

**United States of America
FEDERAL COMMUNICATIONS COMMISSION
EXPERIMENTAL
RADIO STATION CONSTRUCTION PERMIT
AND LICENSE**

EXPERIMENTAL

(Nature of Service)

WE2XBE

(Call Sign)

XD FX MO

(Class of Station)

0191-EX-RR-2011

(File Number)

NAME ViaSat, Inc.

Subject to the provisions of the Communications Act of 1934, subsequent acts, and treaties, and all regulations heretofore or hereafter made by this Commission, and further subject to the conditions and requirements set forth in this license, the licensee hereof is hereby authorized to use and operate the radio transmitting facilities hereinafter described for radio communications in accordance with the program of experimentation described by the licensee in its application for license.

Operation: In accordance with Sec. 5.3(d, f, i) of the Commission's Rules

Station Locations

- (1) Gaithersburg (MONTGOMERY), MD - NL 39-11-43; WL 77-15-28; MOBILE:
Gaithersburg and surrounding area, Gaithersburg, MD, within 100 km, centered around
NL 39-11-43; WL 77-15-28
- (2) Duluth (GWINNETT), GA - NL 33-57-46; WL 84-05-41
- (3) Carlsbad (SAN DIEGO), CA - NL 33-07-35; WL 117-16-30
- (4) MOBILE: CONUS
- (5) Miami (DADE), FL - NL 25-55-02; WL 80-13-30
- (6) MOBILE: 32 KM OFF OF ATLANTIC OCEAN
- (7) MOBILE: 32 KM OFF OF PACIFIC OCEAN
- (8) MOBILE: 32 KM OFF OF GULF OF MEXICO

Frequency Information

Gaithersburg (MONTGOMERY), MD - NL 39-11-43; WL 77-15-28; MOBILE: Gaithersburg and surrounding area, Gaithersburg

Frequency	Station Class	Emission Designator	Authorized Power	Frequency Tolerance (+/-)
14000-14500 MHz	MO	34M0G7D	30 kW (ERP)	

This authorization effective August 01, 2011 and
will expire 3:00 A.M. EST August 01, 2013

**FEDERAL
COMMUNICATIONS
COMMISSION**



Frequency Information

Duluth (GWINNETT), GA - NL 33-57-46; WL 84-05-41

Frequency	Station Class	Emission Designator	Authorized Power	Frequency Tolerance (+/-)
14000-14500 MHz	FX	34M0G7D	6 MW (ERP)	

Carlsbad (SAN DIEGO), CA - NL 33-07-35; WL 117-16-30

Frequency	Station Class	Emission Designator	Authorized Power	Frequency Tolerance (+/-)
14000-14500 MHz	FX	36M0G7D	6 MW (ERP)	

MOBILE: CONUS

Frequency	Station Class	Emission Designator	Authorized Power	Frequency Tolerance (+/-)
14000-14500 MHz	MO	36M0G7D	30 kW (ERP)	
		36M0G7D		

Miami (DADE), FL - NL 25-55-02; WL 80-13-30

Frequency	Station Class	Emission Designator	Authorized Power	Frequency Tolerance (+/-)
14000-14500 MHz	FX	36M0G7D	6 MW (ERP)	

Frequency Information

MOBILE: 32 KM OFF OF ATLANTIC OCEAN

Frequency	Station Class	Emission Designator	Authorized Power	Frequency Tolerance (+/-)
14000-14500 MHz	MO	36M0G7D	30 kW (ERP)	

MOBILE: 32 KM OFF OF PACIFIC OCEAN

Frequency	Station Class	Emission Designator	Authorized Power	Frequency Tolerance (+/-)
14000-14500 MHz	MO	36M0G7D	30 kW (ERP)	

MOBILE: 32 KM OFF OF GULF OF MEXICO

Frequency	Station Class	Emission Designator	Authorized Power	Frequency Tolerance (+/-)
14000-14500 MHz	MO	36M0G7D	30 kW (ERP)	

Special Conditions:

- (1) In lieu of frequency tolerance, the occupied bandwidth of the emission shall not extend beyond the band limits set forth above.
- (2) Licensee should be aware that other stations may be licensed on these frequencies and if any interference occurs, the licensee of this authorization will be subject to immediate shut down.
- (3) Operation is limited to 2 units per event and 12 units at any given time.
- (4) The designated point-of-contact to terminate transmissions if interference occurs is Mr. Daryl Hunter at (888) 272-7232.
- (5) POINTS OF COMMUNICATION: SES Americom AMC-6 & AMC-15, SES New Skies NSS-7, SES Gibraltar AMC-21, Telesat - T11N & T14 and SAT-GE 23 Satellites.

Special Conditions:

- (6) Prior to commencement of operations with SES Americom AMC-6 & AMC-15, SES New Skies NSS-7, SES Gibraltar AMC-21, Telesat - T11N & T14 and SAT-GE 23, pursuant to this experimental license, ViaSat Inc. shall obtain a certification from SES Americom, SES New Skies, SES Gibraltar licensed, Telesat and SAT-GE have notified all satellite operators with co-frequency operations within +/-6 degrees of each of SES Americom AMC-6 & AMC-15, SES New Skies NSS-7, SES Gibraltar AMC-21, Telesat - T11N & T14 and SAT-GE 23, generally describing the experimental operations authorized herein, including the term thereof, and providing a point of contact for the purpose of resolving any complaints of interference. ViaSat Inc. shall obtain a similar certification from SES Americom, SES New Skies, SES Gibraltar, Telesat and SAT-GE 23 if, during the term of this experimental license, SES Americom AMC-6 & AMC-15, SES New Skies NSS-7, SES Gibraltar AMC-21, Telesat - T11N & T14 and SAT-GE 23 move orbit locations, or if a satellite operator commences co-frequency operations within +/- 6 degrees of SES Americom AMC-6 & AMC-15, SES New Skies NSS-7, SES Gibraltar AMC-21, Telesat - T11N & T14 and SAT-GE 23. If the point of contact receives a complaint of harmful interference, the party receiving the complaint (if not ViaSat Inc.) will notify ViaSat Inc., and ViaSat Inc. shall immediately cease such operations or adjust such operations to avoid harmful interference. ViaSat Inc. will submit a copy of SES Americom AMC-6 & AMC-15, SES New Skies NSS-7, SES Gibraltar AMC-21, Telesat - T11N & T14 and SAT-GE 23's certification(s) to the Commission for incorporation into the record of this file.
- (7) In accordance with Article 4.4 of the ITU Radio Regulations, the operations authorized herein shall not cause harmful interference to, and shall not claim protection from harmful interference caused by, a station operating in accordance with the provisions of the ITU Constitution, the ITU Convention, and the ITU Radio Regulations.
- (8) Prior to operating in the 14.0-14.2 GHz frequency band, in the listed locations, ViaSat Inc. will coordinate with National Aeronautics and Space Administration (NASA) and notify the Commission of the results of that coordination:
Within 125 km of the NASA TDRSS facilities on Guam (latitude 13° 36' 55" N, longitude 144° 51' 22" E) or,
Within 125 km of the NASA TDRSS facilities in White Sands, New Mexico (latitude 32° 20' 59" N, longitude 106° 36' 31" W and latitude 32° 32' 40" N, longitude 106° 36' 48"W) or,
Within 125 km of the TDRSS facilities in Blossom Point, Maryland (latitude 38° 25' 44" N, longitude 77° 05' 20" W).
- (9) No transmissions are permitted between 14.47 GHz and 14.5 GHz within 125 km of Mauna Kea, HI (at latitude 19° 48' N, longitude 155° 28' W).
- (10) Maximum EIRP density allowed is 14 dBW/4kHz.

Special Conditions:

- (11) Note that if, during the term of this authorization, NASA seeks to provide similar protection to a future TDRSS site that has been coordinated through the National Telecommunications and Information Administration (NTIA) Interdepartment Radio Advisory Committee (IRAC) Frequency Assignment Subcommittee process, NTIA will notify the Commission that the site is nearing operational status. Upon notice from the Commission, ViaSat Inc. must cease operations in the 14.0-14.2 GHz band within 125 km of the new TDRSS site until ViaSat Inc. has coordinated with the new site. After coordination, ViaSat Inc. operations will then again be permitted in the 14.0-14.2 GHz band within 125 km of the new TDRSS site, subject to any operational constraints developed in the coordination process.
- (12) Prior to operating in the 14.47-14.5 GHz frequency band, in the listed locations, ViaSat Inc. will coordinate with the National Academy of Sciences (NSF) and notify the Commission of the results of that coordination:
 - Within 45 km of the radio observatory on St. Croix, Virgin Islands (latitude 17° 46' N, longitude 64° 35' W);
 - Within 125 km of the radio observatory on Mauna Kea, Hawaii (latitude 19° 48' N, longitude 155° 28' W);
 - Within 90 km of the Arecibo Observatory on Puerto Rico (latitude 18° 20' 46" N, longitude 66° 45' 11" W); and
 - Within 160 km of the radio observatories listed in US203 as observing in the 14.47-14.5 GHz band.
- (13) Off-axis EIRP spectral density for cross-polarized signals emitted from the earth station shall not exceed the calculations given in 47CFR 25.222(a)(4).
- (14) Operation is subject to prior coordination with all the respective satellite operators as necessary to minimize interference.