

# **STA Request - Narrative**

STA Confirmation Number: EL653090
STA File Number: 0577-EX-ST-2019
Date of Submission: April 1, 2019

### Introduction

XTAR requests a Special Temporary Authority (STA), beginning 16 Apr 2019, to operate an X-band satellite communications link in the X-band (7.25-8.4 GHz) frequency range to support RDT&E of a WGS-compatible, remotely-piloted vehicle. This vehicle, once initial benchtesting is completed in April 2019, will be used in WGS-XTAR handoff tests this summer, to be scheduled with US Air Force Space and Missiles Systems Center.

A STA is specifically requested due to the need for pre-handoff benchtesting of the vehicle's onboard systems through the commercial X-band SATCOM link, to be provided by XTAR. Benchtesting is scheduled to begin on 16 April to meet summer 2019 WGS-XTAR handoff testing timelines, and will occur periodically over the next 6 months. An extension will be requested if needed.

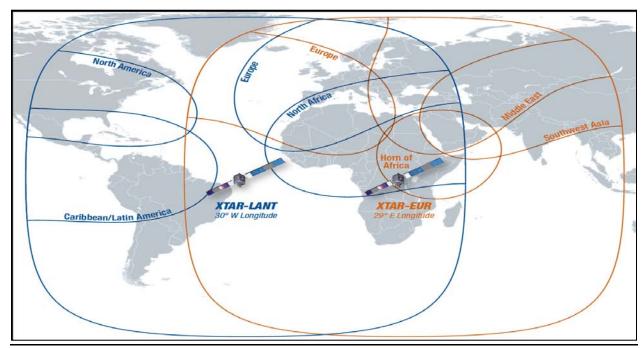
Due to pre-launch international coordination agreements, XTAR does not cause interference with the DoD's Wideband Global SATCOM (WGS) constellation.

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## **Network Topology**

If approved, XTAR will establish a 2 x 4 Mbps TDM/TDMA circuit between a remote terminal located in Fredericksburg, VA and a commercial teleport located in Hamilton, Ontario, using the XTAR-LANT North America (C7) beam as depicted in Figure 1, below. Modem to be utilized is an IDirect Evolution 850. More detailed specifications for this circuit are provided in STA request.





**Figure 1 - XTAR Constellation Footprint** 

## **About XTAR, LLC**

XTAR, LLC is a U.S.-owned satellite operator founded in 2001 entirely on private capital and with the mission of providing the U.S. Government user with satellite services on military X-band frequencies. Controlling interest in XTAR is held by Loral Space and Communications (NY).

Today, XTAR operates two on-orbit GEO payloads, both in X-band frequencies and amounting to 1.44 GHz of fully WGS-compatible space segment capacity:

XTAR-EUR: 29.0° E.L.XTAR-LANT: 30.0° W.L.

\*XTAR is presently in the design phase of its new constellation of X- and Ka-band satellites, planned for launch in 2023/2024. XTAR intends to provide station kept capacity at 29E and 30W until the current satellites are replaced.

### **For More Information Please Contact:**

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