

Office of Utility Regulation

Broadband Fixed Wireless Access in Guernsey

Licensing of 3.4GHz and 3.6GHz Spectrum

Information Note and Call for Expressions of Interest

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Office of Utility Regulation

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1. Summary

This information notice draws attention to the availability of radio spectrum in Guernsey that can be used to provide Broadband Fixed Wireless Access. It is aimed at individuals or companies who may be interested in using spectrum to provide wireless broadband telecommunications services to the public.

The spectrum is in the 3.6GHz range and the 3.4GHz range and is allocated for use to provide high data rate connections from the homes and businesses of customers to a telecommunications operator's network, thus allowing for the rapid roll out of broadband access. An expression of interest has already been received for spectrum in the 3.4GHz range from Newtel (Guernsey) Ltd and Ofcom (the UK regulator responsible for licensing spectrum) is minded to issue this spectrum to Newtel.

Interested parties are now being alerted to the availability of other spectrum that can be used for the same purposes and invited to express their interest in applying for use of the spectrum. This document provides information on the licensing process and the next steps should such interest be expressed.

2. Background

In 2003, the Radiocommunications Agency (now Ofcom) in the UK awarded a number of licences permitting the use of spectrum in the 3.4GHz range in the UK. These licences were awarded following an auction. 3.4GHz spectrum may be used for what is commonly referred to as Broadband Fixed Wireless Access ("BFWA"). BFWA systems are a means of making "last-mile" connections between users' premises and a telecommunications network. They can deliver very high data rates and have the potential to transport a complete range of electronic traffic, including telephony, high-speed data, television and multimedia services. 3.6GHZ spectrum can be used for similar applications

The target market for these services may include small and medium enterprises (SMEs); small-office, home-office (SOHOs) for teleworking and sectors of the residential market that demand always-on Internet access and interactive email. The higher-bandwidth services may be particularly attractive to users such as colleges and business parks.

BFWA has a number of advantages over wired and cable systems. Its range of operation is less limited than ADSL, which may not reach customers located more than 3.5 km from a local exchange. It can be more quickly deployed than cable, because there is no need to dig up roads to lay down a network before connecting customers. This in itself makes BFWA an attractive option for Guernsey given the need to limit where possible disruptive road openings. It is also cost-effective, because base stations do not have to be established until there are customers in an area (so costs are also scaleable to the size of the customer base) and can provide very high data rates.

3. Availability of 3.6GHz Spectrum

In keeping with the States of Guernsey's policy of driving e-business and online participation, the development within the Bailiwick of a world-class communications infrastructure is of paramount importance. Broadband will play a pivotal role in this – not just for business, but for individuals and Government as well. Therefore the rapid roll-out and adoption of broadband, over both fixed and mobile infrastructure, across the Bailiwick is important to the States' social and economic objectives.

Currently, based on the spectrum available, Ofcom believes it is possible to facilitate the award of up to four licences for the use of 3.6GHz spectrum in the Bailiwick. These would comprise 2 x 20MHz each. The Wireless Telegraphy fees are set by Ofcom at £5,000 per licence. A licence is valid for five years and there is no application fee for this spectrum.

The characteristics of this spectrum means that it is likely that there will be co-ordination issues to be addressed with both the Jersey and French administrations. Ofcom and their French counterparts are working on concluding a Memorandum of Understanding to cover the use of this frequency band in the Channel Islands, although this is unlikely to be concluded before the second half of 2005.

4. Application for 3.4GHz Spectrum

Ofcom has already received an application for a licence for spectrum in the 3.4GHz range in Guernsey from Newtel (Guernsey) Ltd. Ofcom is minded to grant the licence requested.

At present the OUR is of the view that it is in the best interest of the market that this application be allowed to proceed without delay as there does not appear to be any reason why the award of the spectrum for use to Newtel (Guernsey) Ltd would prevent any other operator from providing competing services. This is because the OUR understands that the available 3.6GHz spectrum is directly substitutable for 3.4GHz and as noted above there is the potential for up to four packages of this spectrum to be made available. Furthermore, the 3.4GHz spectrum has been available for some time and the application from Newtel is the first and only expression of interest received by Ofcom to date, indicating that there would not appear to be competing interest in the spectrum.

Licence fees and the spectrum allocation are similar to that outlined above in respect to the 3.6GHz spectrum.

5. The Licensing Process in Guernsey

As stated above, Ofcom is responsible for the management of the radio spectrum in the UK and because of historical links it has also managed the radio spectrum for a number of Crown Dependencies, including the Bailiwick of Guernsey. Consequently the award of radio spectrum in the Crown Dependencies has tended to follow the approach of the UK mainland. However with the liberalisation of Guernsey's telecommunications market

there have been adjustments to take account of local matters, as for example was the case in relation to 3G mobile telephony licences and 28GHz spectrum which was the subject of an OUR information note in 2003.

The 3.6GHz BWFA and the 3.4GHz licences in the UK have been awarded through an auction process. This is increasingly becoming the preferred approach for the allocation of such spectrum in the UK particularly where it is possible that demand for the spectrum may outstrip supply. However the OUR does not believe this is the most practical or appropriate approach for the Guernsey market at this time due to scale and cost issues as well as the fact that, based on information to date, there appears to be ample supply of spectrum.

The OUR wants to ensure that the opportunities that exist with BFWA are maximised for the Bailiwick. With this in mind the OUR is mindful that the certain fundamental principles should be borne in mind in deciding on the allocation of such spectrum including;

- the efficient utilisation of the BFWA spectrum available;
- that the opportunities that BFWA presents for early and effective competition for the provision of broadband services are realised; and
- that the award process for the available licences reflects the special characteristics of the market in Guernsey

With regard to the licences for 3.6GHz, the OUR is inviting expressions of interest for the four spectrum packages that are available. Interested parties are advised to consult further the comprehensive information that is available on the Ofcom website relating to the BFWA spectrum and the conditions that Ofcom attaches to the award of this spectrum¹. It should also be noted that the period for initial expressions of interest will expire on 30th September 2004. Expressions of interest must be made in writing to the OUR.

Should the number of expressions of interest match or be less that the number of licences available, those companies or individuals will then be invited to apply for the licences on a first come first served basis. In the event that the number of expressions of interest exceed the number of available licences, the criteria outlined above will be use to further consider how best to award the available licences.

Should any licence(s) remain after the award of licences arising from this process, they will be available for award on a 'first come, first served' basis.

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¹ Further information on Broadband Fixed Wireless Access, and the procedures for the award of such licences, is available from the Ofcom either from its website www.ofcom.org.uk or by contacting Ofcom directly on Tel: 020 7981 3000.

Interested parties should also note that a Telecommunications Licence is likely to be required to cover the provision of any telecommunications services to the public within the Bailiwick of Guernsey using this spectrum. The OUR will be able to provide general information with regard to BFWA and related matters. Interested parties may contact the OUR in Suites B1&B2, Hirzel Court, St Peter Port, GY1 2NH. Tel: 01481 711120.

6. Presentation on BFWA

Interested parties may also wish to note that Ofcom and the OUR are hosting an industry presentation on the morning of 23rd September at the OGH Hotel on the use of broadband spectrum for the provision of telecommunications services. The presentation will focus on what spectrum is available in the Bailiwick of Guernsey and the process for applying for such spectrum. It will also focus on possible customer applications and the benefits that operators may be able to gain from using broadband spectrum.

Should you wish to attend please notify Nicola Whittaker by email at nicola.whittaker@regutil.gg or by calling 711120 by 16th September 2004.

ENDS