

| General: | Units | Clear Sky | Faded |
|---------------------------------|--------------|------------------|--------------|
| Emission Designator | | 500MG7D | 500MG7D |
| Data Rate | Mbit/s | 205.9 | 205.9 |
| Modulation | | QPSK | QPSK |
| Coding Rate | | 0.2470 | 0.2470 |
| Carrier Bandwidth | MHz | 500 | 500 |
| Uplink Frequency | GHz | 29.75 | 29.75 |
| Downlink Frequency | GHz | 19.95 | 19.95 |
| Uplink: | | | |
| Tx E/S Antenna Diameter | m | 7.3 | 7.3 |
| Tx E/S Power to Antenna | W | 10.2 | 91.2 |
| Tx E/S Antenna Gain | dBi | 64.9 | 64.9 |
| Tx E/S EIRP per Carrier | dBW | 75.0 | 84.5 |
| Tx E/S Antenna Pointing Loss | dB | 1.2 | 1.2 |
| Atmospheric and Rain Losses | dB | 0.5 | 14.5 |
| Free Space Loss | dB | 213.6 | 213.6 |
| G/T | dB/K | 20.2 | 20.2 |
| C/I - Intra-system | dB | 25.5 | 25.5 |
| Downlink: | | | |
| EIRP per Carrier towards Rx E/S | dBW | 63.3 | 63.3 |
| Atmospheric and Rain Losses | dB | 0.4 | 12.0 |
| Free Space Loss | dB | 210 | 210 |
| Rx E/S Antenna Pointing Loss | dB | 0.5 | 0.5 |
| Rx E/S Antenna Diameter | m | 0.67 | 0.67 |
| Rx E/S Antenna Gain | dBi | 41.1 | 41.1 |
| Rx E/S G/T | dB/K | 17.6 | 14.3 |
| System Noise Temp (LNA+Sky) | K | 224 | 484 |
| C/I - Intra-system | dB | 18.7 | 18.7 |
| End-to-End: | | | |
| C/N - Thermal Uplink | dB | 22.3 | 17.8 |
| C/I Up - ASI | dB | 18.9 | 14.4 |
| C/N - Thermal Downlink | dB | 12.4 | -2.5 |
| C/I Down - ASI | dB | 12.6 | 12.6 |
| C/(N+I) - Total Actual | dB | 8.3 | -2.8 |
| C/N - Required | dB | -2.8 | -2.8 |
| Excess Margin | dB | 11.1 | 0.0 |