limits relating to the adjacent frequencies emissions limits, protection limits and power floors on this management right are based on the limits specified in the 3rd Generation Partnership Project (3GPP) standards 3GPP TS 36.101, 3GPP TS 36.104 and 3GPP TR 36.820 and have been normalized to a bandwidth of 1 MHz.

6 The commencement date of the record of management rights is

12 March 2010

7 The expiry date of the record of management rights is

SCHEDULE 3 – INCUMBENT LICENCE

Clause 7.4 provides that an incumbent licence is registered for operation in the bands 703-748 MHz and 758-803 MHz. This licence provides for the use of radio microphones.

This is registered as licence no. 222923 and expires on 11 March 2015. Details are available on the SMART database which is used to register all licences. The URL is:

http://www.rsm.govt.nz/smart-web/smart/page/-smart/WelcomePage.wdk

SCHEDULE 4 – EXAMPLE STATUTORY DECLARATION



[SAMPLE FORM] STATUTORY DECLARATION

- I, [NAME] of [Place, Occupation], solemnly and sincerely declare that:
 - 1. I am employed by [Company] (the 'Company') and am authorised by the Company to make this declaration on its behalf [if applicable].
 - 2. On behalf of the Company, [Insert the requirements (both the statements and additional information) of clause 11.2 of the Auction Catalogue as appropriate].

And I make this solemn declaration conscientiously believing the same to be true and by virtue of the Oaths and Declarations Act 1957.

[Signed]

Declared at [Place] this [] day of [].

[Signed by a Justice of the Peace or other person authorised to take a statutory declaration in terms of section 9 of the Oaths and Declarations Act 1957]

Examples of people able to take Declarations - a person enrolled as a barrister and solicitor of the High Court; a Justice of the Peace; a notary public; the Registrar or a Deputy Registrar of the Supreme Court; Court of Appeal; High Court or a District Court; a member of Parliament; or an employee of Public Trust authorised for that purpose.

SCHEDULE 5 – AUCTION MANAGER CONTACT DETAILS

Isobel King
Auction Manager (700 MHz)
Radio Spectrum Policy and Planning
Resources, Energy and Communications Branch
Ministry of Business, Innovation and Employment
33 Bowen St
PO Box 1473
WELLINGTON 6140

DDI: (04) 474 2642 Mobile: 027 476 5321

email: <u>isobel.king@mbie.govt.nz</u>