Document IWG-3/022 (04.12.01) Author: Audrey Allison

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United States of America DRAFT PROPOSAL FOR THE WORK OF THE CONFERENCE

Agenda Item 1.11: to consider possible extension of the allocation to the mobile-satellite service (Earth-to-space) on a secondary basis in the band 14-14.5 GHz to permit operation of the aeronautical mobile-satellite service as stipulated in Resolution **216** (**Rev.WRC-2000**).

Background Information: Aeronautical Mobile-Satellite Service (AMSS) systems in the 14 - 14.5 GHz band are proposed to meet the growing demand for two-way broadband communication, including data transmission, for commercial aircraft passengers and crew. In Resolution 216, WRC-2000 resolved that WRC-03 should examine the possibility of broadening the secondary allocation to the mobile-satellite service (Earth-to-space), except aeronautical mobile-satellite, in the 14-14.5 GHz band to include aeronautical use, should the ITU-R studies demonstrate that such a secondary service can be operated without causing interference to the primary services. It further invited the ITU-R to complete, in time for WRC-03, the technical and operational studies on the feasibility of the sharing of the band 14-14.5 GHz between the fixed-satellite (Earth-to-space), radionavigation, fixed and mobile services, except aeronautical mobile, and the aeronautical mobile-satellite service, with the latter service on a secondary basis.

The ITU-R studies have concluded that appropriately designed AMSS systems can operate on a secondary basis in the band 14-14.5 GHz without causing harmful interference to services having primary allocations in the band. Additional studies have shown the feasibility of AMSS sharing with services employing secondary allocations. The ITU-R has also developed [Draft New] Recommendation ITU-R M.[AMSS] to provide administrations a common technical basis for implementing AMSS systems.

On the basis of the conclusions of the studies under Resolution 216, the secondary MSS allocation in the 14-14.5 GHz band can now be extended to include aeronautical use. No other regulatory changes are required and Resolution 216 may be suppressed. To encourage the timely development of AMSS in this band, it will also be proposed that the change of allocation be provisionally applied from the end of WRC-03.

PROPOSALS:

USA/ / 1

MOD

14-14.5 GHz

Allocation to services	
Region 2	Region 3
FIXED-SATELLITE (Earth-to-sp RADIONAVIGATION S5.504 Mobile-satellite (Earth-to-space) & Space research S5.505	except aeronautical mobile satellite
FIXED-SATELLITE (Earth-to-sp RADIONAVIGATION S5.504 Mobile-satellite (Earth-to-space) & Space research S5.505 S5.508 S5.509	except aeronautical mobile satellite
14.3-14.4 FIXED-SATELLITE (Earth-to-space) S5.484A S5.506 Mobile-satellite (Earth-to-space) except aeronautical mobile satellite Radionavigation-satellite	I4.3-14.4 FIXED FIXED-SATELLITE (Earth-to-space) S5.484A S5.506 MOBILE except aeronautical mobile Mobile-satellite (Earth-to-space) except aeronautical mobile satellite Radionavigation-satellite
Space research (space-to-Earth) FIXED FIXED-SATELLITE (Earth-to-sp MOBILE except aeronautical mol	pile except aeronautical mobile-satellite except seconautical mobile-satellite except seconautical mobile-satellite
	Region 2 FIXED-SATELLITE (Earth-to-sp RADIONAVIGATION S5.504 Mobile-satellite (Earth-to-space) & Space research S5.505 FIXED-SATELLITE (Earth-to-sp RADIONAVIGATION S5.504 Mobile-satellite (Earth-to-space) & Space research S5.505 S5.508 S5.509 14.3-14.4 FIXED-SATELLITE (Earth-to-space) S5.484A S5.506 Mobile-satellite (Earth-to-space) except aeronautical mobile satellite Radionavigation-satellite FIXED FIXED-SATELLITE (Earth-to-sp MOBILE except aeronautical mol Mobile-satellite (Earth-to-space) & Space research (space-to-Earth) FIXED FIXED FIXED-SATELLITE (Earth-to-sp MOBILE except aeronautical mol Mobile-satellite (Earth-to-space) & Space research (space-to-Earth)

Reasons:

On the basis of ITU-R studies, appropriately designed and controlled AMSS systems can operate on a secondary basis in the band 14-14.5 GHz without causing harmful interference to the primary services in the band. Studies have also shown the feasibility of AMSS sharing with systems employing secondary allocations in this frequency band.

NOTE: A separate proposal will be needed to give immediate effect to this secondary allocation upon the conclusion of the conference. This is normally achieved by a resolution developed at the conference calling for provisional application of specific conference actions (such as Resolution 54 (WRC-97)) together with a reference in Article S59, Entry into Force and Provisional Application of Radio Regulations (such as S59.6).

USA//2

SUP

RESOLUTION 216 (REV.WRC-2000)

Possible broadening of the secondary allocation to the mobile-satellite service (Earth-to-space) in the band 14-14.5 GHz to cover aeronautical applications

Reasons:

Work is complete.