International Co-ordination of DRM and AM Transmissions

The General Assembly of the DRM Consortium, held at the end of March 2006, reported that nearly 40 radio stations have already started with regular DRM broadcasting directed to many parts of the world, bringing the total daily amount of DRM transmissions to almost 700 hours. This is still a small part of the total of over 16000 hours that are co-ordinated each season on shortwaves.

DRM frequency requirements are regularly entered into the HFBC global databases. The HFCC/ASBU association is encouraged by the increase in the public awareness of shortwave co-ordination. At the same time the results of our activity are also increasingly under the public scrutiny. It is not surprising therefore that the HFCC has received several complaints in regard to the DRM interference to AM transmissions - some of them quite recently - prior to the co-ordination conference in China in February 2006. DXers and radio hobbyists in particular have appealed to us and suggested that the available spectrum should be separated between the two modes.

Quite a number of frequency managers and co-ordinators active in the HFCC come from among the radio hobby and DXing community, We are therefore fully aware of the differences between the two systems as well as of the dangers of mutual interference. On the other hand we cannot ignore the present dissatisfaction with the quality of AM, its excessive power consumption, and the fact that at least some broadcasters have been loosing interest in AM transmissions. It is unthinkable that the whole spectrum internationally allocated to and used by AM broadcasting is left out from the present trend towards high-quality sound reproduction and digitalisation.

Unfortunately - especially in regard to shortwaves - the amount of available spectrum is severely limited. Shortwave bands below around 10 MHz have not been substantially enlarged for decades. The HFCC is now a sector member of the ITU in the category of international and regional organisations. It has prepared a document in the run-up to the World Radiocommunication Conference next year with the aim of rallying support for the spectrum enlargement. It is based on the statistics showing that due to the congestion, only around 50 percent of all broadcasting requirements in this range can be received without serious interference.

The Conference results are uncertain, and anyhow, the possible spectrum enlargement would be very slow in coming. The suggested separate allocation of a portion of the present existing frequency space exclusively to DRM has been considered within the HFCC/ASBU association. If implemented, it would severely narrow the already congested low-frequency spectrum available for AM broadcasting on shortwaves. However we are aware of the DRM/AM mutual intereference problem: DRM frequency requirements are already graphically highlighted in the co-ordination schedules for example, and frequency co-ordinators pay special attention to them in their discussions of incompatibilities. In addition, the Steering Board of the HFCC/ASBU association has recommended to members not to submit the DRM frequency requirements at random but rather to cluster them together with the aim of reducing interference to adjacent AM transmissions.

A recommendation on a more stricter spectrum separation between AM and DRM transmissions is not ruled out later after a further increase in the amount of DRM frequency requirements - especially in the higher frequency bands that are less overloaded.

Last but not least we should mention an important principle that is imbedded in the Articles of Association of the HFCC in regard to all co-ordination procedures. The Association does provide the tools, representation and services to facilitate the resolution or minimisation of mutual interference but its management does not enter the bilateral or multilateral co-ordination negotiations and it is not an arbiter of their solutions. In other words, the participants of frequency "collisions" themselves are responsible for the measures taken against the incompatibilities detected by the co-ordination software .

At the same time we pay every attention to what listers and shortwave hobbyists have to say about the quality of shortwave co-ordinaton, and we always pass relevant information to the members concerned.

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