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Subject	Frequency of WSPR beacons in the 144 MHz band
Society	VERON
Contact	Peter Hoefsloot, PA3BIY
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INTRODUCTION

This document provides a VERON proposal to change the frequency of WSPR beacons in the 144 MHz band.

WSPR transmissions are considered as beacons. Contrary to conventional beacons, which are geographically static, the place and time may change dynamically. Frequency assignment and location of conventional beacons are coordinated, i.e. an attempt is made to optimize the use of the allocated spectrum and to prevent interference.

EXPERIENCES

The allocation of WSPR to 144.4905 MHz has caused harmful interference in large parts of Western Europe. Over the past year the reception of DBØFAI (144.490 MHz) has often been impaired, due to the ad hoc appearance of (strong) WSPR beacons. The ad hoc character of these beacons requires a much larger guard band in order to safeguard the reception of static beacons.

SOLUTION

An adequate solution may be found by shifting WSPR to a slightly higher frequency.

The 144-146 MHz bandplan gives no allocation for the frequency band 144.491 - 144.500 MHz. This part of the band is solely used as a guard band between the Beacon band and the All Mode allocation. The All Mode frequency band 144.500 MHz and up is mainly used for transmissions requiring < 12.5 kHz bandwidths (even though the maximum allowable bandwidth is 20 kHz). 144.500 MHz is the SSTV calling frequency, for which either SSB or (narrow-band) FM is used.

Shifting WSPR to 144.492 MHz would still prevent interference to narrow band (FM, 12.5 kHz bandwidth) and SSTV (either 3 kHz SSB-mode or narrow band FM bandwidth) users, and would provide the required safeguard for the Static Beacons.

PROPOSAL

- 1. That the frequency allocation for WSPR beacons in the 144 MHz band shall be shifted from 144.4905 MHz to 144.4920 MHz.**
- 2. That the 144 - 146 MHz bandplan shall be updated accordingly.**