

Marlink-ITC, Inc,

Modification Application to Add Authorization for up to
500 Intellian Model "V45C" 0.45 Meter Ku-band Antennas,
500 Intellian Model "V60E" 0.65 Meter Ku-band Antennas,
500 KNS Model "C4" 0.45 Meter Ku-band Antennas,
500 KNS Model "Z6" 0.61 Meter Ku-band Antennas,
500 KNS Model "Z7" 0.75 Meter Ku-band Antennas,
500 KNS Model "Z8" 0.83 Meter Ku-band Antennas,
500 KNS Model "Z10" 1.0 Meter Ku-band Antennas,
500 Intellian Model "V240MTC" 2.4 Meter C-band Antennas,
500 Intellian Model "V240MTGen2C" 2.4 Meter C-band Antennas and
500 SeaTel Model "2400C" 2.4 Meter C-band Antennas
to the
WB36 Authorization for Earth Stations on Vessels (ESV)

SES-MOD-20200528-00575

Call Sign WB36

Marlink requests that authorization for the above listed new ESV remote antennas be added to the WB36 license. All the remote ESVs will be located on vessels traveling in U.S. and international waters. They will operate with hub antennas that are separately licensed. They will be utilized to provide ESV service in the same manner as previously authorized by the Commission and will be operated in full compliance with the requirements of the Commission's Earth Station in Motion (ESIM) and ESV regulations as set forth in §25.228 and otherwise of the Rules.

Marlink's compliance with the application requirements for authorization of these earth stations follows herewith, and the required exhibits are included as attachments to the Modification Application.

Compliance with Application Requirements

§25.115

(a)(1) Application filed electronically through the International Bureau Filing System and all information specified in this section is either included in the Main Form and Schedule B or follows below.

(a)(2)-(4) Not applicable.

(a)(5) See Exhibit 2 – "Informative Attachment"

(a)(6)-(10) Not applicable.

Exhibit 1 = Narrative and Compliance With Application Requirements

(b) Not applicable.

(c)(1) Form 312 submitted and Schedule B completed as appropriate.

(c)(1)(i) All the above listed Ku-band antennas comply with §25.218(f). The manufacturers' declarations on this are in Exhibit 4A.

(c)(2) Form 312 is being submitted and Schedule B completed as appropriate for the above listed C-band antennas. As explained in further detail in the Frequency Coordination Exhibit, appropriate frequency coordination has been satisfactorily completed and as established in the certifications exhibit, all three of the antennas comply with §25.218(d).

(c)(3) Not applicable.

(d)(e) & (f) Not applicable.

(g) Exhibits 5A and 5B contain the plots and tables specified in (g)(1).

(h)(i) & (j) Not applicable.

(k)(1) The antennas which are the subject of this Modification Application qualify for routine processing per paragraphs (l)(1) and (m)(1) of this section and the Permitted Space Station List is being designated as a point of communication.

(k)(2) Not applicable.

(l)(1) The satisfactory completion of necessary frequency coordination is established in the Frequency Coordination Exhibit and manufacturers' certifications that the antennas comply with §25.218(d) are in Exhibit 4A. As described above, the relevant information specified by paragraph (g) of this section is included in the 5B Exhibits. The certification required by §25.218(d)(4) for ESIMs operating in a network using variable power density control of earth stations transmitting simultaneously in shared frequencies to the same target satellite receiving beam is contained in Exhibit 4B.

(l)(2) Not applicable.

(l)(3)(i) The Marlink system is designed so that relevant off-axis EIRP density limits will only be exceeded if there is a pointing error in which the angle between the orbital location of the target satellite and the axis of the main lobe of the ESV antenna exceeds 0.5°. The manufacturers' certifications, which are in Exhibit 4A, certify that the antennas will maintain a pointing error of less than or equal to 0.2 degrees under specified ship motion conditions and will automatically cease the transmission with a mute command to the modem within 100 milliseconds if the target satellite and the axis of the main lobe of the ESV antenna exceeds 0.5 degree and will not resume until such angle is less than or equal to 0.2 degree. The certification required for variable-power ESIM applicants that one or more transmitters

Exhibit 1 = Narrative and Compliance With Application Requirements

are capable of automatically ceasing or reducing emissions within 100 milliseconds of receiving a command to do so from the system's network control and monitoring center, if the aggregate off axis EIRP densities of the transmitter or transmitters exceed the relevant off-axis EIRP density limits is contained in Exhibit 4B.

(l)(3)(ii) See Area of Operations Exhibit.

(l)(3)(iii) The U.S. based ESV Compliance Officer has authority and ability to cease all emissions from ESVs through teleports located in the U.S. used to uplink the ESVs. The ESV Compliance Officer is authorized to direct the Marlink Network Operations Center (MNOC) located in Eik, Norway to send commands via the uplink teleports to cause the remote ESVs to cease transmitting. The business address for the ESV Compliance Officer is 11707 S Sam Houston Parkway West, Suite A, Houston, Texas, 77031 and this point of contact is available 24 hours a day, seven days a week via 346-223-0396 which is the U.S. number for the MNOC.

(l)(3)(iv) See Radiation Hazard Exhibit.

(m)(1) The satisfactory completion of necessary frequency coordination is established in the Frequency Coordination Exhibit. As described above, the relevant information specified by paragraph (g) of this section is included in the 5A Exhibits and manufacturers' declarations that the antennas comply with §25.218(f) are in Exhibit 4A. The certification required by §25.218(f)(4) for ESIMs operating in a network using variable power density control of earth stations transmitting simultaneously in shared frequencies to the same target satellite receiving beam is contained in Exhibit 4B.

(m)(2) Not applicable.

(m)(3)(i) The Marlink system is designed so that relevant off-axis EIRP density limits will only be exceeded if there is a pointing error in which the angle between the orbital location of the target satellite and the axis of the main lobe of the ESV antenna exceeds 0.5° . The manufacturers' declarations, which are in Exhibit 4A, declare that the antennas will maintain a pointing error of less than or equal to 0.2° under specified ship motion conditions and will automatically cease transmission with a mute command to the modem within 100 milliseconds if the (angle between the orbital location of the) target satellite and the axis of the main lobe of the ESV antenna exceeds 0.5° and will not resume until such angle is less than or equal to 0.2° . The certification required for variable-power ESIM applicants that one or more transmitters are capable of automatically ceasing or reducing emissions within 100 milliseconds of receiving a command to do so from the system's network control and monitoring center, if the aggregate off axis EIRP densities of the transmitter or transmitters exceed the relevant off-axis EIRP density limits is in Exhibit 4B.

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(m)(3)(iv) See Radiation Hazard Exhibit.

(n) Not applicable.

(o) Not applicable.

(p) See Radiation Hazard Exhibit.