

# AsiaSat's most powerful satellite for region-wide coverage and connectivity

#### **UNIQUE FEATURES**

- Replacement satellite for AsiaSat 4 with enhanced coverage and capacity
- Highest C-band TWTA power available in Asia-Pacific offering extended high-power coverage
- 3 new dedicated Ku-band beams: Myanmar,
  Indonesia and Mongolia, in addition to enhanced
  East Asia and Australasia beams
- Cross-strap Ku-band beam switching capability for flexible coverage
- Ka-band payload offering high-power regional coverage
- Doubling spectral density (bit/Hz) to support higher mod/cod with up to 3dB improvement in downlink EIRP power
- Innovative filter design on spacecraft to achieve higher C-band bandwidth, delivering 23% increase in throughput compared to AsiaSat 4
- Star tracker equipped to provide 20% increase in satellite pointing accuracy
- Hall Effect Thrusters fitted to enhance stability and reliability of satellite operation and provide better performance at edge of beam coverage

#### THE SPACECRAFT

**Designed/Built by** Space Systems Loral

Model SSL 1300 Nominal Orbital Location 122°E

#### **LAUNCH**

29 September 2017 by ILS Proton M/Breeze M rocket from Baikonur Cosmodrome, Kazakhstan



#### **COMMUNICATIONS PAYLOAD**

#### C-band

No. of Transponders 28

20

Transponder Bandwidth

36 MHz

**UL/DL Polarisation** 

Horizontal and Vertical

Coverage

Asia, Middle East, Central Asia

and Australasia

**TWTA Size** 

110 watts

TWTA Redundancy

32 for 28

Satellite Receiving G/T

-0.5+ dB/K

Ku-band

No. of Transponders

32

Transponder Bandwidth

54 MHz

**UL/DL Polarisation** 

Horizontal and Vertical

Coverage

5 Beams: East Asia, Myanmar,

Indonesia, Australasia, Mongolia

LNA Redundancy

Australasia: 2 for 1

East Asia/Indonesia: 5 for 3

Mongolia/Myanmar: 4 for 2

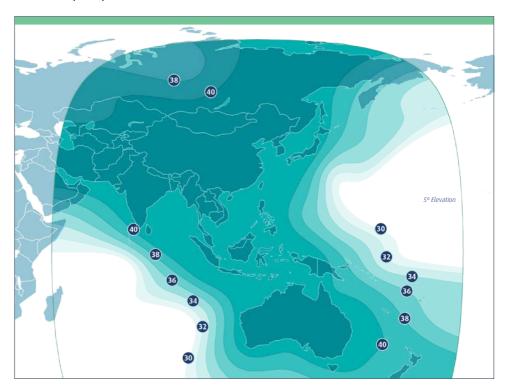
TWTA Size

200 watts

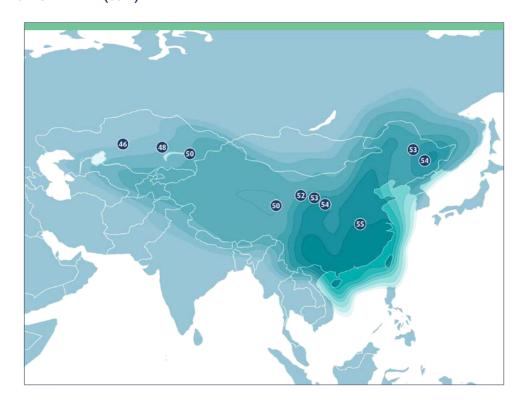




#### C-BAND GLOBAL BEAM EIRP (dBW)

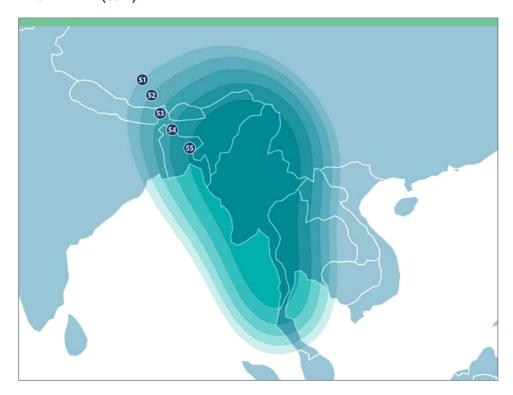


#### **KU-BAND EAST ASIA BEAM EIRP (dBW)**

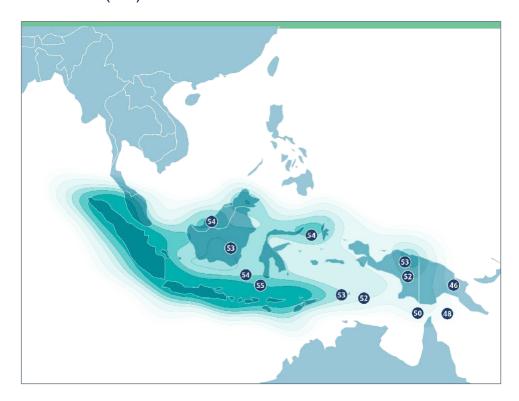




## **KU-BAND MYANMAR BEAM EIRP (dBW)**

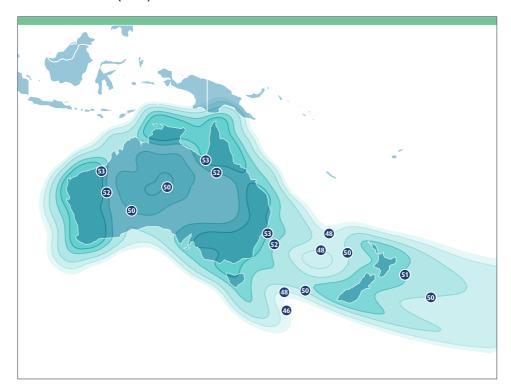


## **KU-BAND INDONESIA BEAM EIRP (dBW)**





## **KU-BAND AUSTRALASIA BEAM EIRP (dBW)**



## **KU-BAND MONGOLIA BEAM EIRP (dBW)**

