

| General: | Units | Clear Sky | Faded |
|---------------------------------|--------------|------------------|--------------|
| Emmission Designator | | 3M13G7D | 3M13G7D |
| Data Rate | kbit/s | 3750.0 | 3750.0 |
| Modulation | | QPSK | QPSK |
| Coding Rate | | 0.7500 | 0.7500 |
| Carrier Bandwidth | kHz | 3125 | 3125 |
| Uplink Frequency | GHz | 29.75 | 29.75 |
| Downlink Frequency | GHz | 19.95 | 19.95 |
| Uplink Elevation Angle | degrees | 35 | 35 |
| Downlink Elevation Angle | degrees | 35 | 35 |
| Uplink: | | | |
| Tx E/S Antenna Diameter | m | 0.67 | 0.67 |
| Tx E/S Power to Antenna | W | 2.8 | 2.8 |
| Tx E/S Antenna Gain | dBi | 44.4 | 44.4 |
| Tx E/S EIRP per Carrier | dBW | 48.9 | 48.9 |
| Tx E/S Antenna Pointing Loss | dB | 0.5 | 0.5 |
| Atmospheric and Rain Losses | dB | 0.5 | 8.9 |
| Free Space Loss | dB | 213.6 | 213.6 |
| G/T toward Tx E/S | dB/K | 19.5 | 19.5 |
| C/I - Intra-system | dB | 14.3 | 14.3 |
| Downlink: | | | |
| EIRP per Carrier towards Rx E/S | dBW | 36.2 | 27.8 |
| Atmospheric and Rain Losses | dB | 0.5 | 7.1 |
| Free Space Loss | dB | 210.1 | 210.1 |
| Rx E/S Antenna Pointing Loss | dB | 0.55 | 0.55 |
| Rx E/S Antenna Diameter | m | 7.3 | 7.3 |
| Rx E/S Antenna Gain | dBi | 61.5 | 61.5 |
| Rx E/S G/T | dB/K | 38.0 | 34.8 |
| System Noise Temp (LNA+Sky) | K | 250 | 471 |
| C/I - Intra-system | dB | 13.3 | 13.3 |
| End-to-End: | | | |
| C/N - Thermal Uplink | dB | 18.4 | 10.0 |
| C/I Up - ASI | dB | 15.5 | 15.5 |
| C/N - Thermal Downlink | dB | 27.6 | 9.4 |
| C/I Down - ASI | dB | 27.8 | 27.8 |
| C/(N+I) - Total Actual | dB | 8.9 | 4.8 |
| C/N - Required | dB | 4.9 | 4.9 |
| Excess Margin | dB | 4.0 | 0.0 |