Before the FEDERAL COMMUNICATIONS COMMISSION Washington, D.C. 20554

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In the Matter of Application by	
SES AMERICOM, INC.	
For Modification of AMC-5 Fixed-Satellite Space Station License	

File No. SAT-MOD-_____ Call Sign S2156

APPLICATION OF SES AMERICOM, INC.

SES Americom, Inc. ("SES Americom," doing business as "SES WORLD SKIES"¹), hereby respectfully requests a modification of its license for the AMC-5 fixed-satellite space station to assign the satellite permanently to 79.05° W.L., where it will serve as an in-orbit spare. SES WORLD SKIES also requests drift authority to move the satellite to its new assigned location from its current location of 78.95° W.L. Grant of the requested authority will simplify stationkeeping at the nominal 79° W.L. orbital location and permit SES WORLD SKIES to make efficient use of its space stations to provide service to customers.

A completed FCC Form 312 is attached, and SES WORLD SKIES incorporates

by reference the technical information previously provided in support of AMC-5.² In addition, SES WORLD SKIES is providing information relating to the proposed modification to the AMC-5 license in the attached technical appendix.

¹ On September 7, 2009, SES S.A. announced that the newly integrated operations of its two indirect subsidiaries, New Skies Satellites B.V. and SES Americom would be conducted under a single brand name, SES WORLD SKIES. The new brand name does not affect the underlying legal entities that hold Commission authorizations or U.S. market access rights.

² See File Nos. SAT-MOD-20050609-00117; SAT-MOD-19980113-00002.

SES WORLD SKIES currently operates two satellites at the nominal 79° W.L. orbital location: AMC-5, a conventional Ku-band space station, is assigned to 78.95° W.L., and Satcom C-3, a conventional C-band space station, is assigned to 79.05° W.L.³ SES WORLD SKIES recently filed an application seeking authority to relocate its hybrid AMC-2 spacecraft to 78.95° W.L. to replace both AMC-5 and Satcom C-3 at the nominal 79° W.L. orbital location.⁴ SES WORLD SKIES intends to deorbit Satcom C-3 later this year, and in the interim is separately requesting authority to relocate the spacecraft to 79.15° W.L. Once traffic has been transferred from AMC-5 to AMC-2 and Satcom C-3 has been repositioned, SES WORLD SKIES proposes to relocate AMC-5 to 79.05° W.L., the position that will be vacated by Satcom C-3, and operate it there in inclined orbit. AMC-5 will thereafter serve as an in-orbit spare for the Ku-band capacity of AMC-2.

Accordingly, SES WORLD SKIES requests authority to relocate AMC-5 from 78.95° W.L. to 79.05° W.L. and to operate the Ku-band communications payload of AMC-5 at the 79.05° W.L. location. Grant of such authority will enable operation of AMC-5, as needed, to restore or supplement Ku-band capacity on AMC-2 at the nominal 79° W.L. orbital location. Furthermore, relocating AMC-5 from 78.95° W.L. to 79.05° W.L. will eliminate any overlap of the stationkeeping volumes of AMC-2 and AMC-5, facilitating safe operation of the satellites. For these reasons, grant of the instant request will serve the public interest.

As demonstrated in the technical appendix, relocation of AMC-5 will not adversely affect any other operators. The small proposed shift in AMC-5's orbital location will have a *de minimis* effect on the interference environment in which adjacent satellites operate.

³ The "conventional Ku-band" refers to the 11.7-12.2 GHz and 14.0-14.5 GHz frequencies. The "conventional C-band" refers to the 3700-4200 MHz and 5925-6425 MHz frequencies.

⁴ See File No. SAT-MOD-20100324-00056 (Call Sign S2134).

²

AMC-5 will be operated consistent with existing and future coordination agreements applicable to SES WORLD SKIES' operations at the nominal 79° W.L. orbital location, including the coordination agreement addressing the Argentine Administration's ITU filings at 81° W.L. SES WORLD SKIES notes that the Venesat-1 satellite operates at 78° W.L. under a Uruguayan ITU network filing that is lower in priority than the U.S. ITU filing at the nominal 79° W.L. location. Coordination discussions with the Venesat-1 operator are in progress to ensure that operations at 78° W.L. will not negatively impact the co-frequency SES WORLD SKIES operations at the nominal 79° W.L. orbital location.

For the foregoing reasons, SES Americom seeks a modification of the AMC-5 license to assign the spacecraft to the 79.05° W.L. orbital location. SES Americom respectfully requests action on this application by early July to enable timely completion of all contemplated maneuvers.

Respectfully submitted,

SES AMERICOM, INC.

By: /s/ Daniel C.H. Mah

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Dated: May 25, 2010

Daniel C. H. Mah Regulatory Counsel SES Americom, Inc. Four Research Way Princeton, NJ 08540

Technical Appendix

1. Introduction

This technical appendix is submitted in support of the application of SES Americom, Inc. ("SES Americom," doing business as "SES WORLD SKIES") for a modification of its license for the AMC-5 Ku-band spacecraft. SES WORLD SKIES seeks permanent assignment of the spacecraft to 79.05° W.L. instead of 78.95° W.L. SES WORLD SKIES incorporates by reference herein the technical information it has already provided with respect to AMC-5,¹ and provides here technical information that is changing as a result of the proposed modification.

2. Gain Contours

SES WORLD SKIES is not submitting new contour maps with this application. The proposed shift in orbital location from 78.95° W.L. to 79.05° W.L. will produce no visible change in the gain contours from the maps already on file.

3. Link Budgets and Interference Analysis

An interference analysis was submitted to the FCC in connection with the initial operation of AMC-5 at 79° W.L. demonstrating that operation of AMC-5 was compatible with adjacent satellites and with the Commission's two-degree spacing requirements.² The proposed relocation of AMC-5 will not cause any material change to the interference environment. Specifically, SES WORLD SKIES has calculated that operation of AMC-5 at 79.05° W.L. rather than at the nominal 79° W.L. position translates into a change of approximately 0.3 dB in the interference environment of two-degree compliant earth stations communicating with a spacecraft at 77° W.L. or at 81° W.L., as shown in the table below.

	<u>77</u>	<u>81</u>
<u>Nominal Orbital Position (79)</u> Offset Angle	2.00	2.00
Gain (1) @ Offset angle	21.5	21.5
Proposed Orbital Position (79.05) Offset Angle	2.05	1.95
Gain (2) @ Offset angle	21.2	21.8
<u>Δ (Gain(1) - Gain (2))</u>	<u>0.3</u>	<u>-0.3</u>

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See File Nos. SAT-MOD-20050609-00117; SAT-MOD-19980113-00002.

² File No. SAT-MOD-19980113-00002, Attachment C, Interference Analysis for GE-5 Ku-Band Transponders.

Given that the proposed offset operation of AMC-5 will not result in any material change to the existing interference environment with respect to AMC-5 and current or future adjacent satellites, no link budget analysis is provided herein. SES WORLD SKIES will operate AMC-5 in conformance with existing and future coordination agreements applicable to operations at the nominal 79° W.L. orbital location, including its coordination agreement with the Argentine Administration relating to operations at 81° W.L. In the unlikely event that any future concerns arise relating to operations of AMC-5 at the proposed offset location, SES WORLD SKIES will coordinate with the adjacent operators in order to arrive at a mutually satisfactory solution.³

4. Schedule S

As discussed above, the proposed modification of the AMC-5 license will not result in any material changes to the spacecraft's operating characteristics or to the interference environment. As a result, the information requested in Schedule S duplicates information that is already on file with the Commission concerning the technical parameters of AMC-5's operation. In similar cases involving requests for slight offsets from the nominal orbital position, the Satellite Division has not required the submission of a new Schedule S.⁴ Accordingly, SES WORLD SKIES is not filing a new Schedule S with this application. SES Americom will nevertheless prepare and submit a Schedule S if requested to do so by the Satellite Division.

³ As noted in the narrative, the Venesat-1 satellite operates at 78° W.L. under a Uruguayan ITU network filing that is lower in priority than the U.S. ITU filing at the nominal 79° W.L. location. Coordination discussions with the Venesat-1 operator are in progress to ensure that operations at 78° W.L. will not negatively impact the co-frequency SES WORLD SKIES operations at the nominal 79° W.L. orbital location.

⁴ See, e.g., File No. SAT-MOD-20040405-00076 (PanAmSat request for authority to operate SBS-6 at 74.05° W.L. rather than 74.0° W.L.).

DECLARATION OF KRISH JONNALAGADDA

I, Krish Jonnalagadda, hereby certify under penalty of perjury that I am the technically qualified person responsible for preparation of the technical information contained in the foregoing exhibit; that I am familiar with the technical requirements of Part 25; and that I either prepared or reviewed the technical information contained in the exhibit and that it is complete and accurate to the best of my knowledge, information and belief.

<u>/s/ Krish Jonnalagadda</u> SES Americom, Inc.

Dated: May 25, 2010