



**Sprint Nextel**  
2001 Edmund Halley Drive  
Reston, VA 20191  
Office: (703) 433-8525 Fax: (703) 433-4142  
Mobile: (703) 926-5933

October 11, 2007

Written *Ex Parte* Communication

Marlene H. Dortch  
Secretary  
Federal Communications Commission  
445 12<sup>th</sup> Street, S.W. Room TW-A325  
Washington, DC 20554

Re: *Request by Globalstar, Inc. To Expand Its Ancillary Terrestrial Component (ATC) Authority To Encompass Its Full Assigned Spectrum*, RM No. 11339

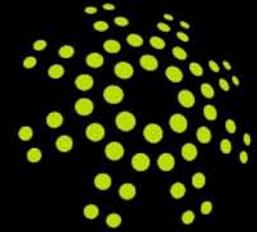
Dear Ms. Dortch:

On behalf of Sprint Nextel Corporation (Sprint Nextel), Harry Perlow and I met yesterday with Helen Domenici, James Ball, Robert Nelson, Howard Griboff, and Francis Gutierrez of the International Bureau to elaborate on Sprint Nextel's plan to provide next-generation wireless broadband services to 100 million Americans by year end 2008. We also discussed Globalstar's petition to expand its ATC authority into spectrum already assigned to licensees of the Broadband Radio Service (BRS). As indicated in the attached presentation, we explained that two terrestrial mobile services cannot share the same spectrum as Globalstar claims and, on the contrary, require at least three megahertz of separation in the 2.5 GHz range to avoid harmful adjacent-channel interference. Finally, we discussed the need to protect United States wireless broadband deployments from harmful interference due to incompatible operations that may be authorized by Canada or Mexico. If any questions arise concerning this filing, please contact me.

Sincerely,

Trey Hanbury, Esq.  
Director, Sprint Nextel Corporation

CC: Helen Domenici, James Ball, Robert Nelson, Howard Griboff, and Francis Gutierrez



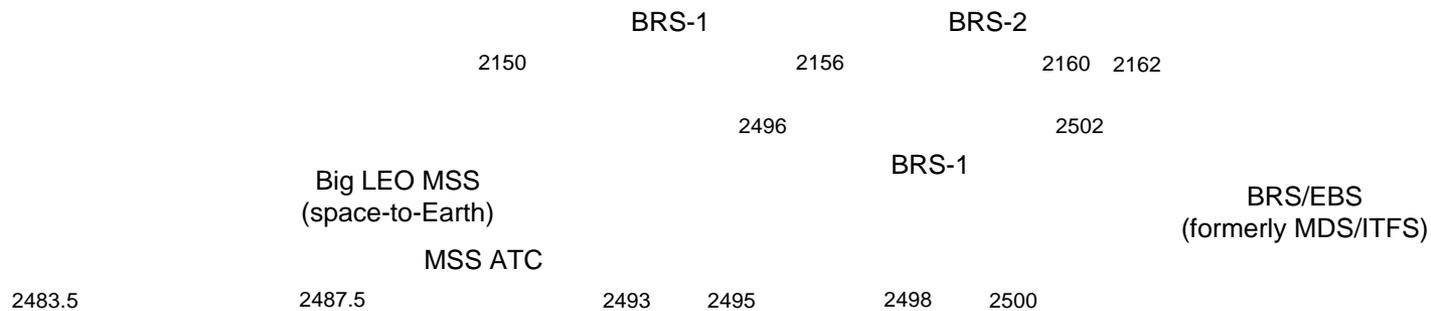
XOHM

WiMAX from Sprint

# MSS ATC Interference into the Broadband Radio Service

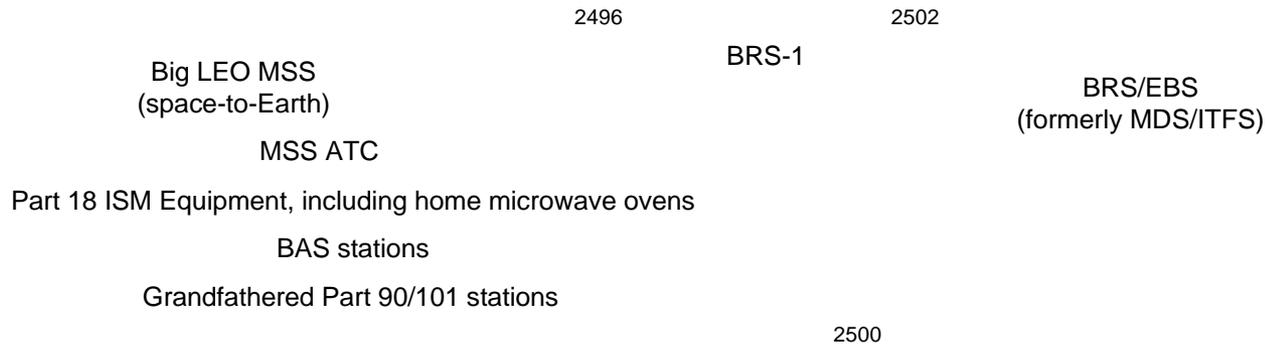
Sprint Nextel Corporation

# BRS-1 Assigned to 2496-2502 MHz



# Triple Co-Primary Sharing Required, Challenged

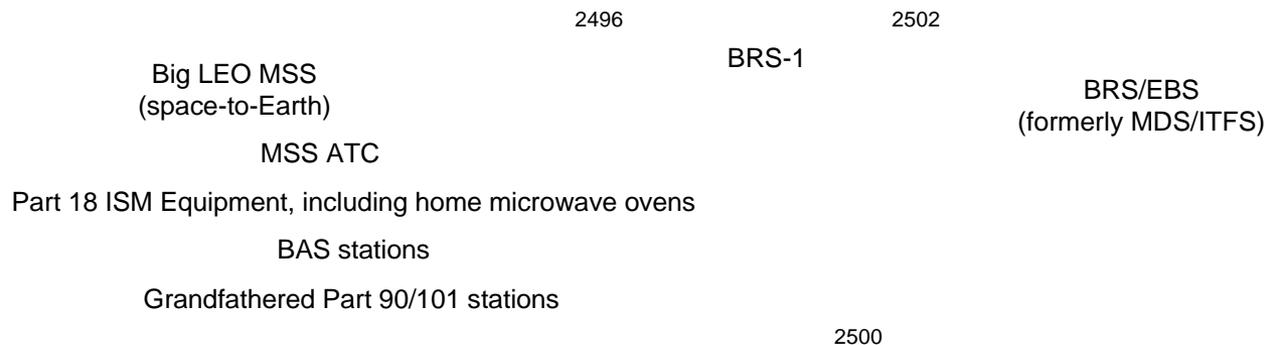
## 3 MHz Guard Band between MSS ATC and BRS-1



MSS operations must accept interference from BRS-1 in the 2495-2500 MHz band because “most MSS operations will likely occur below 2495 MHz where they are entitled to protection”

# Expanded MSS ATC Creates More Interference

Expanded MSS ATC would place two terrestrial mobile systems in the same place at the same time and eliminate the 3 MHz guard band that protects against harmful interference

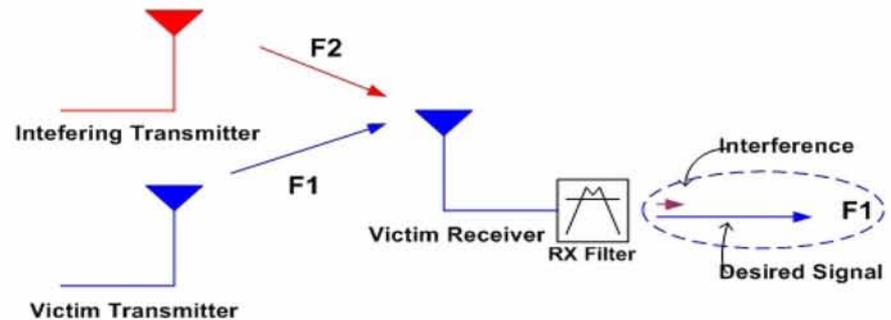
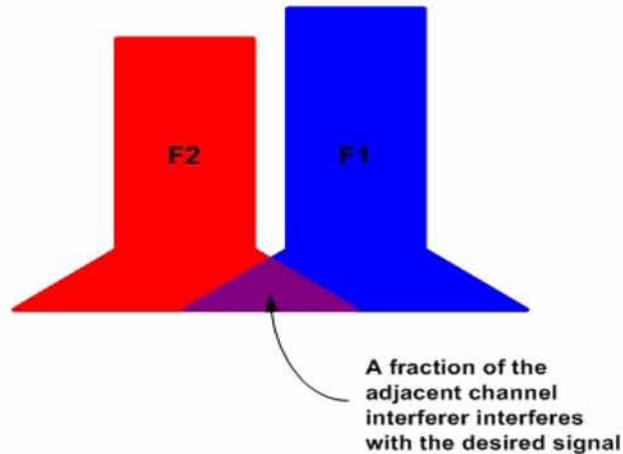


# MSS ATC Should Remain 3 MHz from BRS-1

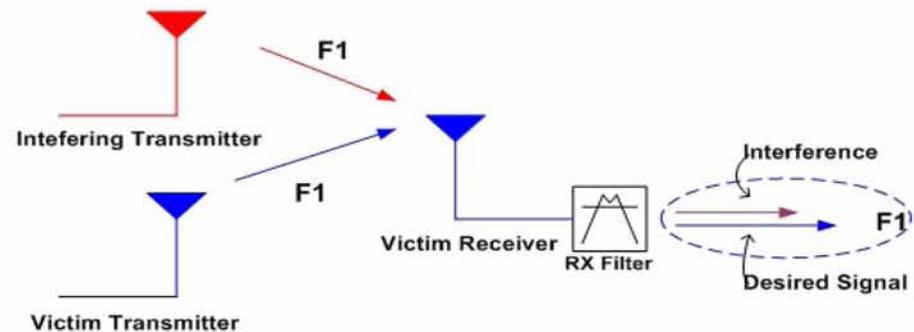
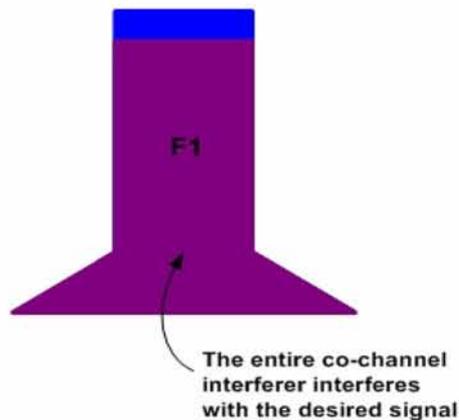
- **The FCC has repeatedly recognized that two terrestrial systems cannot coexist in the same place at the same time**
- **The FCC has recognized that BRS and MSS ATC cannot use the same or adjacent frequencies**
- **The existing three megahertz guard band plays a vital role in avoiding adjacent-channel interference**
  - Time-division duplex (TDD) BRS/EBS operations must be capable of listening and transmitting on the same frequency at different times; therefore, the presence of CDMA signals closer than three megahertz would cause severe harmful interference to Sprint Nextel Xohm deployment
  - Channels within the BRS/EBS band use three megahertz of guard band when multiple unsynchronized technologies are deployed in adjacent bands

# MSS ATC Should Remain 3 MHz from BRS-1

## Adjacent Channel Interference



## Co-Channel Interference



# Mexico, Canada MSS ATC Threatens Interference

- **At the request of MSS satellite operators, Mexico has sought ATC authority through 2500 MHz and Canada may adopt a similar proposal**
- **Protecting wireless broadband deployment in the 2.5 GHz band against harmful interference requires no less stringent protections at the Canadian and Mexican borders for geographically adjacent co-channel Canadian and Mexican operations than would apply to United States MSS ATC operators**
- **The existing cross-border agreements with Canada and Mexico were primarily designed for high power video distribution and do not contemplate or fully protect mobile wireless broadband operations.**

