



Commission for
Communications Regulation

Information Notice

GSM Liberalisation Project - Publication of non-confidential submissions, correspondence and other material provided by respondents (and ComReg written responses to same) in the period following publication of submissions to Consultation 09/99 until publication of Consultation 10/71

Document No:	10/79
Date:	29 September 2010

1 Introduction

In December 2009, the Commission for Communications Regulation (ComReg) published its third consultation on the future use of the 900 MHz and 1800 MHz spectrum bands, in which it invited views from interested parties on a range of issues, including auction format, fees and licence conditions for the future release of radio spectrum (see ComReg Document 09/99). Non-confidential versions of submissions to this consultation were published by ComReg in March 2010 (see ComReg Document 10/21).

More recently, and following developments earlier this year relating to the availability of the 800 MHz spectrum band, ComReg published a consultation on its proposals for a joint award of spectrum rights of use in the 800 MHz and 900 MHz (and potentially 1800 MHz) bands (see ComReg Document 10/71).

In the period between these events, ComReg received a submissions, correspondence and other material in connection with the former consultation.

So as to continue ComReg's practice of publishing non-confidential versions of submissions to consultations and other relevant material put to it (and relevant ComReg responses to same), and thereby maintaining the high level of transparency in relation to its on-going consultation process for this matter, this Information Notice:

- sets out a list of these documents in Section 2; and
- compiles non-confidential versions of these documents in Section 3.

2 Documents

Non-confidential submissions, correspondence and other material provided by respondents (and ComReg written responses to same) in the period following publication of submissions to Consultation 09/99 until publication of Consultation 10/71

1. Vodafone: “Re: ComReg's consultation Document 09/99” *(dated 26 February 2010)*
2. ComReg: Reply to Vodafone letter of 26 February 2010 and message received in Commissioner’s Office on 5 March 2010 *(dated 15 March 2010)*
3. Vodafone: “ComReg Document No 09/99: Liberalising the Future Use of the 900 MHz and 1800 MHz” *(dated 23 March 2010)*
4. ComReg: Reply to Vodafone letter of 23 March 2010 *(dated 31 March 2010)*
5. Vodafone: redacted letter to ComReg *(dated 20 May 2010)*
6. Telefonica O2: “O2's 900MHz Licence” *(dated 4 June 2010)*
7. ComReg: Reply to Telefonica O2 of 4 June 2010 *(dated 29 June 2010)*
8. Telefonica O2: “O2's 900MHz Licence - Continued Delays” *(dated 26 July 2010)*
9. ComReg: Reply to Telefonica O2 of 26 July 2010 *(dated 4 August 2010)*
10. Telefonica O2: “O2's 900MHz Licence - Continued Delays” *(dated 4 August 2010)*
11. Hutchison 3G Ireland: “Further Response by Hutchison 3G Ireland Limited in respect of ComReg Doc. No. 09/99 "Liberalising the Future Use of the 900 MHz and 1800 MHz Spectrum Bands" *(dated 15 July 2010)*

3 Non confidential submissions and correspondence

- (1) Vodafone: "Re: ComReg's consultation Document 09/99" (*dated 26 February 2010*)**

26 February 2010



Mr. Alex Chisholm
Chairman
ComReg
Block DEF
Irish Life Centre
Lower Abbey Street
Dublin 1

Dear Alex,

Re: ComReg's Consultation Document 09/99

I refer to ComReg's consultation Document 09/99, on the liberalisation of the future use of the 900 MHz and 1800 Mhz spectrum bands.

See attached Vodafone's comprehensive response to this consultation. I would urge you to afford due consideration to the points made by Vodafone in respect of this consultation and in particular our alternative proposal elaborated in this response which eliminates the risk of significant disruption arising from loss of 900 MHz spectrum. Vodafone's submission is that ComReg will make a serious error if it proceeds with the auction based proposal rather than Vodafone's alternative proposal.

I note that, due to the extraordinarily protracted nature of the consultation process, the time remaining before the expiry of Vodafone's 900 MHz licence is now very limited. The lapse of time is now a significant issue with significant implications for the entire process which ComReg has not addressed.

Please be assured that Vodafone are available to provide further clarifications of its proposal and on any of the material contained in its response.

Yours sincerely

A handwritten signature in black ink, appearing to read "Gerry Fahy".

Gerry Fahy
Strategy Director

M + 353 87 242 3738
Gerry.fahy@vodafone.com

Vodafone Ireland Limited

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(2) ComReg: Reply to Vodafone letter of 26 February 2010 and message received in Commissioner's Office on 5 March 2010 (dated 15 March 2010)



Commission for
Communications Regulation

15 March 2010

Mr. Gerry Fahy
Strategy Director
Vodafone Ireland Ltd.
MountainView
Leopardstown
Dublin 18

Dear Gerry

Thank you for your recent request for you and Richard Feasey to meet with the Commission for the purpose of discussing the ongoing GSM Liberalisation project.

Ordinarily, we are of course delighted to meet with interested parties and indeed transparent communications with industry is a key value of ComReg. However, we are unable to accede to your request at this particular time given the stage we have reached in what is necessarily a highly structured and fully transparent consultation process. As you are aware the closing date for responses to our document 09/99 was 5:00 pm on 26 February 2010, and this allowed a period of approximately 10 weeks for responses to be prepared. We received by the closing date a number of weighty responses from interested parties, including of course the submission from Vodafone.

Given the seriousness of the issues under consideration, the above average amount of time allowed for responses, and the fact that this was the third consultation on this subject, we would naturally expect the submissions received would contain in each case all views of and information considered relevant and necessary by the respondent for our consideration. In addition, any subsequent meetings with interested parties must be held on a structured, transparent basis, with the opportunity to meet being offered to all such parties. We currently expect, in line with our normal practice, to publish these submissions, suitably redacted, in due course, in the interests of full transparency.

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Having outlined why we are unable to accede to your request at this time, ComReg has been and remains fully committed to an open and clear communication process and so while we cannot meet until we have completed a full review of the very extensive and comprehensive written commentaries submitted by all interested parties, we will continue to bear your request in mind.

I hope that I have explained our current position to your satisfaction.

Yours sincerely

Marie Curran
pp John Doherty
Commissioner

(3) Vodafone: "ComReg Document No 09/99: Liberalising the Future Use of the 900 MHz and 1800 MHz" (dated 23 March 2010)



23rd March 2010

Commissioner John Doherty
ComReg
Block DEF
Abbey Court, Irish Life Centre
Lower Abbey Street
Dublin 1

Dear John,

ComReg Document No 09/99: Liberalising the Future Use of the 900 MHz and 1800 MHz Spectrum Bands

I refer to your letter of 15 March and note, with disappointment, that you decline my request for a meeting.

This process, which began in July 2008, has now continued for 20 months and is one of the most protracted ComReg has undertaken. One consequence of the lengthy nature of the process is that the time remaining before the expiry of Vodafone Ireland's 900 MHz licence is now less than 14 months.

As I explained in my letter dated 26 February to your fellow Commissioner, Alex Chisholm, we believe that both the lapse of time since the initiation of the process and the limited time remaining before licence expiry are now in themselves substantive issues which ComReg should take in account when reviewing options in respect of the 900 MHz spectrum band. In particular (and for the reasons we explained in our submission of 26 February), we believe that ComReg would make a serious error if it were to find that the time remaining prior to expiry is sufficient to implement mitigation strategies to deal with the consumer detriment that we have shown will arise in the event of Vodafone not retaining an allocation of 900 MHz spectrum. That was one of the reasons for the alternative proposal Vodafone Ireland made in its submission of 26 February.

As timing is now a crucial issue, may I ask you to clarify when ComReg will take the following steps mentioned in your letter of 15 March:

Completion of its internal review of the written submissions received in response to ComReg Document No 09/99;

Publication of those submissions, in redacted form;

Decision on whether or not to offer the possibility of meetings to all interested parties?

Yours sincerely

A handwritten signature in blue ink, appearing to read "Gerry Fahy".

Gerry Fahy

Strategy Director

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(4) ComReg: Reply to Vodafone letter of 23 March 2010 (dated 31 March 2010)



Commission for
Communications Regulation

31 March 2010

Mr Gerry Fahy
Strategy Director
Vodafone Ireland Limited
Mountain View
Leopardstown
Dublin 18

Re: ComReg Document No. 09/99: Liberalising the Future Use of the 900 MHz and 1800 MHz Spectrum bands.

Dear Gerry

Thank you for Vodafone Ireland Limited's (Vodafone) further submission of 23 March 2010 in relation to the Commission for Communications Regulation's (ComReg) ongoing consultation process on *Liberalising the Future Use of the 900 MHz and 1800 MHz Spectrum Bands*, as contained in your letter of that date to me.

We note Vodafone's views therein, which, as you state, are also ones expressed in Vodafone's comprehensive submission and covering letter of 26 February. These, along with other responses received by us, will duly be taken into account.

I should also point out that your letter is incorrect in stating that, in my letter of 15 March, 2010, I declined the request for a meeting that you made on behalf of Vodafone. In my letter to you, dated 15 March, I indicated that I felt it appropriate that any meetings with Vodafone, or any other interested parties, be held on a structured, transparent and non-discriminatory basis, and that any decision to hold meetings would have to be made after we had completed a full review of the very extensive and comprehensive written commentaries submitted by all interested parties. I ended by saying that we would continue to bear in mind Vodafone's request for a meeting.

In relation to Vodafone's requests for clarification, we would respond as follows:

- ComReg is progressing analysis of responses received and other relevant material before it. As you would appreciate, the issues are complex and the material put forward by respondents is exceptionally detailed. Please be assured that ComReg is carefully considering all relevant material and is working to completing its analysis and developing the process as soon as possible, and in a manner appropriate to the circumstances generally;

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- On 23 March 2010,¹ ComReg published redacted versions of most responses received by it to Consultation Document 09/99. A revision of this document was published on Monday last which added a redacted version of one outstanding response² (a non-confidential version of which was not available on 23 March); and
- ComReg is keeping the possibility of meetings with interested parties under consideration. However, ComReg will be better placed to determine whether meetings with interested parties would be necessary or desirable from the point of view of parties effectively making their submissions and representations and significantly assisting ComReg in its deliberations, following ComReg's analysis of all relevant material before it.

I trust you find this clarification satisfactory.

Please note that Vodafone's letter of 23 March will be published, along with all other submissions received by ComReg in relation to its ongoing consultation, in due course.

Yours sincerely

A handwritten signature in black ink, appearing to read 'John Doherty', with a long, wavy flourish extending to the right.

John Doherty
Commissioner

¹ See ComReg Document 10/21, *Submissions to Consultation 09/99 - Liberalising the Future Use of the 900 MHz and 1800 MHz Spectrum Bands*, published 23 March 2010.

² See ComReg Document 10/21R, *Submissions to Consultation 09/99 - Liberalising the Future Use of the 900 MHz and 1800 MHz Spectrum Bands*, published 29 March 2010.

(5) Vodafone: redacted letter to ComReg (dated 20 May 2010)

Redacted Non-Confidential Version

20 May 2010

Alex Chisholm
Commission for Communications Regulation
Abbey Court
Irish Life Centre
Lower Abbey Street
Dublin 1

Dear Alex

[REDACTION]

As of the date of this letter, fewer than twelve months remain until the expiry of Vodafone's GSM 900 Licence ("2G Licence"). Almost five months have elapsed since the publication of ComReg's last Consultation. In this regard I wish to outline our concerns about the very limited time remaining until the expiry of the 2G Licence.

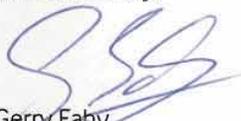
Vodafone has already explained in its Submission of 26 February 2010, why the auction method proposed by ComReg in the December 2009 Consultation with its concomitant risk that one or more existing licensees might lose the right to use 900 MHz spectrum is not a feasible method of allocating spectrum.

Even if ComReg were to adopt an alternative method of allocation for the 900 MHz spectrum which eliminated the risk of loss of spectrum by an existing licensee, we now believe that the issue of the time remaining [REDACTION] has reached a critical stage and that ComReg must now provide immediate clarification as to how it intends to address the issues of the ongoing delays within the consultation process and of the impending licence expiry.

The ongoing uncertainty in the timelines for the consultation and decision process gives rise to significant and material issues. [REDACTION]

In light of these, Vodafone urges ComReg to set out a definitive and realistic timeline for the conclusion of the process for selecting an allocation method (which, for the reasons Vodafone has submitted in its 26 February submission [REDACTION] cannot be based on the proposal set out in ComReg document 09/99).

Yours sincerely,



Gerry Fahy
Strategy Director
Vodafone Ireland

(6) Telefonica O2: "O2's 900MHz Licence" (dated 4 June 2010)



4th June 2010

Mr. George Merrigan
Director – Market Framework
ComReg
Abbey Court
Irish Life Centre
Lower Abbey Street
Dublin 1

O2's 900MHz Licence

Dear Mr. Merrigan

I write to you to reiterate the extreme concern of O2 (Telefonica O2 Ireland) regarding the current status of the 900MHz band. It is now less than one year to the date when O2's existing licence would expire, and yet O2 can have no certainty as to exactly what will happen when that date passes.

As you are aware, ComReg began the consultation process in 2008, and responses to the most recent document (09/99) were submitted on 26th February 2010. In its response to that document (and without prejudice to any other issues addressed in the response), O2 gave detailed explanation of the reasons why ComReg must provide for an extension, renewal, or other continuance of the current spectrum assignment. Primarily this is because of the disruption that would be caused to O2's customers and to its business if it were required to cease or amend use of the currently assigned spectrum in May 2011. Any modification to existing networks or spectrum assignments will require time to plan and implement, but O2 cannot undertake any planning under the current circumstances.

ComReg had intended to issue its response to consultation document 09/99 in Spring 2010, which even then was already too late. While there are a number of complex factors to be considered, and getting the right decision from the process will be of primary importance, ComReg must move quickly to eliminate any further delay in the process. As the time remaining to the original date for licence expiry reduces, accordingly O2 has less and less time to make any adjustment to its current assignment by that date, and the corresponding disruption and costs grow.

ComReg must now find a way to eliminate the current uncertainty in relation to licence expiry, but also determine the best solution to the longer term assignment options. As O2 stated in its submission of 26th February, the means to achieve this would be to separate the two issues of licence expiry and liberalisation. This could be achieved now by ComReg extending the current licence.

A *Telefonica* company



In addition to the above points regarding timing and expiry of the current 900MHz assignments, O2 explained in some detail the requirement for spectrum planning and availability to be conducted in a holistic way, rather than piecemeal on a band by band basis. The Digital Dividend spectrum in the 800MHz band can be a substitute for 900MHz in many circumstances. O2 notes that there is a large band of spectrum available in the overall UHF band, which is relatively lightly utilised in Ireland when compared to some other EU countries. While some of the Analogue TV transmitters still operate in the band in Ireland, it is noted that the recent BCI competition for commercial Digital Terrestrial TV services has yielded no interested bidders. This should provide an opportunity for ComReg to re-plan the allocations within the UHF band and allow for the release of Digital Dividend spectrum to be brought forward to coincide with any further release of spectrum at 900MHz. O2 expects that ComReg will address this issue in its response to consultation document 09/99.

I look forward to an early response to this letter.

Yours Sincerely



Tom Hickey

(7) ComReg: Reply to Telefonica O2 of 4 June 2010 (dated 29 June 2010)



Commission for
Communications Regulation

29 June 2010

Mr Tom Hickey
Regulatory Affairs Manager
Telefónica O2 Ireland Limited
28 – 29 Sir John Rogerson's Quay
Dublin 2

Re: O2's Letter to ComReg on 900 MHz licences, dated 4 June 2010.

Dear Mr Hickey,

I refer to your letter of 4 June 2010 in relation to the expiry of Telefónica O2's 900 MHz licence in 2011 and the matters you raise in that regard.

In relation to the matter of the expiry of this licence, and Telefónica O2's submissions as to the extension, renewal or other continuance of same, I note your letter reiterates views of the kind made by Telefónica O2 in its response to the Commission for Communications Regulation's (ComReg) most recent consultation on the future of the 900 MHz band (ComReg Document 09/99) ("Consultation 09/99"). ComReg is, of course, well aware of the expiry of Telefónica O2's 900 MHz licence in May 2011 and Telefónica O2's views on this issue and is in the process of preparing a response to consultation which will take these views, and the views of all other respondents, into account.

I note your view that modification to existing networks or spectrum assignments would require time to plan and implement and, in this regard, please be aware that ComReg will be setting out proposals to address this timing issue (as raised by Telefónica O2 and other respondents) in its response to Consultation 09/99.

I also note your reference to Spring 2010 as being the target date for ComReg's publication of its response to Consultation 09/99. In this regard, we would note that, following representations from a number of parties, including Telefónica O2, the response period to Consultation 09/99 was extended, inevitably extending ComReg's own estimated timeline for publishing its response. In addition, and as you would appreciate, ComReg must give due consideration to material submitted by respondents on all relevant issues and other relevant material before it.

Your letter refers to current uncertainty in relation to 900 MHz licence expiry and suggests that such uncertainty could, in some way, be overcome by separation of the issues of 900MHz licence expiry and band liberalisation. ComReg notes your suggestion and will address this issue in its response to Consultation 09/99.

Finally, your letter discusses the Digital Dividend in Ireland, recent developments in respect of same and its relevance to 900 MHz spectrum. Clearly, ComReg continues to closely monitor such developments, including considering the implications of same in the context of both its Digital Dividend and GSM liberalisation consultations.

Yours sincerely

P.P. Sméad Devey
George Merrigan
Director of Market Framework

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**(8) Telefonica O2: "O2's 900MHz Licence - Continued Delays"
(dated 26 July 2010)**



26th July 2010

Mr. Alex Chisholm
Chairman
Commission for Communications Regulation
Abbey Court
Irish Life Centre
Lower Abbey Street
Dublin 1

O2's 900MHz Licence – Continued Delays

Dear Alex

I refer to the recent correspondence between O2 and ComReg regarding the 900MHz consultation process, and in particular to your letter of 29 June 2010. The letter has given no commitment as to when ComReg's decision will be published, or indication of ComReg's intended timetable for resolving the issues under consideration. This letter is to express O2's extreme concern at the continued delay by ComReg in progressing the matter.

ComReg had indicated that its decision on this important spectrum allocation would be made in Spring 2010 and despite previous correspondence, O2 and the industry is still unaware of ComReg's timing in relation to the process or the decision. O2 has described and explained in detail why it will be necessary to be able to continue using the 900MHz band after May 2011 - in correspondence prior to ComReg's first consultation in 2008; our responses to the three formal consultation documents; at our meeting in July 2009; and in the letters most recently exchanged. It is not proposed to repeat all of the reasons here again.

ComReg's decision-making process has been delayed for too long, and it is now urgent that ComReg clarifies precisely what spectrum in the 900MHz band O2 will have access to beyond May 2011. The reasons why we need this clarification urgently include, but are not limited to, that:

- The 900MHz band is currently used to provide coverage and availability of our services
- Our network has been built out to use the current assignment of 900MHz and cannot now be adapted to use another band without severe disruption to consumers
- If O2 was required to discontinue use of 900MHz spectrum in May 2011, it would cause significant disruption to all 1.7 million of those customers, as well as to the provision of access to emergency services and to our other business services
- Even if O2 was simply required to make a modification to the channels in use within the band, this would take time to plan and implement

A *Telefónica* company

- The time has passed for when O2 needed to know if a modification to the assigned spectrum was required to take effect in May 2011 – it is already too late to plan and implement any modification that would avoid severe disruption. As further time passes, the impact and irreparable harm associated with any such modification increases by the day.

ComReg has the statutory power and the obligation to give such certainty by extending the current spectrum assignment, or by creating a new assignment to commence on 16th May 2011. This power is specifically provided for in Irish telecoms legislation.

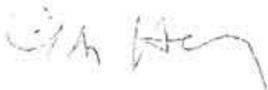
While O2 require ComReg to provide clarity in relation to the long term status of the 900MHz band, resolving the uncertainty surrounding what might happen on 16th May 2011 is now urgent. Regardless of what process ComReg next proposes for determining long-term assignments, due to the delay to date ComReg will not be capable of providing certainty until early 2011. By that time, the impact of any modification to our assigned spectrum will be severe and simply may not be possible to implement. The continued uncertainty means that O2 cannot take any steps to mitigate the disruption that would be caused if it was required to modify its assignment in the band next May. This disruption would cause irreparable harm to O2's business and its brand, and the magnitude of this harm is increasing with every further week of delay. There is now only one means by which this harm can be avoided – if O2 was guaranteed to hold the same spectrum beyond May 2011.

ComReg must now immediately take the steps necessary to give certainty to assignment of the spectrum in the 900MHz band after 16th May 2011. If necessary, this should be separated from the process to resolve the long-term assignments.

We note from your letter of 29 June 2010 that ComReg acknowledges our concerns (and those of the industry) and is fully aware that modification to existing networks or spectrum assignments requires time to plan and implement, and that you will set out proposals to address this timing issue. These proposals are required as a matter of urgency.

I look forward to an early response to this letter.

Yours Sincerely



Gary Healy

(9) ComReg: Reply to Telefonica O2 of 26 July 2010 (dated 4 August 2010)



4 August 2010

Dr. Gary Healy
Telefónica O2 Ireland Limited
28 – 29 Sir John Rogerson's Quay
Dublin 2

Re: O2's letter on 900 MHz licence dated 26 July 2010

Dear Gary

On behalf of the Chair of the Commission for Communications Regulation (ComReg), Alex Chisholm, I am writing in response to your letter of 26 July 2010 in relation to Telefónica O2 Ireland Limited's (O2) access to 900 MHz spectrum following the expiry of its GSM 900 MHz licence in May 2011.

In relation to this matter, I would refer you to previous communications between ComReg and O2, and to the process documentation in the ongoing consultation regarding liberalisation of the use of spectrum in the 900 MHz band. The communications concerned include Tom Hickey's letter to ComReg dated 4 June 2010, and George Merrigan's letter of response, dated 29 June 2010, which, amongst other things, referred to ComReg's intention in due course to deal with, and make proposals in relation to, timing issues, as well as referring to ComReg's continued monitoring of the developments referred to by Mr. Hickey in his letter concerning the "Digital Dividend", and their relevance in this context.

You will further have noted, in the interim, the recent announcement made by the Minister Eamon Ryan on 29 July, regarding plans for the transition from analogue to digital television in Ireland, and the consequences envisaged to flow from this in terms of the availability of Ireland's Digital Dividend. In that connection, I would also refer you to ComReg's Information Notice (ComReg Document 10/59), which provided an update and information in light of those developments at departmental and governmental level and on the consultation process regarding the liberalisation of the use of spectrum in the 900 MHz band.

In particular, I would draw your attention to the second paragraph of Section 2.3 of the Information Notice, which states that

“... ComReg envisages the need for arrangements to address the interim issues that would arise in the period between the expiry in May 2011 of two of the existing GSM 900 MHz licences and the commencement of new licences in these bands, as well as the need for arrangements that would allow all successful licensees in these bands to plan their networks and install equipment during this transitional period.”



In relation to 'next steps' in this context, I would refer you to Section 2.4 of the Information Notice, which states that

“ComReg will set out proposals for the inclusion of the 800 MHz band in the process, including interim and transitional arrangements, consulting as necessary in due course.”

You might note, in the latter regard, that it is ComReg's intention shortly to issue a focused document specifically addressing these developments and setting out proposals for the interim and transitional arrangements considered appropriate in the context of those developments and the matters referred to in your letter.

I trust this deals with the matters referred to in your letter for the time being.

Yours sincerely

A handwritten signature in black ink, appearing to read 'J. H. Connolly'.

Jim Connolly
Senior Spectrum Advisor

**(10) Telefonica O2: "O2's 900MHz Licence - Continued Delays"
(dated 4 August 2010)**



Mr. Alex Chisholm
Chairman
Commission for Communications Regulation
Abbey Court
Irish Life Centre
Lower Abbey Street
Dublin 1

Wednesday, 04 August 2010

Dear Mr. Chisholm

Re: O2's 900MHz Licence – Continued Delays

We refer to previous correspondence and the Information Notice document no. 10/59 issued by ComReg on 29 July 2010.

O2 welcomes the acknowledgement by ComReg that arrangements are required to deal with timing issues arising from the expiry of O2's GSM 900MHz licences in May 2011, and to deal with issues that might arise in the period between expiry and the commencement of any new licences that may be put in place.

Although the recent ComReg Information Notice is welcomed the fact remains that O2 and the industry is still unaware of ComReg's plans for allocation of the 900MHz band spectrum after May 2011. As outlined in previous correspondence, there has been, and remains, significant delay by ComReg in this process, which has resulted in great uncertainty within O2, and more widely within the industry. This continued delay and uncertainty is in O2's case causing significant harm to its business.

We therefore ask again that ComReg immediately proceed to take the necessary steps to fully address spectrum assignment of the 900MHz band, on both an interim and long term basis. In particular, we request that ComReg now indicate the publication date for its specific proposals for spectrum allocation referred to in the Information Notice.

Yours sincerely,

Paul Whelan
Chief Financial Officer

CC: George Merrigan, Director, Market Framework

A *Telefonica* company

- (11) Hutchison 3G Ireland: "Further Response by Hutchison 3G Ireland Limited in respect of ComReg Doc. No. 09/99 "Liberalising the Future Use of the 900 MHz and 1800 MHz Spectrum Bands" (dated 15 July 2010)**



Further Response by Hutchison 3G Ireland Limited
in respect of ComReg Doc. No. 09/99
"Liberalising the Future Use of the 900 MHz and 1800 MHz Spectrum Bands"

15 July 2010



Executive Summary

The minimum price proposed by ComReg is too high. In section 13 of its Response to Consultation, ComReg identifies two reasons for a significant minimum price: (i) the risk of collusive behaviour; and (ii) weak competition. However, these two factors are not sufficient reasons for a significant minimum price. In relation to the risk of collusive behaviour, this risk is sufficiently dealt with by: (i) the threat of expulsion from the award process; (ii) prosecution under the Competition Act, 2002 for entering into an agreement or concerted practice contrary to section 4 of that Act; and (iii) ComReg's proposed sealed bid combinatorial auction. In relation to weak competition, in the current global and Irish economic climate, the only way to determine the true, long-run economic value of spectrum access is to allow the market determine this value.

ComReg's proposed minimum price will deter potential bidders, risk a successful auction process and weaken competition in the retail markets for mobile electronic communications and broadband services in Ireland.

In light of the reserve prices recently set by Arcep for the auction for the fourth French 3G licence (approximately €0.10 per MHz per head of population), ComReg should set the minimum price at €4,203,200. Such a minimum price would:

1. Address the factors identified by ComReg as relevant to the determination of the minimum price ie the minimum price should: (i) not give rise to or increase incentives for collusive behaviour; (ii) deliver a fair return to the State for the use of this finite natural resource; (iii) reflect the economic value of the spectrum to the user; (iv) not choke off demand; (v) deter frivolous bidders; and (vi) recover the administrative costs of running the award process;
2. Take sufficient account of reserve prices trends in recent awards; and
3. Be prudent, reliable, robust, and proportionate in accordance with section 12 (3) of the Communications Regulation Act, 2002, as amended.

We look forward to ComReg's final decision in respect of this consultation process. However, unless the concerns of Hutchison 3G Ireland Limited ("3") and other operators in respect of the minimum price are acted upon, ComReg's final decision will result in unnecessary litigation, delay and frustration.



Introduction

The purpose of this document is to further respond to ComReg Doc. No. 09/99 *"Liberalising the Future Use of the 900 MHz and 1800 MHz Spectrum Bands"* ("ComReg's Response to Consultation").

The format of this document is as follows:

1. Part 1 contains general comments;
2. Part 2 addresses section 13 of ComReg's Response to Consultation (Proposed Auction Fees);
3. Part 3 addresses sections 10 (Minimum prices) and 12 (Recommendations on reserve prices and spectrum usage fees) of the DotEcon report accompanying ComReg's Response to Consultation; and
4. Part 4 contains 3's recommendation in relation to the minimum price.

Part 1 – General Comments

The minimum price proposed by ComReg is too high. The reasons for this are set out below. It will deter potential bidders, risk a successful auction process and weaken competition in the retail markets for mobile electronic communications and broadband services in Ireland. In light of the reserve prices recently set by Arcep for the auction for the fourth French 3G licence (approximately €0.10 per MHz per head of population), ComReg should set the minimum price at €4,203,200.¹ Such a minimum price would:

1. Address the factors identified by ComReg as relevant to the determination of the minimum price ie the minimum price should: (i) not give rise to or increase incentives for collusive behaviour; (ii) deliver a fair return to the State for the use of this finite natural resource; (iii) reflect the economic value of the spectrum to the user; (iv) not choke off demand; (v) deter frivolous bidders; and (vi) recover the administrative costs of running the award process;²
2. Take sufficient account of reserve prices trends in recent awards; and
3. Be prudent, reliable, robust, and proportionate in accordance with section 12 (3) of the Communications Regulation Act, 2002, as amended.

¹ The implied value of a licence for a 2x5MHz lot in Ireland is calculated by multiplying the price per MHz per population by 10 (the size of a licence in MHz) and the population of Ireland (taken as 4,203,200).

² At page 159 of ComReg's Response to Consultation.



Part 2 – Section 13 of ComReg’s Response to Consultation (Proposed Auction Fees)

In section 13 of its Response to Consultation, ComReg considers and applies *inter alia*: (i) the relevance of a minimum price; and (ii) the benchmarking approach.

Relevance of a Minimum Price

In relation to the relevance of a minimum price, ComReg identifies two reasons for a significant minimum price: (i) the risk of collusive behaviour; and (ii) weak competition. In particular, it states:

“In theory, an auction could be implemented with no minimum price or a very low/nominal minimum price. ComReg notes that setting low minimum prices has been relatively popular with some European National Regulatory Authorities in recent times so as to avoid the risk of “choking off” demand for spectrum. In these circumstances, a low minimum price, reflecting the administrative costs incurred in running the auction, should still however be sufficient to deter frivolous, non serious bidders.

On the other hand, there may be reasons why a significant minimum price may be warranted. In particular, where collusive behaviour is a risk in a particular auction, such as where there may likely be a limited number of participants and/or limited excess demand, setting a low minimum price may facilitate and incentivise collusive behaviour amongst participants. In this regard, an opportunity for bidders to obtain access to spectrum at a price below the real economic value of such access to bidders may provide the incentive for bidders to engage in tacitly collusive behaviour. In this context, it can be seen that setting a higher minimum price, and particularly one that would more closely reflect the real economic value of spectrum access, would reduce the opportunity/ability and incentives of bidders to engage in such behaviour. That is, the reward would be much lower for engaging in such conduct. To fully counteract the effectiveness of such a price-saving strategy, the minimum price should be set at the economic value of the spectrum to the user as this effectively dissolves any profit gain from adopting such a strategy.

In addition, where competition may be weak in an auction due to external factors (such as technological or standards uncertainty or the state of capital markets and/or capital availability), setting a low minimum price may not see the auction reveal the true, long-run economic value of spectrum access. This would result in an undervaluation of the spectrum which in turn represents a reduction in the efficiency of the auction.”³

The risk of collusive behaviour and weak competition are not sufficient reasons for a significant minimum price. In relation to the risk of collusive behaviour, this risk is sufficiently dealt with by: (i) the threat of expulsion from the award process; (ii) prosecution under the Competition Act, 2002 for entering into an agreement or concerted practice contrary to section 4 of that Act; and (iii) ComReg’s proposed

³ At page 158 of ComReg’s Response to Consultation.



sealed bid combinatorial auction. In relation to weak competition, in the current global and Irish economic climate, the only way to determine the true, long-run economic value of spectrum access is to allow the market determine this value.

The Benchmarking Approach

At pages 163 – 167 of its Response to Consultation, ComReg applies the benchmarking approach to determine an appropriate minimum price for a block of 900 MHz. In particular, it states and concludes:

“The estimated minimum price benchmarks for a 2 × 5 MHz licence ranged from €16 to €34 million for a 15-year licence. Minimum price Benchmarks created using a simple average method suggest the upper end of the range, whereas minimum price benchmarks based on econometric methods suggest the lower end of the range.

It is important to note that using a benchmarking approach is likely to result in an underestimate of the minimum price of liberalised 900 MHz spectrum as:

□ there have been no competitive awards for liberalised 900 MHz spectrum and so there are no available benchmarks for 3G spectrum at 900 MHz. Therefore, in conducting the benchmarking exercise DotEcon has relied on existing GSM 900 and GSM 1800 auction results. These results do not take into account the likely significantly increased value of liberalised licences compared to GSM licences; and

□ as there is limited auction data for the GSM bands, the data set used by DotEcon was expanded to include licences in other related bands (e.g. in the 3G 2.1 GHz and 2.6 GHz band). As relative to the 900 MHz band, these higher frequency bands have significantly reduced propagation characteristics, it is assumed that they are less valuable and their inclusion further lowers the overall benchmark results.

Taking these two factors into account, it is ComReg’s view that the implied minimum price of a 2 × 5 MHz lot from DotEcon’s benchmarking results is more likely to be lower than the actual expected overall price of liberalised 900 MHz spectrum in Ireland.

ComReg has carefully considered the benchmarking exercise undertaken by DotEcon. While noting that, for the two reasons explained above, the benchmark values are likely to be lower than the actual expected value of liberalised spectrum, ComReg has no data available with which to determine the likely difference, and therefore proposes to set the minimum price for this award at €30 million per lot which would be at the higher end of the benchmark range proposed by DotEcon.”⁴

This is not correct. ComReg fails to take sufficient account of: (i) DotEcon’s econometric analysis; (ii) DotEcon’s benchmark for “Auctions in Europe”; and (iii) the fact that 2G operators will continue to use a significant part of the proposed spectrum for 2G purposes, 3G operators will be using the proposed spectrum for purposes ancillary to their sunk investment in 2.1 GHz and 2.6 GHz is very much tied to LTE and an entirely different business case. It further fails to produce any third party

⁴ At page 166 of ComReg’s Response to Consultation.



analysis that demonstrates in detail that the propagation characteristics of 900 MHz justify a minimum price of €30 m for spectrum in Ireland. DotEcon has acknowledged that its benchmarking analysis based on econometric methods is more sophisticated than its benchmarking analysis using a simple average method.⁵ As a result, the estimated minimum benchmarks for a 2 x 5 MHz licence range from €16 to €26 m for a 15 year licence, and not from €16 to €34 m. ComReg has failed to explain why it would prefer the benchmarks of “All mobile licences” and “All GSM auctions” over “Auctions in Europe”.⁶ As can be seen from recent developments in Greece, Ireland, as a European country, is affected by macro economic matters that do not affect other parts of the world. In relation to “All GSM auctions”, DotEcon has acknowledged that it does not have sufficient data in respect of such auctions.⁷ As a result, the validity of this benchmark must be called into question.

ComReg states that advantages of a benchmarking approach are that the determination of the minimum price is based on a number of similar awards across a number of different jurisdictions and a sufficiently large data-set should allow ComReg to empirically establish the average economic value of spectrum to the user which can then be reflected in the minimum price.⁸ However, as discussed below in relation to DotEcon's analysis, ComReg's analysis is not based on a number of similar awards across a number of different jurisdictions and does not involve a sufficiently large data-set. As a result, it does not ensure that “like is compared to like”.

Summary of Proposals and Conclusion

In its summary of proposals and conclusion, ComReg states:

“In proposing that 50% of the minimum price will be payable through annual SUF's, the reserve prices of €6.3 million to €10.2 million are not unduly onerous, particularly when viewed in the context of the spectrum access fees of circa €50 million or €110 million (depending on licence type) charged in the 3G licence beauty competitions. These reserve prices are unlikely, in ComReg's opinion, to choke off demand from serious bidders.”⁹

This too is incorrect. It is not appropriate to simply compare the proposed 900 MHz licences with the existing 2.1 GHz licences without taking into account the ancillary nature of the proposed 900 MHz licences from a 3G perspective.

⁵ At page 97 of DotEcon's report.

⁶ At page 109 of its report, DotEcon states: “Further, the predictive power of the Europe-only model may be higher as European countries are more similar in geography and demographics to Ireland”.

⁷ At page 105 of DotEcon's report.

⁸ At page 162 of ComReg's Response to Consultation.

⁹ At page 172 of ComReg's Response to Consultation.



Part 3 – Sections 10 (Minimum prices) and 12 (Recommendations on reserve prices and spectrum usage fees) of DotEcon’s Report

In section 10 of its report, DotEcon considers: (i) key issues in setting minimum prices; (ii) methodologies for setting minimum prices; and (iii) reserve prices trends in recent awards, and benchmarks using auction data. In section 12 of its report, it sets out its recommendation on the level of the minimum price.

Key Issues in setting Minimum Prices and Reserve Prices Trends in Recent Awards

At pages 93, 99 and 101 of its report, DotEcon states:

“If a minimum price were set simply to reflect administration costs and to deter frivolous applications, this would certainly also avoid any risk of choking off demand. Setting low reserve prices has become quite popular with European spectrum authorities in recent awards for this reason, as we discuss in detail below. In some cases, this might be a reasonable approach. However, for this award, the issues of the option value of delaying the award of spectrum and collusion incentives should not be ignored.

There may be many public policy reasons for not releasing spectrum too cheaply if there might be potentially better future options for awarding it. Competition may be weak in an auction for many reasons, including poor timing, technological or standards uncertainty or the state of capital markets. In such cases, there may be public benefit in deferring the award of spectrum until conditions are more favourable and uncertainty is reduced for bidders. This consideration is especially important in Ireland due the absence of secondary trading, as proceeding with a problematic auction that produces an outcome that cannot be modified later may be particularly unattractive. If spectrum is released in an auction where competition is weak, auction prices may not fully reflect the true, long-run opportunity cost of holding the spectrum.

The factors motivating the proposed timing of this award include the introduction of the Amending GSM Directive and the need to make available spectrum attached to licences due to expire in the near future. In carrying out the award of such a critical band of spectrum, greater consideration will be given to the implications of timing for the award. For example, we consider the structure of payments of licence fees in light of the current economic and financial climate in Section 13 below.

In addition, a low minimum price is more likely to encourage collusive behaviour (whether tacit or explicit collusion). Some previous spectrum auctions with low minimum prices, such as the Swiss and Dutch 3G auctions, have been blighted by pre-auction deals between bidders attempting to fix demand at the level of supply for similar reasons. Thus where collusive behaviour among bidders is a concern, setting a higher minimum price would be appropriate as this reduces the benefits from colluding or otherwise fixing demand.

A further consideration for ComReg is the structure of payments associated with the minimum price, and the impact this has on incentives for bidders to use or return their licences in the future. In the absence of trading, future annual SUFs are perhaps the



only significant tool available to ComReg to encourage licensees to return spectrum that might not be being used efficiently. Therefore, an additional reason for setting a reasonably high minimum price is that this then allows for a correspondingly high SUF to encourage the release of any spectrum that may be inefficiently used.

...

The recent trend among European spectrum regulators seems to be towards setting low reserve prices. This is evident in the low but non-trivial reserve prices set for 2.6GHz spectrum auctions in Norway, Sweden, Denmark, Germany and the Netherlands (which are detailed below). This trend is also exemplified in the low reserve prices Arcep set for an upcoming auction for the fourth French 3G licence of €240 million (approximately €0.10 per MHz per head of population). This seems to have led the Bouygues Group to consider submitting a complaint to the European Commission on concerns that the fourth 3G licence would be awarded at a much lower price than it paid for its 3G licence in 2002.

...

Except for the upcoming award of 2.6GHz spectrum in the Netherlands and the cancelled award of spectrum in the same band in the United Kingdom, there seems to be a certain consistency across the benchmarks calculated from reserve prices used in the various auctions. They imply a low but nontrivial reserve price of between €100,000 and €130,000 for a 2x5MHz lot in Ireland. As discussed above in Section 10.2 there are good reasons why a low but nontrivial approach is inappropriate for this award.”

DotEcon fails to take sufficient account of reserve prices trends in recent awards. In particular, it fails to take sufficient account of the reserve prices recently set by Arcep for the auction for the fourth French 3G licence of €240 million (approximately €0.10 per MHz per head of population). Apart from referring to the risk of collusive behaviour, weak competition and spectrum usage fees, DotEcon fails to explain why these other regulators were incorrect in their approach. As discussed above, the risk of collusive behaviour and weak competition are not sufficient reasons for a significant minimum price. High spectrum usage fees do not justify a high minimum price. Otherwise, one could have a minimum price in excess of the true, long-run economic value of spectrum access. If one takes the reserve prices set by Arcep for the auction for the fourth French 3G licence (approximately €0.10 per MHz per head of population), the implied value of a licence for a 2 x 5 MHz lot in Ireland is €4,203,200, and not €30m.¹⁰

¹⁰ The implied value of a licence for a 2x5MHz lot in Ireland is calculated by multiplying the price per MHz per population by 10 (the size of a licence in MHz) and the population of Ireland (taken as 4,203,200).



Methodologies for Setting Minimum Prices

At page 99 of its report, DotEcon states:

“Another approach to determining minimum prices is to look at both the licence fee and minimum prices of similar auctions to provide a benchmark for the value of 900MHz spectrum in Ireland. Over the last decade, a number of countries have held awards for spectrum in this or comparable frequency bands.

However, licences awarded in comparable spectrum auctions have either been in the 3G 2.1GHz and 2.6GHz bands or in the 900MHz band where the spectrum has only been used for the deployment of GSM. In theory, we know that 900MHz spectrum is more valuable than higher frequency spectrum usable for 3G (2.1GHz, 2.6 GHz, etc.) due to its superior propagation characteristics; and we know that liberalisation should increase the value of spectrum. Therefore, inferences drawn from these awards about the value of liberalised spectrum in the 900MHz band in Ireland in our benchmarks will inevitably produce an underestimate. This does not mean that the exercise is not useful, but we must interpret the results accordingly.

...

A further consideration is the techniques available for deriving benchmarks. A standard approach for spectrum awards is to consider a simple average of price per pop per MHz (i.e. the price divided by the population of the licensing region divided by the amount of spectrum in MHz available) across a cut of the sample data. Different benchmarking metrics (as described above) can be used to create various cuts of the data that is comparable to the upcoming Irish 900MHz auction. The average licence prices achieved in auctions from these cuts of data will provide a range of benchmarks for predicted licences value of 900MHz spectrum in Ireland.

A more sophisticated approach is to consider larger samples but use econometric techniques to control for the differences in spectrum value that might arise across awards, countries and time. This approach considers the joint impact of various benchmark metrics on spectrum value. We use this approach in a second step. This technique has the potential to be more reliable as it controls for known difference between awards prior to making comparison, but raises issues about why one particular mathematical formulation has been used rather than another.

Determining the appropriate sample and benchmark metrics is a matter of judgement, not an exact science. Therefore, for the 900MHz band, we consider it appropriate to develop a number of benchmarks drawing on different samples and approaches, and compare the results qualitatively. This is elaborated further in Section 10.5.”

In light of the fact that DotEcon admits that: (i) it does not have comparable liberalised 900 MHz auction data; (ii) the basis for its more sophisticated econometric analysis is debatable; and (iii) determining the appropriate sample and benchmark metrics is not an exact science, DotEcon and ComReg have taken too aggressive an approach in relation to the setting of a minimum price.



Benchmarking using Auction Data

At page 102 of its report, DotEcon states:

“Creating benchmarks of minimum prices (as opposed to achieved auction prices) would not be particularly helpful as national regulators clearly have different objectives and considerations when setting minimum prices. National regulators also use different techniques (as discussed in the previous sub-section) to arrive at minimum prices. Hence minimum prices will not necessarily bear any correlation to the benchmark metrics (population, GDP per capita, auction competitiveness, etc.) unlike auction prices, which ultimately reflect the valuations of losing bidders.”

DotEcon has failed to do the correct analysis. Instead of analysing the minimum prices set by regulators in Europe and elsewhere, it has examined the prices achieved in auctions of 2G and 3G spectrum. The reasons for this may include that it had this data readily to hand and an examination of minimum prices would have been more complex. As stated above, DotEcon has failed to take sufficient account of reserve prices trends in recent awards. In particular, it has failed to take sufficient account of the reserve prices set by Arcep for the auction for the fourth French 3G licence of €240 million (approximately €0.10 per MHz per head of population). Apart from referring to the risk of collusive behaviour, weak competition and spectrum usage fees, DotEcon has failed to explain why these other regulators were incorrect in their approach.

At page 111 of its report, DotEcon further states:

*“As already mentioned, there are no available benchmarks for 3G spectrum at 900MHz. Therefore, we have had to rely on existing GSM900 and GSM1800 data, which does not take into account the likely significant increase in value of liberalised licences. In addition, due to the general lack of auction data in the GSM bands, we use larger data sets containing licences in other bands as well. Hence the implied value of a 2x5MHz lot from our regression benchmarking results is most likely to be **lower** than the actual expected licence value of liberalised 900MHz spectrum in Ireland. This needs to be taken into account in interpreting these results for the purposes of setting a minimum price.*

Interpreting our benchmarking analysis as providing a lower bound, yet being cautious about the uncertainty of these estimates, it seems reasonably safe to conclude from the data that the value of a 2x5MHz lot at 900MHz is likely to be in the upper half or possibly even above our range of estimates of €16million to €34 million. Further support is provided by the average 3G licence price achieved in Ireland of about €22.3m (see footnote 54 and footnote 53 for individual licence prices), which is again a lower bound as this does not take into account the better propagation of 900MHz spectrum nor was competitively determined. Overall, we recommend that a reasonable range for a minimum price for 2x5MHz 900MHz licence in Ireland is €25-30 million. Setting a minimum price at such levels should be low enough to prevent choking off efficient demand. It may well be that a higher minimum price could be set, but we lack evidence above this range that this would not cause demand to be choked off.”



DotEcon's interpretation of its benchmarking analysis is completely incorrect. It ignores the weaknesses in its own data, relies upon one third party report in respect of the benefits of liberalised 900 MHz without a detailed examination of that report and its application to Ireland and fails to take into account the ancillary nature of the proposed licences to the 2.1 GHz licences.

DotEcon ignores the following weaknesses in its own data:

1. There are no comparable spectrum auctions for liberalised 900 MHz;¹¹
2. As the "*... bulk of GSM frequencies have traditionally been administratively awarded to operators, and the GSM auctions that we have witnessed during this period are often for returned spectrum or additional GSM frequencies (for example the E-GSM band) ... there lacks sufficient data on the actual market value of GSM licences auctioned. ...*";¹²
3. DotEcon has not calculated the actual NPV of the various auctions included in its analysis: "*Annualised fees are calculated by taking the difference between the aggregate sum of all payments over the term of the licence, subtracting any upfront payments and then dividing the net amount by the duration of the licence*"; "*This method will produce Annualised Fees that are different from actual annual fees when the stream of actual annual fees set is not uniform. In general, this method of calculating discounted licence price will give rise to discrepancies to the actual discounted licence price a bidder will face when the stream of annual payments is not uniform, for example when the licence price is paid in instalments that do not span the entire term of the licence but only for a specified period during the licence term*";¹³
4. DotEcon has not examined the impact of licence conditions on auction prices:
"A further issue for any minimum price setting methodology is the interaction between licence conditions and the value of licences. Placing onerous conditions on licences will lower their value and this needs to be taken into account when considering minimum prices. The approach we have taken is to assume that licence conditions are not onerous and, at least as an approximation, that we can ignore this interaction. Some of our benchmarking analysis (in particular, econometric modelling of licence prices in auctions) does take account of licence conditions in a limited way. Nevertheless, the conclusions we ultimately reach are based on benchmarks and so would need to be revised if licence conditions were much more costly to comply with than those set in other jurisdictions";¹⁴ and
5. DotEcon's analysis necessarily involves uncertainty in the form of currency conversions, inflation adjustments and conversion of regional licence award results into national licence award results:

¹¹ At page 96 of DotEcon's report.

¹² At page 105 of DotEcon's report.

¹³ At page 102 and footnote 42 of DotEcon's report.

¹⁴ At page 95 of the DotEcon report.



“The awards in our dataset have taken place in different countries at different points in time. Therefore, the price data from these awards have been brought in a common currency and corrected for inflation through the following steps:

- first, prices are converted from local currencies into a common currency (USD) using a Purchasing Price Parity (PPP) exchange rate to account for price differences between countries (this expresses prices in nominal USD terms);*
- prices in nominal US dollars are adjusted for USD inflation (converting prices at different times into real USD terms in the present);*
- corrections are made for differing licence duration (converting prices into equivalent values for a 15-year licence term);*
- finally, all prices have then been converted into Euros using a PPP rate for the first half of 2009.*

GDP data was also adjusted for inflation in the same way. Hence all monetary value variables are expressed in terms of June 2009 Euros for a 15-year licence.”¹⁵

...

“In cases where there has been a regional award, regional prices have been collapsed into a single population-weighted national auction average price ...”¹⁶

...

“We use adjusted weights. These take into account that population coverage stated in regional licences do not always add up to the population figure by which they are divided.”¹⁷

...

*“The process of using a PPP rate and then adjusting for inflation using a common deflator (i.e. the USD deflator) should account for differing inflation rates between countries; this is because PPP exchange rates should reflect the price differentials between the country of the award and the US created by differential inflation. This should in effect be largely equivalent to running the benchmarking analysis by first adjusting all prices in local currency by local inflation rates then converting to US dollars with an official exchange rate. The former method has been implemented because the DotEcon Spectrum Award Database contains PPP rates for US dollars and US CPI data only. It would be impractical to do a similar analysis in local currencies and to collect deflator time series for all local currencies in the sample as inflation rates differ across countries. Bringing all the data to a common currency using PPP rates and then deflating avoids the need to gather data about local inflation rates, as these are effectively encapsulated within the PPP rate. These two approaches **should be***

¹⁵ At page 102 of DotEcon's report.

¹⁶ At page 104 of DotEcon's report.

¹⁷ At footnote 46 of DotEcon's report.



*closely similar **in the absence of** large capital and financial market imperfections [Emphasis added].*¹⁸

DotEcon's analysis is not transparent. It does not explain: (i) the analysis that it conducted in relation to the interaction effects of the various factors that might have an impact on spectrum value; and (ii) why it did not apply a regression analysis to "All 3G licences". DotEcon fails to take its own advice: *"In the absence of reliable information, a precautionary approach to setting minimum prices may be necessary, keeping minimum prices sufficiently low".*¹⁹

DotEcon Recommendation on the Level of the Minimum Price

At page 119 of its report, DotEcon states:

"Several European national regulators have taken to setting low but non-trivial minimum prices in recent or upcoming mobile spectrum auctions. Such a reserve price might be in the order of €100,000. However, such a low reserve price would significantly increase collusion incentives, which is a concern given the small number of bidders that might participate in this auction. To alleviate such collusion concerns, we recommend a higher minimum price should be set.

In addition, we should consider the implications of spectrum usage fees for efficient usage of spectrum after an auction. Spectrum is not tradable in Ireland and so there is no financial incentive for licensees to release spectrum to others who might be able to create greater value. A possible way to provide such an incentive (at least in part) would be to charge annual spectrum usage fees (SUFs) that are sufficiently high to encourage return to ComReg where spectrum was not being used to create sufficient value for the current licensee; ComReg could then reallocate the spectrum. For SUFs to be effective in encouraging licensees to return any unused or underperforming spectrum, they have to be set at a meaningful level that reflects the opportunity cost of holding the spectrum. This is difficult to achieve given that the latter is unknown prior to the auction. Nevertheless, this consideration provides an additional argument for reasonably high minimum prices, especially the component due to spectrum usage fees.

Against these two arguments for relatively high minimum prices, we need to balance of the risk of inefficiently choking off demand by setting minimum prices too high. This means finding some level of minimum price such that we can be reasonably certain that the true liberalised value of the spectrum exceeds this level.

In Section 10, we saw a range of benchmarks for the value of a 2x5MHz licence in Ireland of €16-34million for a 15-year licence. Benchmarks created using a simple averaging method suggest the upper end of the range, whereas benchmarks based on econometric methods suggest the middle to lower end of the range.

This range is likely to underestimate the true value of liberalised 900MHz spectrum. These benchmarks are based on datasets made up either in majority by 3G

¹⁸ At page 179 of DotEcon's report.

¹⁹ Page 95 of DotEcon's report.



spectrum auction price data or un-liberalised GSM (both 900MHz and 1800MHz) spectrum auction price data, both of which provide a lower bound to the likely value of 900MHz spectrum in Ireland. We do not have data yet on the value of 900MHz 3G spectrum, but we are only seeking a conservative lower bound on the likely value of such spectrum.

For these reasons, we recommend that the minimum price be set in the upper regions of our predicted licence value range, say €25m-30m.

We note that a type B 3G licence that Vodafone and O2 won in 2002 had an effective discounted licence price for 2x5MHz of 3G spectrum for a 15-year duration in June 2009 Euros of €25.3million. Hence given that the value of liberalised 900MHz spectrum should exceed that of 2.1GHz spectrum, the risk of choking off demand with a minimum price of €25m-30m should be limited. However, determining an appropriate level of minimum price is not an exact science and there can be no absolute certainty about this.

We have no reliable evidence to make a realistic assessment of the potential effects of setting a minimum price above this level. Benchmarking analysis is fundamentally limited by the lack of comparator data for liberalised 900MHz spectrum. It is certainly possible to undertake business case modelling (at least in a generic manner) to investigate the possible value of this spectrum further. However, for reasons already discussed in Section 10.3.1, it seems unlikely that this would provide much insight.”

For the reasons set out above and below, we do not agree with this analysis.

Part 4 – Proposed Minimum Price

In light of the reserve prices recently set by Arcep for the auction for the fourth French 3G licence (approximately €0.10 per MHz per head of population), ComReg should set the minimum price at €4,203,200.²⁰ Such a minimum price would:

1. Address the factors identified by ComReg as relevant to the determination of the minimum price ie the minimum price should: (i) not give rise to or increase incentives for collusive behaviour; (ii) deliver a fair return to the State for the use of this finite natural resource; (iii) reflect the economic value of the spectrum to the user; (iv) not choke off demand; (v) deter frivolous bidders; and (vi) recover the administrative costs of running the award process;²¹
2. Take sufficient account of reserve prices trends in recent awards; and
3. Be prudent, reliable, robust, and proportionate in accordance with section 12 (3) of the Communications Regulation Act, 2002, as amended.

²⁰ The implied value of a licence for a 2x5MHz lot in Ireland is calculated by multiplying the price per MHz per population by 10 (the size of a licence in MHz) and the population of Ireland (taken as 4,203,200).

²¹ At page 159 of ComReg's Response to Consultation.



Conclusion

For the reasons set out above, the minimum price proposed by ComReg is too high. It will deter potential bidders, risk a successful auction process and weaken competition in the retail markets for mobile electronic communications and broadband services in Ireland.

In light of the reserve prices recently set by Arcep for the auction for the fourth French 3G licence (approximately €0.10 per MHz per head of population), ComReg should set the minimum price at €4,203,200.²² Such a minimum price would:

1. Address the factors identified by ComReg as relevant to the determination of the minimum price ie the minimum price should: (i) not give rise to or increase incentives for collusive behaviour; (ii) deliver a fair return to the State for the use of this finite natural resource; (iii) reflect the economic value of the spectrum to the user; (iv) not choke off demand; (v) deter frivolous bidders; and (vi) recover the administrative costs of running the award process,²³
2. Take sufficient account of reserve prices trends in recent awards; and
3. Be prudent, reliable, robust, and proportionate in accordance with section 12 (3) of the Communications Regulation Act, 2002, as amended.

We look forward to ComReg's final decision in respect of this consultation process. However, unless the concerns of 3 and other operators in respect of the minimum price are acted upon, ComReg's final decision will result in unnecessary litigation, delay and frustration.

²² The implied value of a licence for a 2x5MHz lot in Ireland is calculated by multiplying the price per MHz per population by 10 (the size of a licence in MHz) and the population of Ireland (taken as 4,203,200).

²³ At page 159 of ComReg's Response to Consultation.