Northrop Grumman built the Intelsat 23 (IS-23) Geosynchronous communications satellite for Intelsat. IS-23 generates 4.8 kilowatts of electrical payload power and carries 15 active Ku-band and 24 active C-band transponders. The spacecraft provides communications services for the Americas, the Caribbean, Western Europe, Africa and selected islands of the Pacific and Atlantic oceans. Designed for a useful life of at least 15 years, the IS-23 satellite is located in orbit at 307 degrees East Longitude.

**Coverage**
The Americas, the Caribbean, Western Europe, Africa and selected islands of the Pacific and Atlantic oceans.

**Mission**
C- and Ku-band communications

**Customer**
Intelsat

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**GEOStar™ Satellites for Intelsat**
Intelsat 23 is one of 11 Northrop Grumman GEOStar communications satellites ordered by Intelsat.

- Galaxy 12
- Galaxy 14
- Galaxy 15
- Galaxy 30
- Horizons-2
- Intelsat 11
- Intelsat 15
- Intelsat 16
- Intelsat 18
- Intelsat 28
Specifications

Spacecraft
Launch Mass: 3,200 kg (7,055 lb.)
Solar Arrays: Four panels per array, UTJ Gallium Arsenide cells
Stabilization: 3-axis stabilized; zero momentum system
Propulsion: Liquid bi-propellant transfer orbit system; monopropellant (hydrazine) on-orbit system
Batteries: Two >4840 W-Hr capacity Li-Ion batteries.
Mission Life: 15 years
Orbit: 307° East Longitude

Hybrid Payload
C-band
Repeater: 24 active transponders with two groups of 16-for-12 redundant TWTAs
Antenna: 2.5 x 2.7 m single shell super-elliptical deployable reflector; 1.3 x 1.65 m single shell super-elliptical deck-mounted

Ku-band
Repeater: 15 active transponders with 19-for-15 TWTAs
Antenna: 2.5 x 2.7 m single shell super-elliptical deployable reflector

Launch
Launch Vehicle: Proton
Site: Baikonur, Kazakhstan
Date: October 14, 2012

Mission Partners
Intelsat
Intelsat is a premier global provider of video and data services via satellite

Northrop Grumman
Prime contractor for Galaxy 12, 14, 15 and 30; Intelsat 11, 15, 16, 18, 23 and 28; Horizons-2 for an Intelsat/SKY Perfect JSAT joint venture

International Launch Services
Launch provider

Coverage Contour Maps

C-band Coverage Areas
- Eastern Hemisphere 3.7 GHz
- Western Hemisphere 3.7 GHz

Ku-band Coverage Areas
- F1 11.7 GHz HP
- F2 11.7 GHz HP
- F1 14.0 GHz HP
- F2 14.0 GHz HP
- Eastern Hemisphere 5.925 GHz
- Western Hemisphere 5.925 GHz

Eastern Hemisphere 3.7 GHz
Western Hemisphere 3.7 GHz
Eastern Hemisphere 5.925 GHz
Western Hemisphere 5.925 GHz