Questions for the Record

Subcommittee on Communications and Technology

Hearing entitled,

“Liftoff: Unleashing Innovation in Satellite Communications Technologies”

February 8, 2023

Mr. William Richardson, Deputy Associate General Counsel for Agenda Review, Federal Communications Commission

The Honorable Russ Fulcher

1. We're seeing more satellite companies offering broadband service to help close the digital divide. Will the SAT Streamlining Act expedite the licensing process so we can get these satellites up as quickly as possible to meet this need?

Response:

Space-based broadband services are critical in helping to close the digital divide and connect everyone, everywhere. The SAT Streamlining Act, in combination with other ongoing FCC initiatives to modernize the satellite licensing processes, will provide the FCC with additional tools to facilitate faster licensing times, allowing satellite operators to move forward with plans to provide broadband services that benefit American consumers. We look forward to continuing to provide technical assistance on this bill.

Streamlining and updating the satellite licensing rules and framework are a priority for the FCC. Significantly, the FCC recently released a Notice of Proposed Rulemaking (NPRM) which proposes to change the way the Commission licenses space and earth station applications to stay apace with the unprecedented number of satellite applications that have been filed over the course of the past couple of years.[1] Specifically, the NPRM seeks comment on ways to speed up the process for placing applications on public notice – the first step in building a public record. The NPRM also seeks comment on how to reduce processing timelines and other ways to streamline satellite application processing. The public comment period closes on April 5 and we look forward to reviewing the comments on our proposals and the additional ideas submitted by interested parties, and to moving quickly to final rules.

Further, as noted during the February 8 hearing, we have increased by 38% the size of the Satellite Division staff to help expedite the licensing process, including adding six new engineers. We continue to recruit and train engineering talent and look forward to further growing the engineering resources within the Commission. We have already reaped some benefits of the increase in staff, with a reduction in the earth station application backlog by more than twenty percent. In addition, in January, the Commission voted to create a new Space Bureau. The Space Bureau, once established, will prioritize attention to the needs of the satellite industry and focus Commission resources on those needs.

2. Can you discuss the differences and challenges the FCC faces in approving licenses for LEO satellite constellations versus other satellites? How can we make the process easier?

Response:

The satellite industry is growing at a record pace. Over the past two years alone, the FCC has received applications for 64,000 new satellites and hundreds of applications for new earth stations to communicate with these satellites. The applications include proposals for different

[1] *Expediting Initial Processing of Satellite and Earth Station Applications*, IB Docket Nos. 22-411 and 22-271, Notice of Proposed Rulemaking, FCC 22-95, (Dec. 21, 2022)

types of satellite systems, including non-geostationary satellite orbit systems seeking to provide internet service via large constellations in LEO, smaller constellations seeking to provide remote sensing type services, and next generation high-throughput geostationary satellite orbit (GSO) systems. As noted in the response to question 1, the FCC has several ongoing initiatives to respond to the need for a new regulatory framework in order to keep pace with new satellite technologies and proposals.

Response:

Many of these proposals are more technically complex and must be analyzed on a case-by-case basis. Further, many systems are designed to operate across frequency bands that are shared with satellite operators with different architectures, such as Federal government users. In addition, many of these satellite systems operate in frequency bands that are shared with terrestrial systems. These factors add additional layers of complexity and coordination to ensure that there is no harmful interference to other operators.

The Honorable August Pfluger

1. As space is shared jurisdiction with a host of other countries, how should Congress be thinking about developing sustainable rules and international collaborations, especially with malign actors like China and Russia who pose a threat to our national security, including in space?

Response:

This is an important issue and the FCC is working closely with the State Department and our colleagues throughout the U.S. government to make sure the United States is a leader in the various international fora where these issues are discussed, such as the International Telecommunication Union, (ITU) standards-setting bodies, and the United Nations Committee on Peaceful Use of Outer Space. Significantly, the U.S. holds several leadership positions at the ITU, including in the ITU's Radiocommunication Sector as well as the ITU's Telecommunication Development Sector. At home, the United States should be at the forefront in developing and implementing strong space sustainability rules for those wanting to provide satellite services in the United States, and therefore lead the world by example, including through sharing our regulatory best practices with other interested Administrations. For example, FCC and other U.S. government experts, advocate and share U.S. government views and policies on space sustainability with our counterparts through international training sessions in the United States Telecommunications Training Institute and other US government-led initiatives.