RSGB Spectrum Forum Meeting - 2015

Murray Niman – G6JYB November 2015









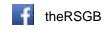




Items:

- 8 IARU Region-1 Interim Meeting
- 9.1 WRC-15
- 9.2 WRC-19
- 9.3 Spectrum Strategy



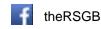




Spectrum Strategy Review 2016

Initial Thoughts on the Foundations







Key Questions?

- What is the context ?
 (drivers, threats, opportunities, SWOT)
- What should we protect?
- What should we develop?
- Where should we compromise, or let go, for the greater good?
- How can we promote / inspire ?
- What is the vision
 - and what approaches do we need to deliver it







Strategy - Spectrum Status

- UK amateurs have access to 136kHz 248GHz
- In some bands lack of Primary spectrum hinders both Amateurs and ultimately the wider UK
- Increasingly influenced by UK / EU / CEPT wider policy goals

 engaging across those is challenging (even with IARU help)

Frequency Range	Amateur %	Amateur- Satellite %	Amateur Primary %
0 - 87.5 MHz	6.4	3.1	77.0
87.5 - 1000 MHz	1.3	0.6	16.7
1000 - 6000 MHz	5.1	1.0	0.0
6000 - 15000 MHz	4.2	0.6	0.0
15000 - 86000 MHz	8.4	7.6	14.7







Spectrum Strategy - General Context

- Current Spectrum Strategy created in 2011/12, due for revision in 2016
- Should be more strategic! (and distinct from EMC)
- Amateur Radio Survey provides some background, but not all
- Demography/Revocation Serious decrease in UK Amateur numbers.
 Upto 15000 revocations, and SK rate rise will seriously reduce Full calls.
 Need a big rise in entrants & progression
- WRCs etc are very expensive. We cost Ofcom too.
 - As Amateur Radio is inherently non-pecuniary the fact is we will always have a problem showing social/economic benefits to regulators, to get them to spend time on us
- Need to look relevant/innovative vs Commercial/Digital (Broadband, Emercomms, IoT, Radio/TV)
- Increases in Digital Modes (novel but not always interoperable)
- Competition: HF noise, IoT at VHF/UHF, 5G-mmWave



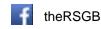




MF/HF Strategy - Background

- MF/HF Broadcasting is in terminal decline in the West
- HF Military continues to innovate (Links, Radar, Digital)
- Solar Cycle trends place stress on lower bands
- WRC-12/15 shows we wont get old/new freqs on a plate:-
 - Many Regulators don't care enough to spend time on this!
 - We can not easily show any economic/social benefit at HF
 - Some Primary Users still care about their frequencies...
 - May need to forgo some HF ambitions for a generation
- Do we absolutely prioritise band plan harmonisation?
 - with the compromises that entails (eg more digital on 30m)
- Mitigations for noise floor, antenna restrictions
 - a particularly acute problem at HF



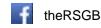




VHF/UHF/Microwave

- Greater opportunity/bandwidth for innovation than HF to show relevancy to Society
- Context/competition is radical improvements to commercial and exempt inc Broadband, Emercomms, IoT, Radio/TV
- Some spectrum loss/restrictions likely in higher bands
- Greater activity/occupancy levels needed (not just repeater numbers) - need a radical increase!
- Current training scheme does not promote this
 may need a radical approach to entry and pre-entry levels
- All segments (inc narrowband, satellite, TV etc need to have more easily accessible, greater hands-on WoW!)







Summary

- Technology does not stand still
- Nor should amateur radio
- We must push the positive innovation/STEM stories
- Demography and wider trends are important
- Is this the right background for the 2016 Spectrum Strategy Review?

