Title:

Mr

Forename:

Roger

Surname:

Blackwell

Representing:

Self

Organisation (if applicable):

What additional details do you want to keep confidential?:

No

If you want part of your response kept confidential, which parts?:

Ofcom may publish a response summary:

Yes

I confirm that I have read the declaration:

Yes

Additional comments:

I have held an Amateur Licence since 1974.
The majority of my professional career was concerned with theoretical and practical aspects of the safety of electromagnetic fields. I am a member of IEEE.
As a radio amateur, my interests are primarily in both microwave and weak-signal propagation. I operate an EME station on 1.3GHz, and intend to have a 2.3GHz system in operation shortly. I am a member of the Radio Society of Great Britain, The UK Microwave Group and the Society of Amateur Radio Astronomers.

Question 1: Do you agree that it is likely that the benefits to UK consumers and citizens will be greater from the MoD?s release of spectrum in the 2.3 GHz and 3.4 GHz release bands than from retaining the current amateur use?:

It would be difficult to justify their retention in the current climate.

Question 2: Are there current uses in the release bands other than those detailed in RSGB?s band plan and discussed in Section 3 of this consultation?:

I do not beleive so.

Question 3: Are there further consequences of removing the release bands from amateur licences that have not been considered in our analysis?:

No

Question 4: There is an option (although not preferred) to remove access to the adjacent bands, as well as to the release bands. What are the consequences of removing access to the adjacent bands from amateur licences?:

This would mean that a significant part of the microwave spectrum would have no available amateur allocation. Many existing amateur users of these bands have made significant (for an individual) investements in equipment, which would not be usable in other amateur allocations. 2.3GHz is a very accessible and popular band world-wide for EME (moonbounce) communications, with their reliance on technical and operating excellence for success, and is an excellent choice for beginning an exploration of these techniques..

Question 5: Are there current uses in the adjacent bands other than those detailed in the RSGB?s band plan and discussed in Section 3?:

Much amateur activity in the 2.3 and 3.4GHz bands is concered with long-haul communications using narrow-band techniques and marginal, or transitory, propagation mechanisms such as EME, reflection from aircraft and large orbital structures, and anomalous tropspheric conditions. The knowledge of these phenomena, while not of immediate commercial interest, is a valuable resource of scientific value. As much of this work concerns communications extendingoutwith the UK itself, it is highly desirable that the International Amateur Radio Union European allocation (2319 - 2322 Mhz) is retained by UK amateurs. I wish to highlight the fact that many 'amateurs' operating in this part of the spectrum are professional engineers and scientists who involve themselves in self-motivated research and education via amateur radio.

Question 6: Are there additional mitigation measures which would provide demonstrable proof that amateurs would not cause interference into LTE in the release bands following the release?:

Band planning by the RSGB and othe rspecialist interst groups, for example the UK Microwave Group, in conjunction with the Primary User must be the core of mitigation. It is possible that specifying Adjacent Channel Power (ACP) limits for amateur transmitters would be an acceptable mitigation strategy.
Amateurs, both as individuals and with the assistance of groups mentioned above, have the resoruces to design and implement suitable filters.

Question 7: Do you agree with the proposed process for varying licences following cases of reported interference and our proposal to vary licences should dealing with the number of reported cases become too onerous?:

Licenses can already be individually varied in order to assist with solving interference problems, so it would be difficult to justfy an universally applicable change to the license conditions for a specific interference case. Amateur organisations such as the UK Microwave Group and the British Amateur televsion Club, working together with the RSGB, could provide an initial investigation of reported interference to Primary Users. As mentioned in the reply to Q5, many amateurs using these frequencies are experienced professionals.

Question 8: Do you agree with our preferred option?:

It looks like an acceptable compromise, although not ideal. Continued access to some of the frequency bands under consideration is extremely desirable.

Question 9: Are there additional changes to the Amateur Radio Licence which would assist amateur in lowering the risk of causing harmful interference to new uses?:

Surely the terms of the Amateur License, requiring the operator not to cause undue interference, already apply, so I do not see how further changes would reduce the risk.