Date & Time Filed: Oct 28 2005 3:44:30:996PM File Number: SES-MSC-INTR2005-02486

Callsign/Satellite ID:

APPLICATION FOR EARTH STATION AUTHORIZATIONS

FCC Use Only

FCC 312 MAIN FORM FOR OFFICIAL USE ONLY

APPLICANT INFORMATION

Enter a description of this application to identify it on the main menu:

ViaSat, Inc. Ku-band Mobile Earth Station Application

1–8. Legal Name of Applicant

Name: ViaSat, Inc. Phone Number: 760–476–2583

DBA Fax Number: 760–929–3941

Name:

Street: 6155 El Camino Real E–Mail: daryl.hunter@viasat.com

City: Carlsbad State: CA

Country: USA Zipcode: 92009 -

Attention: Mr Daryl T Hunter, P.E.

9–16. Name of Contact Representative

Name: Daryl T. Hunter, P.E. **Phone Number:** 760–476–2583

Company: ViaSat, Inc. Fax Number: 760–929–3941

Street: 6155 El Camino Real E–Mail: daryl.hunter@viasat.com

City: Carlsbad State: CA

Country: USA Zipcode: 92009–

Attention: Mr Daryl T Hunter, P.E. **Relationship:** Engineer

CLASSIFICATION OF FILING

17. Choose the button next to the classification that applies to this filing for both questions a. and b. Choose only one for 17a and only one for 17b.

a.

a1. Earth Station

(N/A) a2. Space Station

b.

b1. Application for License of New Station

6 b2. Application for Registration of New Domestic Receive-Only Station

(N/A) b3. Amendment to a Pending Application

(N/A) b4. Modification of License or Registration

(N/A) b5. Assignment of License or Registration

(N/A) b6. Transfer of Control of License or Registration

(N/A) b7. Notification of Minor Modification

(N/A) b8. Application for License of New Receive-Only Station Using Non-U.S. Licensed Satellite

(N/A) b9. Letter of Intent to Use Non-U.S. Licensed Satellite to Provide Service in the United States

b b10. Other (Please specify)

o b11. Application for Earth Station to Access a Non–U.S.satellite Not Currently Authorized to Provide the Proposed Service in the Proposed Frequencies in the United States.

17c. Is a fee submitted with this applicat If Yes, complete and attach FCC Form Governmental Entity Other(please explain): 17d.	159. If No, indicate reason for fee exemption	(see 47 C.F.R.Section 1.1114).
Fee Classification BGB – Mobile Satellite Authorization	Earth Stations Blanket	
18. If this filing is in reference to an existing station, enter: (a) Call sign of station: Not Applicable	19. If this filing is an amendment to a pending(a) Date pending application was filed:Not Applicable	g application enter: (b) File number of pending application: Not Applicable
TYPE OF SERVICE 20. NATURE OF SERVICE: This filing is f	For an authorization to provide or use the following	ng type(s) of service(s): Select all that apply:
a. Fixed Satellite b. Mobile Satellite c. Radiodetermination Satellite d. Earth Exploration Satellite e. Direct to Home Fixed Satellite f. Digital Audio Radio Service g. Other (please specify)		

21. STATUS: Choose the button next to the applicable status. Choose	22. If earth station applicant, check all that apply.
only one.	■ Using U.S. licensed satellites
Common Carrier Non–Common Carrier	Using Non–U.S. licensed satellites
23. If applicant is providing INTERNATIONAL COMMON CARRIER's facilities:	
Connected to a Public Switched Network Not connected	to a Public Switched Network N/A
24. FREQUENCY BAND(S): Place an "X" in the box(es) next to all a	pplicable frequency band(s).
a. C–Band (4/6 GHz) b. Ku–Band (12/14 GHz)	
c.Other (Please specify upper and lower frequencies in MHz.)	
Frequency Lower: Frequency Upper:	
TYPE OF STATION	
25. CLASS OF STATION: Choose the button next to the class of station	that applies. Choose only one.
a. Fixed Earth Station	
o b. Temporary–Fixed Earth Station	
oc. 12/14 GHz VSAT Network	
d. Mobile Earth Station	
(N/A) e. Geostationary Space Station	
(N/A) f. Non–Geostationary Space Station	
g. Other (please specify)	
26. TYPE OF EARTH STATION FACILITY: Choose only one. Transmit/Receive Transmit-Only Receive-Only N/A	

PURPOSE OF MODIFICATION

27. The purpose of this proposed modification is to: (Place an 'X' in the box(es) next to all that apply.)	
Not Applicable	
ENVIRONMENTAL POLICY	
28. Would a Commission grant of any proposal in this application or amendment have a significant environmental impact as defined by 47 CFR 1.1307? If YES, submit the statement as required by Sections	O Yes ● No
1.1308 and 1.1311 of the Commission's rules, 47 C.F.R. §§ 1.1308 and 1.1311, as an exhibit to this application. A Radiation Hazard Study must accompany all applications for new transmitting facilities, major modifications, or major amendments.	Exhibit 2
ALIEN OWNERSHIP Earth station applicants not proposing to provide broadcast, common carrier, aerona aeronautical fixed radio station services are not required to respond to Items 30–34.	autical en route or
29. Is the applicant a foreign government or the representative of any foreign government?	O Yes O No
30. Is the applicant an alien or the representative of an alien?	O Yes O No N/A

31. Is the applicant a corporation organized under the laws of any foreign government?	O Yes ⊗ No O N/A
32. Is the applicant a corporation of which more than one–fifth of the capital stock is owned of record or voted by aliens or their representatives or by a foreign government or representative thereof or by any corporation organized under the laws of a foreign country?	♦ Yes ♦ No ♦ N/A
33. Is the applicant a corporation directly or indirectly controlled by any other corporation of which more than one–fourth of the capital stock is owned of record or voted by aliens, their representatives, or by a foreign government or representative thereof or by any corporation organized under the laws of a foreign country?	O Yes No O N/A
34. If any answer to questions 29, 30, 31, 32 and/or 33 is Yes, attach as an exhibit an identification of the aliens or foreign entities, their nationality, their relationship to the applicant, and the percentage of stock they own or vote.	NASA Coordination
BASIC QUALIFICATIONS	
35. Does the Applicant request any waivers or exemptions from any of the Commission's Rules? If Yes, attach as an exhibit, copies of the requests for waivers or exceptions with supporting documents.	Yes ○ No

36. Has the applicant or any party to this application or amendment had any FCC station authorization or license revoked or had any application for an initial, modification or renewal of FCC station authorization, license, or construction permit denied by the Commission? If Yes, attach as an exhibit, an explination of circumstances.	O Yes	⊚ No
37. Has the applicant, or any party to this application or amendment, or any party directly or indirectly controlling the applicant ever been convicted of a felony by any state or federal court? If Yes, attach as an exhibit, an explination of circumstances.	O Yes	No
38. Has any court finally adjudged the applicant, or any person directly or indirectly controlling the applicant, guilty of unlawfully monopolizing or attemptiing unlawfully to monopolize radio communication, directly or indirectly, through control of manufacture or sale of radio apparatus, exclusive traffic arrangement or any other means or unfair methods of competition? If Yes, attach as an exhibit, an explanation of circumstances	O Yes	⊚ No
39. Is the applicant, or any person directly or indirectly controlling the applicant, currently a party in any pending matter referred to in the preceding two items? If yes, attach as an exhinit, an explanation of the circumstances.	O Yes	⊚ No

40. If the applicant is a corporation and is applying for a space station license, attach as an exhibit the names, address, and citizenship of those stockholders owning a record and/or voting 10 percent or more of the Filer's voting stock and the percentages so held. In the case of fiduciary control, indicate the beneficiary(ies) or class of beneficiaries. Also list the names and addresses of the officers and directors of the Filer.		
41. By checking Yes, the undersigned certifies, that neither applicant nor any other party to the application is subject to a denial of Federal benefits that includes FCC benefits pursuant to Section 5301 of the Anti–Drug Act of 1988, 21 U.S.C. Section 862, because of a conviction for possession or distribution of a controlled substance. See 47 CFR 1.2002(b) for the meaning of "party to the application" for these purposes.	Yes	O No
42a. Does the applicant intend to use a non–U.S. licensed satellite to provide service in the United States? If Yes, answer 42b and attach an exhibit providing the information specified in 47 C.F.R. 25.137, as appropriate. If No, proceed to question 43.	○ Yes	⊚ No
42b. What administration has licensed or is in the process of licensing the space station? If no license will be issued, w coordinated or is in the process of coordinating the space station?	hat administr	ation has

43. Description. (Summarize the nature of the application and the services to be provided). (If the complete description does not appear in this box, please go to the end of the form to view it in its entirety.)

ViaSat seeks blanket authorization to operate up to 1000 technically identical transmit and receive mobile earth stations aboard aircraft operating within the United States and adjacent waters to provide two-way, broadband Internet services to aircraft passengers and crew. ViaSat also requests a waiver of certain Commission rules. See Exhibit 3.

CERTIFICATION

The Applicant waives any claim to the use of any particular frequency or of the electromagnetic spectrum as against the regulatory power of the United States because of the previous use of the same, whether by license or otherwise, and requests an authorization in accordance with this application. The applicant certifies that grant of this application would not cause the applicant to be in violation of the spectrum aggregation limit in 47 CFR Part 20. All statements made in exhibits are a material part hereof and are incorporated herein as if set out in full in this application. The undersigned, individually and for the applicant, hereby certifies that all statements made in this application and in all attached exhibits are true, complete and correct to the best of his or her knowledge and belief, and are made in good faith.

true, complete and correct to the best of his or her knowledge and belief, and are made in good faith.
44. Applicant is a (an): (Choose the button next to applicable response.)
O Individual
O Unincorporated Association
O Partnership
© Corporation
Governmental Entity
Other (please specify)

	45. Name of Person Signing Gregory D. Monahan		46. Title of Person Sign Vice President – Admir	ning nistration	
47.	Please supply any need attachments.				
A	ttachment 1: Exhibit 1	Attachment 2:		Attachment 3:	
_				1	

WILLFUL FALSE STATEMENTS MADE ON THIS FORM ARE PUNISHABLE BY FINE AND / OR IMPRISONMENT (U.S. Code, Title 18, Section 1001), AND/OR REVOCATION OF ANY STATION AUTHORIZATION (U.S. Code, Title 47, Section 312(a)(1)), AND/OR FORFEITURE (U.S. Code, Title 47, Section 503).

SATELLITE EARTH STATION AUTHORIZATIONS FCC Form 312 – Schedule B:(Technical and Operational Description) FOR OFFICIAL USE ONLY

Location of Earth Station Site

E1: Site Identifier: Airborne E5. Call Sign: N/A

E2: Contact Name Daryl T. Hunter E6. Phone 760–476–2583

Number:

E3. Street: E7. City: Carlsbad

E8. County: San Diego

E4. State CA E9. Zip Code 92009

E10. Area of Operation: United States and adjacent waters

E11. Latitude: 0 °0 '0.0 "

E12. Longitude: 0 °0 '0.0 "

E13. Lat/Lon Coordinates are: NAD-27 NAD-83 N/A

E14. Site Elevation (AMSL): 0.0 meters

E15. If the proposed antenna(s) operate in the Fixed Satellite Service (FSS) with geostationary satellites, do(es) the proposed antenna(s) comply with the antenna gain patterns specified in Section 25.209(a) and (b) as demonstrated by the manufacturer's qualification measurement? If NO, provide as a technical analysis showing compliance with two–degree spacing policy.	O Yes	s ⊚ No	O N/A
E16. If the proposed antenna(s) do not operate in the Fixed Satellite Service (FSS), or if they operate in the Fixed Satellite Service (FSS) with non–geostationary satellites, do(es) the proposed antenna(s) comply with the antenna gain patterns specified in Section 25.209(a2) and (b) as demonstrated by the manufacturer's qualification measurements?	O Yes	o No	⊚ N/A
E17. Is the facility operated by remote control? If YES, provide the location and telephone number of the control point.	⊚ Ye	s o	No
E18. Is frequency coordination required? If YES, attach a frequency coordination report as	O Ye	s 📵	No
E19. Is coordination with another country required? If YES, attach the name of the country(ies) and plot of coordination contours as	O Ye	s 📵	No
E20. FAA Notification – (See 47 CFR Part 17 and 47 CFR part 25.113(c)) Where FAA notification is required, have you attached a copy of a completed FCC Form 854 and or the FAA's study regarding the potential hazard of the structure to aviation? FAILURE TO COMPLY WITH 47 CFR PARTS 17 AND 25 WILL RESULT IN THE RETURN OF THIS APPLICATION.	O Ye	s 🔞	No
POINTS OF COMMUNICATION	-		
Satellite Name: AMC-6 AMC-6 72 W.L. If you selected OTHER, please enter the following:			

E21. Common Nam	e:			E22. ITU Name:				
E23. Orbit Location	:			E24. Country:				
Satellite Name: A	MC 1 AMC 1 103	W.L. If you selec	cted OTHER	R, please e	nter the following:			
E21. Common Nam	e:			E22. ITU	Name:			
E23. Orbit Location	:			E24. Cou	intry:			
				•				
Satellite Name: A	LSAT ALL AUTHO	ORIZED U.S. ALS	AT If you	selected	OTHER, please en	ter the following:		
E21. Common Nam	e:			E22. ITU Name:				
E23. Orbit Location	:			E24. Country:				
POINTS OF CO	OMMUNICATION	(Destination Poin	ts)	•				
E25. Site Identifier:								
E26. Common Nam	e:			E27. Cou	intry:			
ANTENNA				•				
Site ID	E28. Antenna Id	E29. Quantity	E30. Manufac	turer	E31. Model	E32. Antenna Size <meters></meters>	E41/42. Antenna GainTransmint and/or Recieve (dBi atGHz)	
Airborne	1000009	1000	ViaSat		1000009	0.2921	29.62 dBi at 11.95	

31.27 dBi at 14.25

Id	Diameter	E35. Above Ground Level (meters)	(meters)	Height Above Ground	Input Power at antenna flange 	Maximum Antenna Height	E40. Total EIRP for al carriers (dBW)
1000009	0.2921/0.2921	16764.0	16764.0	0.0	4.0	16764.0	37.75

FREQUENCY

E28. Antenna Id	E43/44. Frequency Bands (MHz)	E45. T/R Mode			EIRP per Carrier (dBW)	E49. Maximum ERIP Density per Carrier (dBW/4kHz)
1000009	11700 12200	R	Horizontal and Vertical	36MG7D	49.5	9.96

E50. Modulation and Services (If the complete description does not appear in this box, please go to the end of the form to view it in its entirety.)

QPSK, Direct Sequence Spread Spectrum

1000009	14000	Т	Horizontal and	14M4G7D	37.75	2.19
	14500		Vertical			

E50. Modulation entirety.)	and Services (If	the complete descrip	otion does not appear	in this box, please	go to the end of the	e form to view it in its
GMSK, Dire	ect Sequence S	pread Spectrum	n			
1000009	14000 14500	Т	Horizontal and Vertical	36M0G7D	37.75	-1.79
E50. Modulation entirety.) GMSK, Dire	ect Sequence S			71		e form to view it in its
1000009	14400 14500	Т	Horizontal and Vertical	28M8G7D	37.75	-0.82
E50. Modulation entirety.) GMSK, Dire	and Services (If the sect Sequence S			in this box, please	go to the end of the	e form to view it in its

FREQUENCY COORDINATION

E28. Antenna Id		Limits(MHz)	Range of Satellite Arc E/W Limit	E56. Earth Station Azimuth Angle Eastern Limit	Antenna Elevation Angle	E58. Earth Station Azimuth Angle Western Limit	Antenna Elevation	E60. Maximum EIRP Density toward the Horizon (dBW/4kHz)
1000009	Geostationary	14000 14500	44.0/ 190.5	105.57	5.28	225.04	5.02	-13.51

REMOTE CONTROL POINT LOCATION

E61. Call Sign E030131 NOTE: Please enter the callsign of the contro callsign for which this application is being filed.		E65. Phone Number 888–272–7232		
E62. Street Address 6155 El Camino Real				
E63. City Carlsbad	E67. County San Diego		E64/68. State/Country CA/ USA	E66. Zip Code 92009

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