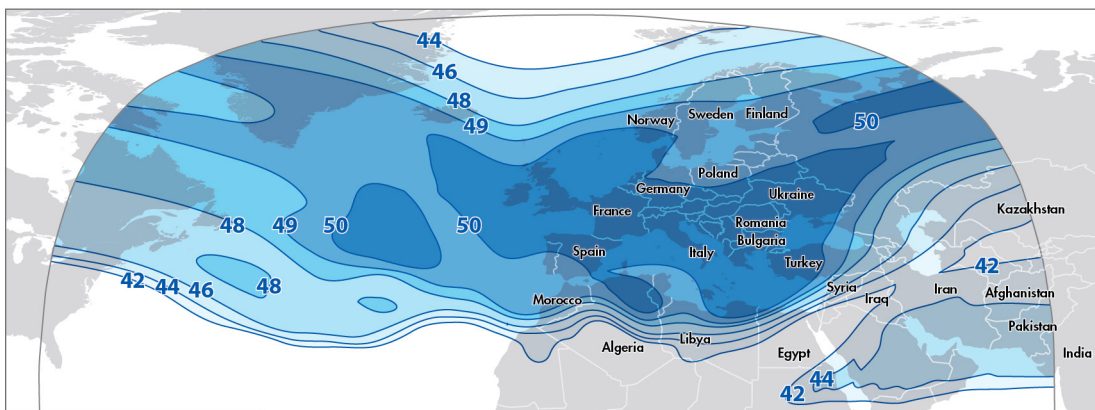




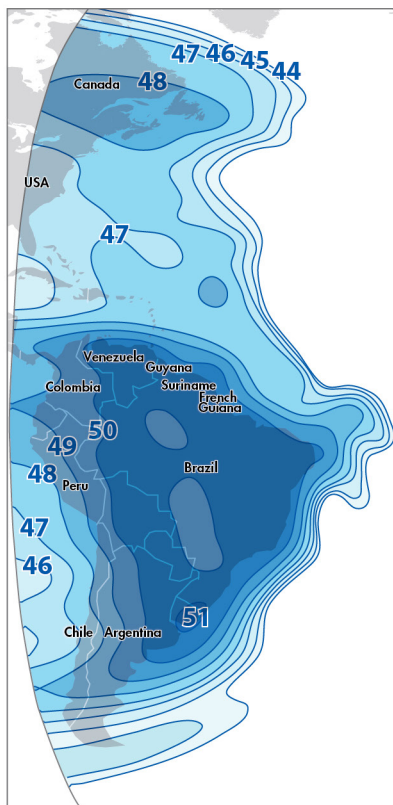
ABS-3A KEY HIGHLIGHTS

- ABS-3A is a Boeing 702SP space proven all-electric propulsion satellite launched in March 2015.
- Powerful C and Ku beams offer expanded communication capacity connecting the Americas, Europe, the Middle East and Africa.
- Flexible transatlantic connectivity enables transmissions from Eastern US to reach directly to Western and Central Europe.
- The satellite is a pillar for high profile broadcast contribution in MENA, Africa, Europe and the Americas.
- ABS-3A features a wide Ku-band European beam which extends from North America, across Europe to Moscow providing optimal coverage for maritime and diverse media requirements such as Occasional Use and full time DTT services.
- It also offers prime C and Ku-band payload capacity to support fast-growing video and broadband markets for the South America region.
- The satellite services high-growth data, video, mobility and government applications.

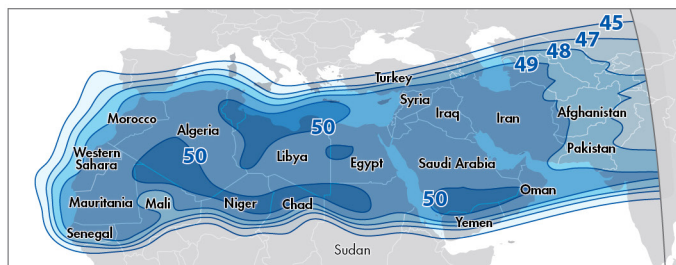
KU BAND BEAMS



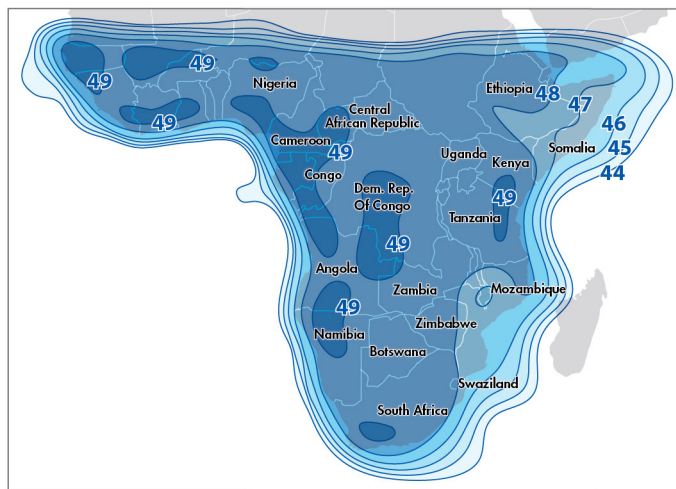
Europe | 42-50dBW



Americas | 44-51dBW



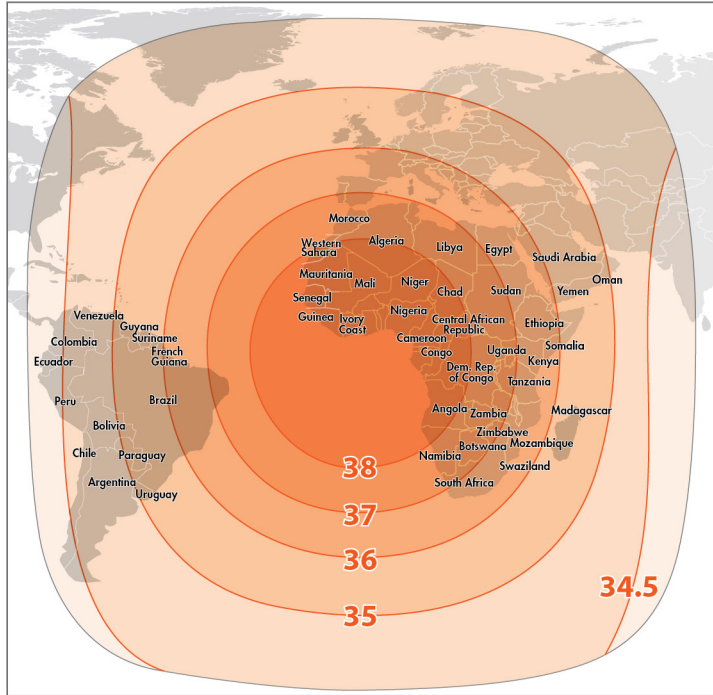
MENA | 45-50dBW



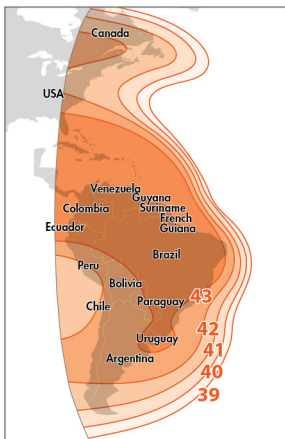
SAF | 44-49dBW

Ku-Band Transponders: 24 x 72 MHz Polarization: Linear (H&V)
 Uplink/Downlink Frequency: 13.750 – 14.750 / 10.700 – 11.200, 11.450 – 11.700, 12.500 – 12.750 GHz

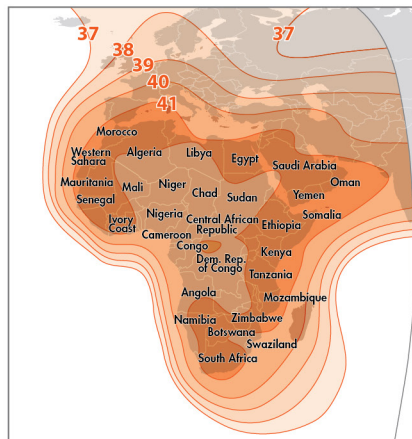
C BAND BEAMS



Global | 34.5-38dBW



West Hemi | 39-43dBW



East Hemi | 37-41dBW

C-Band Transponders: 24 x 72MHz Polarization: Linear (H&V)
Uplink/Downlink Frequency: 5.850 – 6.425/3.625 – 4.200 GHz

PARAMETER	C BAND	Ku BAND
Number of Transponders	24	24
Transponder Bandwidth (MHz)	72	72
Uplink/Downlink Frequencies (GHz)	5.850–6.425/3.625–4.200	13.750–14.750 / 10.700–11.200, 11.450–11.700, 12.500–12.750
Uplink/Downlink Signal Polarization	Linear (H&V)	Linear (H&V)
Cross-Polarization Separation (dB)	>27	>27
EIRP (Peak Value) (dBW)	38 (Global) 43 (West Hemi) 41 (East Hemi)	50 (Europe) 51 (Americas) 50 (MENA) 49 (SAF)
TWTA Size (Watts)	70	150
TWTA Redundancy	26 for 21 (can be operated up to 24)	24 for 19 (can be operated up to 24)
Receiver Redundancy	9 for 6	8 for 5
Uplink SFD (dBW/m ²)	-80 to -100 (at -5 dB/K)	-76 to -98 (at -2.5 dB/K) (Europe and MENA) -76 to -98 (at -1.0 dB/K) (Americas) -76 to -98 (at -5.0 dB/K) (SAF)
G/T (Peak Value) (dB/K)	-3.0 (Global) 4.0 (West Hemi) 4.1 (East Hemi)	9.5 (Europe) 7.1 (Americas) 8.0 (MENA) 7.2 (SAF)