



PUBLIC REFERENCE COPY
FCC MAIL SECTION

GE Astro Space
RECEIVED

November 12, 1990

Nov 15 4 58 PM '90

Astro Space Division
General Electric Company
P.O. Box 300, Princeton, NJ 08543-0300
609-490-3400

NOV 19 1990

Domestic Facilities Division
Satellite Radio Branch

Ms. Donna R. Searcy
Secretary
Federal Communications Commission
1919 M Street, N.W.
Room 222
Washington, D.C. 20554

RECEIVED BY

Re: Application File Nos. 54-DDS-P/L-90 and 55-DSS-P-90, Norris Satellite Communications, Inc. for Authority to Construct, Launch and Operate Satellites in the Domestic Fixed-Satellite Service

Dear Ms. Searcy:

GE Astro Space hereby submits an original and four copies of this letter as comments with regard to the above-referenced application.

Norris Satellite Communications, Inc. seeks Commission authorization to construct two and launch and operate one communications satellite operating in the 30/20 GHz frequency band. This frequency band has not yet been utilized for communications satellite service in the United States.

GE Astro Space, while taking no position on the merits of the instant application, would like the Commission to take note that the National Aeronautics and Space Administration (NASA) has contracted with GE Astro Space for the construction of an Advanced Communications Technology Satellite (ACTS) operating in the 30/20 GHz band. This satellite, scheduled for launch in 1992, will operate as an orbiting testbed of future communications technologies.

The ACTS will utilize such technologies as multiple, hopping spot beams; high-speed, digital on-board baseband processing and switching; and adaptive rain-fade compensation techniques. ACTS will open up a new portion of the RF spectrum for U.S. communications satellite use and will be available for experimental use for up to four years.

The ACTS facility satellite will be an extension of GE Astro's family of well-proven SATCOM busses. The antenna, switching, and other technologies incorporated in ACTS have been selected to support the product and technology development activities of a broad consortium of potential private industry, government agencies and university users. These technologies are expected to be incorporated into the future series of commercial communications satellites operated by domestic common carriers.

GE Astro Space would be pleased to provide additional technical information concerning ACTS if that would be helpful to the Commission in its consideration of the instant application.

Sincerely yours,

E. M. Morse, Manager
Commercial Communications Programs