



Creating a “Third Way” for Tweeners Entry Would Not Serve the Public Interest

IB Docket No. 06-160

June 21, 2007



Forced Tweener Entry Will *Not* Serve the Public Interest



- Forced tweener entry ***will***:
 - Significantly increase outages for existing US DBS subscribers
 - Effectively preclude existing mobile DBS services to cars, boats, and airlines
 - Reallocate capacity from US systems (that created it) to foreign systems (that expropriate it)
 - Set up foreign administrations as gatekeepers
 - Diminish the ability of DBS operators to compete with terrestrial MVPD alternatives
- Forced tweener entry ***will not***:
 - Be used to support new entrants
 - Improve spectral efficiency
 - Support new and innovative services
 - Provide the only option for DTH expansion
 - Protect the interests of over 30 million existing DBS subscribers nationwide

SES's Own Statements Demonstrate That Tweeners Will Not Be Used For New Entry



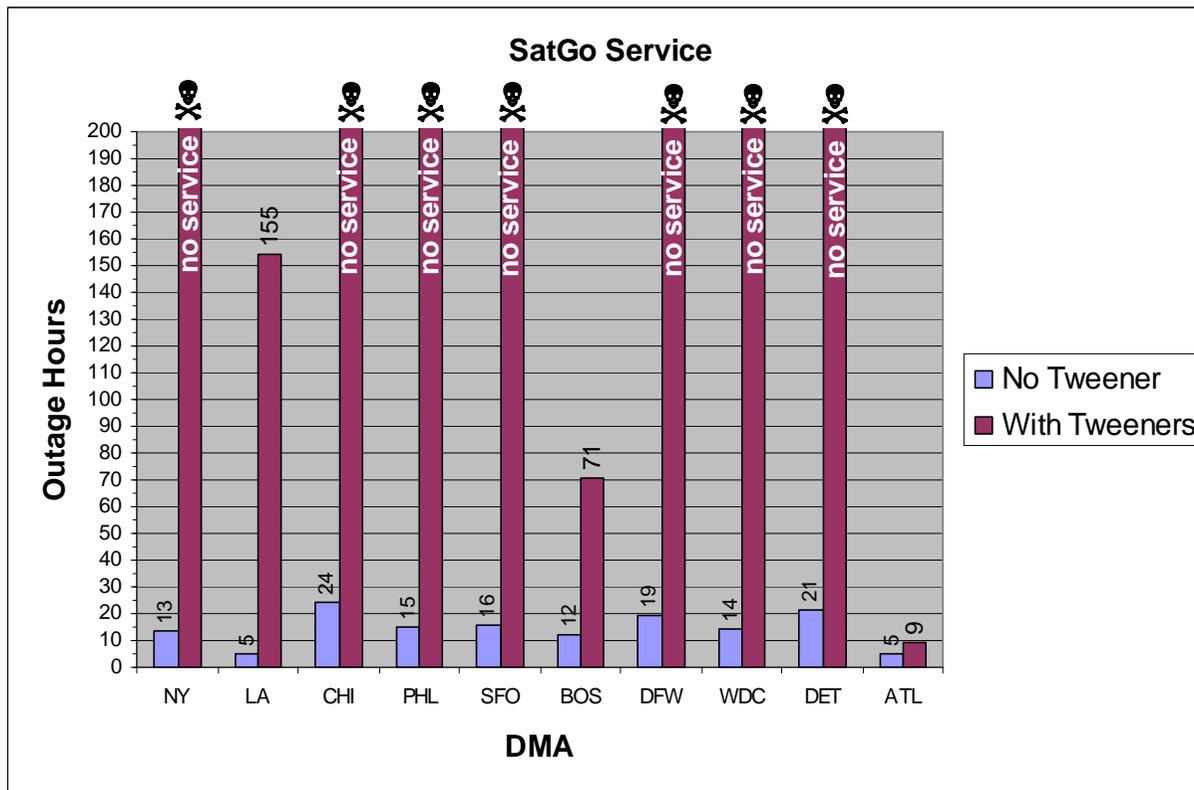
- SES has already leased “the entire communications capacity (including all spare capacity)” on its proposed tweener at the 105.5° W.L. orbital location to EchoStar – foreclosing use by new entrant
- SES asserts that, in order to protect current US DBS operations, its tweener can “achieve robust service at lower power” through the use of “larger subscriber dishes”
- In the 17/24 GHz BSS proceeding, SES said that using larger dishes would doom new entry:
 - “Forcing a new entrant . . . to deploy larger dishes would preclude the entity from effectively competing for the significant portion of the customer base for whom dish size is an important issue. A new service provider is ***unlikely to be able to survive*** in the market with such a significant competitive disadvantage vis-à-vis the existing DBS operators.” [SES Comments at 6 (emphasis added)]

Tweeners Would Preclude Mobile DBS Services, Not Enhance Them



- SES claims that tweeners will operate at lower power using bigger subscriber receive antennas
 - How is that consistent with the form factors necessary to provide mass market mobile services – as even SES recognizes?
- While current environment is challenging for mobile DBS services, cutting orbital spacing in half will essentially preclude **both** US DBS and twener operators from offering them
 - If DIRECTV is “shoehorning” a mobile offering into the existing DBS environment with nine-degree spacing, what would SES do with less?
- There is no reason to sacrifice existing services offered by US companies to accommodate notional foreign satellite systems
 - JetBlue service to airlines, KVH service to cars/boats/RVs
 - Twener position reflects totally self-serving view of ITU spectrum coordination process – one in which US DBS operators with ITU priority must accommodate tweeners, but tweeners are free to degrade existing mobile services enjoyed by millions of Americans that have lower priority

Tweeners Would Also Stymie Portable DBS Services



- ◆ SatGo can operate quite well today, but introduction of tweeners would render this service unmarketable

The Commission Cannot Ignore Antenna Mispointing

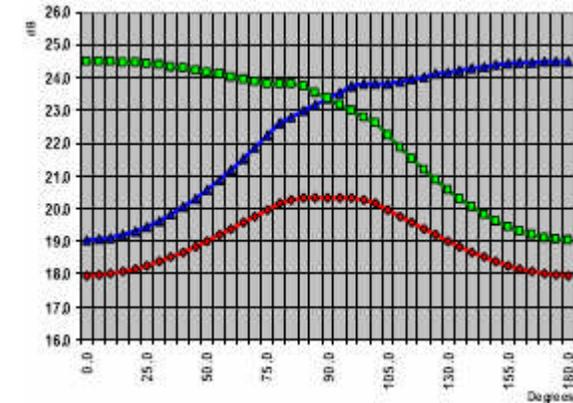


- Both DIRECTV and EchoStar data confirm substantial mispointing of installed antenna base
- Further complicated by inherent mispointing of multi-feed antennas used to receive from multiple DBS slots
- Mispointing is **not** a red herring
 - Commission routinely takes this factor into account in assessing interference scenarios
 - E.g., MVDDS analysis assumed 0.75° mispointing
- Commission is able to “not favorably consider” mispointing for operations in the “greenfield” 17/24 GHz BSS band
 - No existing customer base of millions of self-installed antennas
 - Four-degree spacing and interference environment established from the outset

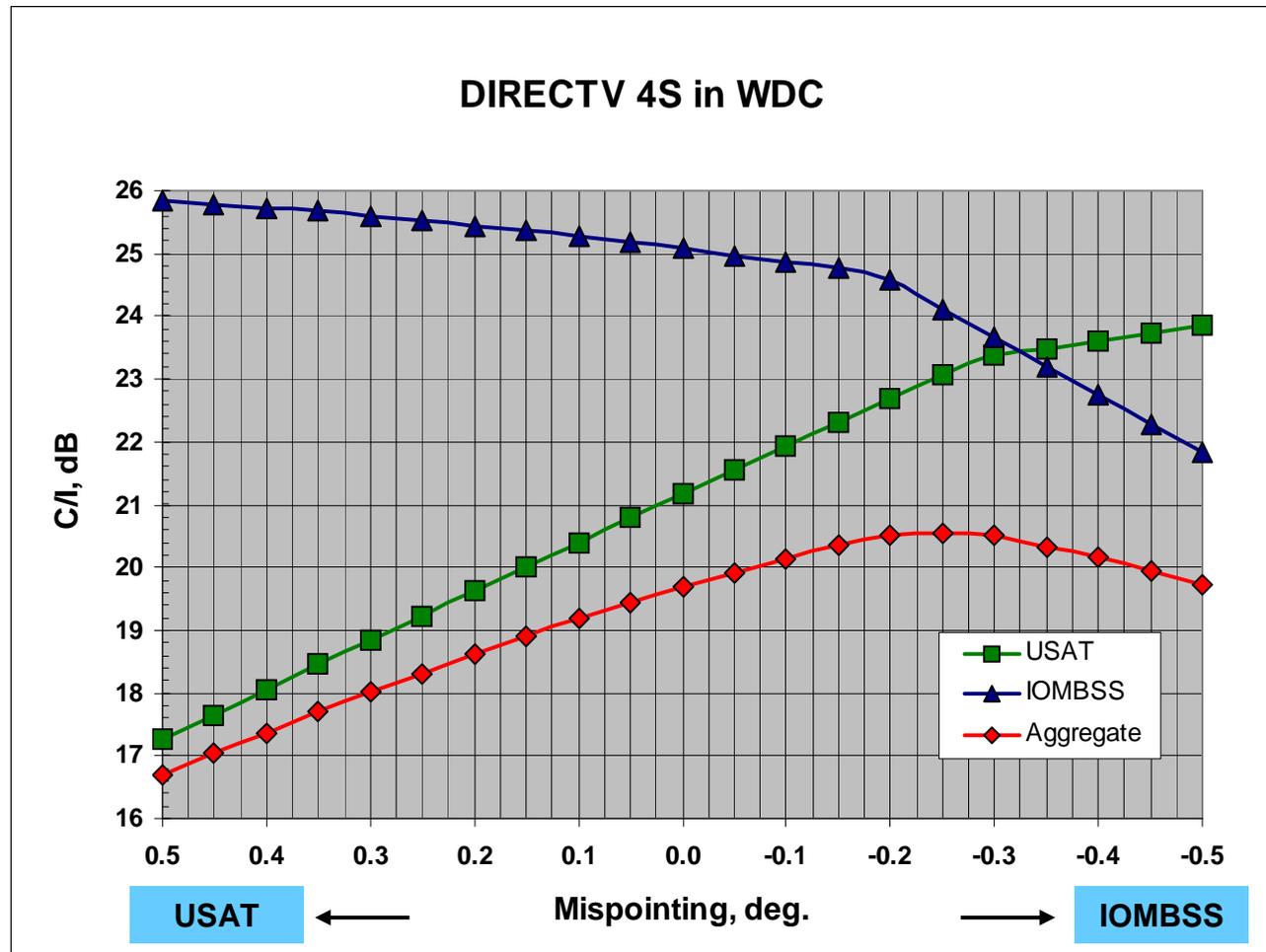
SES's Mispointing Analysis Does Not Reflect Reality



- SES presents an analysis of a non-existent case, with the victim satellite at the exact center of a BSS cluster and tweeners on both sides operating with 2 dB less power than the victim
- Real-life situation is very different
 - No tweener has yet applied for, or agreed to operate at, 2 dB less power than the existing DBS satellites
 - Existing satellites operate at the edges of the BSS box and are therefore up to 0.2° closer to one of the tweeners
 - Station-keeping brings satellites up to 0.1° closer still ($\pm 0.05^\circ$ each)
 - The “phantom” low-power tweeners SES postulates do not provide a sufficient basis for Commission action that will affect real US DBS systems serving tens of millions of subscribers nationwide
- Adjusting solely for these factors, even 0.5° mispointing reduces C/I by **half** (as illustrated for DIRECTV 4S in WDC)
 - Similar results when using actual tweener parameters as filed

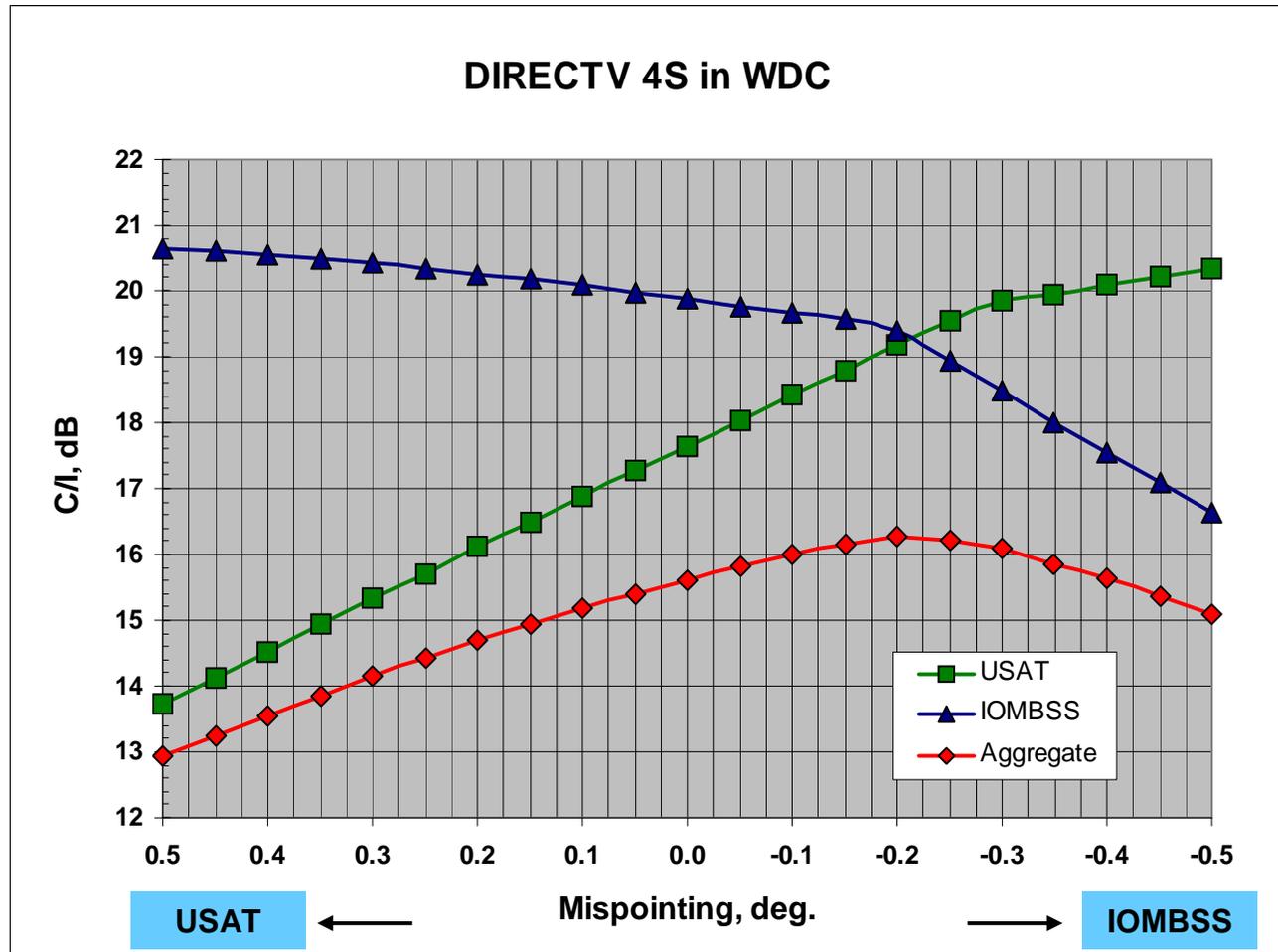


Effect of Mispointing: Maintaining SES Assumption That Tweeners Operate at 2 dB Lower Power Than Victim



- ◆ “Net impact” of 0.5° mispointing is 3.0 dB (aggregate) reduction in C/I compared to perfect pointing

Effect of Mispointing: Using Actual Tweener Parameters As Filed



- ◆ “Net impact” of 0.5° mispointing is 2.7 dB (aggregate) reduction in C/I compared to perfect pointing

There Is No Need for a “Third Way” for Tweeners



- Existing Commission rules contemplate twener entry where a proposed system (1) would not affect US DBS systems under ITU standards, or (2) has completed coordination with US DBS systems
- Tweeners urge Commission to adopt a “third way” for entry when they are not willing to operate below ITU triggers or complete coordination with US DBS operators
 - Propose extremely truncated negotiation period followed by Commission intervention to dictate baseline terms for twener entry
 - Unprecedented procedure, contrary to international norms
 - Parameters proposed by tweeners to “protect” US DBS systems are patently inadequate, and would preclude introduction of more innovative and efficient technology in the future
 - Curiously, SES has not even contacted DIRECTV for coordination discussions since May 2004 – and Spectrum Five has *never* contacted DIRECTV for coordination
- Better to continue to rely on established international processes to accommodate new entry while protecting tens of millions of subscribers to existing US DBS services
 - This had been SES’s position for years – until this proceeding