

<b>Link Parameters</b>	<b>Units</b>	<b>6M33G7W</b>
Uplink frequency	GHz	12.88
Downlink frequency	GHz	10.83
User data rate	kbit/s	8448
Modulation		QPSK
Total coding rate		0.801
Carrier bandwidth	kHz	6330
<b>Uplink:</b>		
Nominal E/S e.i.r.p. per carrier	dBW	67.1
Earth station diameter	m	3.7
Earth station gain	dBi	52.1
Uplink input power per carrier	dBW	15.0
Uplink input power density	dBW/Hz	-53.0
Atmospheric loss	dB	0.2
Free space path loss	dB	206.4
G/T satellite (-6 dB contour)	dB/K	2.3
C/N thermal uplink	dB	23.4
C/I XPOL, ACI, ASI	dB	23.6
C/(N+I) uplink	dB	20.5
<b>Downlink:</b>		
Satellite e.i.r.p. per carrier (-4 dB contour)	dBW	37.5
Atmospheric loss	dB	0.1
Free space path loss	dB	204.8
Earth station diameter	m	2.4
Earth station gain	dBi	46.9
Noise temperature	K	120.0
Earth station G/T	dB/K	26.1
C/N thermal downlink	dB	19.1
C/I XPOL, ACI, IM, ASI	dB	14.2
C/(N+I) downlink	dB	11.0
<b>Overall:</b>		
C/(N+I) overall	dB	10.6
C/(N+I) required	dB	5.8
Margin	dB	4.8