ITU-APT/L/23-23/937
Dated: 25th February,2025

To,
Shri V J Christopher
Wireless Advisor to the Government of India
Department of Telecommunications (DOT)
Ministry of Communications
Government of India
20, Ashoka Road
New Delhi- 110001

Subject: Request for Consideration of Allowing Lower Size Antennas less than 1.2 M in the Lower Ku-Band (13.75-14 GHz).

Dear Sir,

I am writing on behalf of ITU-APT Foundation of India, a leading organization in the telecommunications industry, to respectfully request your consideration for allowing smaller antennas in the lower Ku-band (13.75-14 GHz) in India.

As per the current Radio Regulations and ITU-R recommendations, the usage of antennas in the 13.75-14 GHz frequency band is subject to specific conditions and limitations, including the prohibition of smaller antennas. However, we believe that allowing the use of these smaller antennas in this frequency range will provide several advantages and significant contributions to the country's telecommunications infrastructure, especially for satellite communications. There is a substantial amount of satellite capacity available in the lower Ku-band, and this change would greatly benefit the industry.

WRC-27 agenda item 1.2 considering relaxation of the limitations imposed under Nos 5.502 and 5.303, a minimum antenna diameter of 4.5 meters is required for earth stations in this band. India and many other countries have been supporting this agenda.

Agenda Item 1.2 of the ITU WRC-27 under Resolution 129 (WRC-23) focuses on the possible revisions of sharing conditions in the frequency band 13.75-14 GHz. The primary objective is to allow the use of uplink fixed-satellite service (FSS) earth stations with smaller antenna sizes. The studies aim to ensure the protection of existing services, particularly those in the radiolocation or radionavigation services, from harmful interference.

The use of smaller antennas in the lower Ku-band can bring the following benefits:

Improved Accessibility and Coverage: Smaller antennas can be deployed in urban and remote locations, thus improving connectivity in underserved areas and supporting high-quality satellite-based internet and communication services.

Cost Efficiency: By reducing the size and cost of antennas, network operators can reduce capital expenditure and operational costs, making satellite communications more affordable and accessible for a wider range of businesses and consumers.

Technological Advancements: The development of new technologies, such as more efficient antenna designs and advanced signal processing techniques, has made it possible to achieve reliable communication performance with smaller antennas in the lower Ku-band.

Alignment with Global Trends: Many countries have already adopted more flexible regulations regarding antenna sizes in this frequency range, leading to enhanced satellite communication services and improved global connectivity. Allowing smaller antennas in India will ensure that we remain competitive in the global satellite communication market.

We fully understand that any change to the current regulations must consider international obligations and technical standards, particularly those set by the ITU. However, we respectfully request that the DOT re-evaluate the existing restrictions and explore the possibility of a modification or relaxation that will allow the use of smaller antennas in the 13.75-14 GHz band, while ensuring the protection of existing services and spectrum integrity.

We are confident that this regulatory change will foster innovation and support the growth of satellite communication services in India, helping us meet the increasing demand for broadband connectivity and efficient telecommunications solutions.

We kindly request your consideration of this matter, and we look forward to your positive response.

Thank you for your time and attention to this important issue.

Yours faithfully,

Bharat B Bhatia,

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Copy to

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