#### Title:

Mr

#### Forename:

Gordon

#### Surname:

Fiander

### **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:**

Areas I have not found/ noticed in the consultation document.

1.Contesting and portable station use.

Contest stations often use high power combined with high gain antenna systems from high points. In the heat of the moment, trying to secure a marginal contact, things are often pushed to the limit. Poor signals often result in widespread in band/ out of band interference. Whilst limited in time duration, such use poses a real threat to LTE users in the release bands. Portable stations also operate from sites where even at low powers there is the potential for interference to LTE base stations.

2. As far as I am aware, no EME working takes place at 2390mhz in the UK. All current EME communications in Europe are in 2320.000 to 2320.120mhz

3, Operation in other amateur bands could be a source of interference to LTE in the release bands--eg 1296mhz and amateurs will need to review their stations to avoid harmonic content say from high power operation causing interference in the release bands.

4. Amateurs interested in experimenting at microwave frequencies are keen to help in any

way possible OFCOM and Primary/ Secondary users of the radio spectrum to avoid any interference in return for our continued access.

#### 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?:

Yes I agree with this statement.

As 'Spock' on Star Trek would say " the needs of the many outweigh the needs of the few or the one".

## 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?:

Not to my knowledge.

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

Again, not to my knowledge.

# 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?:

1. A financial cost---much equipment would not be easily adaptable for other amateur bands-effectively it would have to be written off. Compensation?

2. A loss of access to spectrum in the adjacent bands would severely limit experimentation for amateurs at microwave frequencies. In particular weak signal working, EME communication and earth-space experiments would be badly affected. For EME the two allocations provide what could be termed Goldilocks bands where dish antenna gain/size and modest power make possible technically challenging EME communications.

## 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?:

None of which I am aware.

# 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?:

Yes. This is a technical matter and there are solutions which can be implemented that would provide demonstrable proof that amateurs would not cause interference into LTE release bands.

All amateur transmit amplifiers should be followed by suitable filters.

I am aware of work to produce designs that would meet very demanding standards to ensure amateurs would not cause interference into the LTE release bands.

# 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?:

I fully understand the need that the nature of the use in the release bands demands no interference.

Amateur's can co exist with LTE.

This may be aided by a more creative use of licence terms and NOV's than the proposed process.

It is the individual 'station' that is responsible for non interference (3.25). I am concerned the proposed process moves away from this principle and starts treating interference as a group problem. Given the limited numbers of people experimenting I feel the individual station approach, which has stood the test of time, coupled with a review of licence terms, aided by the NOV's is a better solution.

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

Yes. I am thankful that OFCOM is aware of the value of amateur technical experimentation in the microwave frequencies. The successful Olympic games showed the need for access to people with real experience---this has often been gained via amateur radio experimentation and this is easily overlooked.

# 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?:

Yes. I think much could be done in terms of additional changes to the Amateur Radio Licence that would lower the risk of interference to new release band users. Consider a restriction of power, say 47dbm/50w with NOV's required for experiments that require higher power like EME. This would give OFCOM valuable information on use. Make post TX filters a mandatory part of the licence.

Antenna gain restriction is another area that could be looked at in order to lower the risk of interference---say 20dbi, with NOV's for higher gain use.

Minimum elevation angle for EME stations, say 10degrees.

Contest working in adjacent bands poses a very real threat and my need restrictions in order to lower the risk of interference. High power/ high gain antennas/ prominent high asl sites coupled with often poor power supply regulation is a recipe for interference.