nanoSSOC-D60

Sun Sensor for Nano-Satellites
Digital Interface

Sun Sensor on a Chip (SSOC) is a two-axes and low cost sun sensor for **high accurate** *sun-tracking, pointing and attitude determination. The device measures the incident angle of sun ray in two orthogonal axes, providing a high sensitivity based on the geometrical dimensions of the design.*
nanoSSOC sun sensor is based on MEMS fabrication processes to achieve high integrated sensing structures.
nanoSSOC-D60 has tiny size, low weight and low power consumption to be the perfect **ADCS** *solution for* **nanosatellite** *platforms like Cubesats.*

Technical Chracteristics:

ITAR FREE

Type	2 orthogonal axes
Field of View	±60º
Accuracy	< 0.5 º (3sigma) < 0.1 º (precision)
Electrical interface	UART, I2C or SPI 10-pin micro-connector
Power supply	3.3V / 5V < 23mA consumption
Mechanical interface	43 x 14 x 5.9 mm 6.5 g
Housing	Aluminum 6082 Black anodizing

Digital
Space Qualified

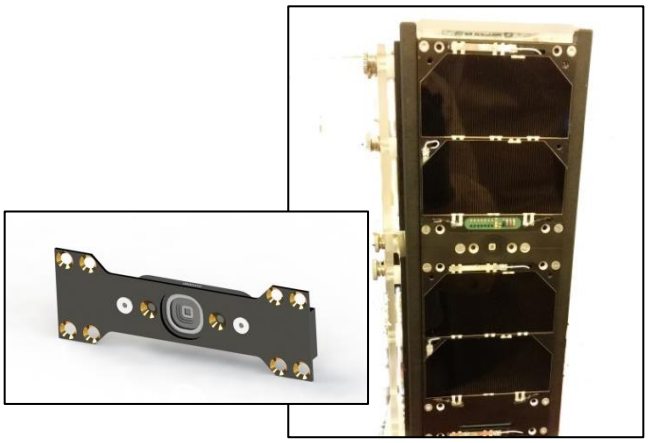
Qualification Data and Flight Heritage:

Operating Temperature	-30º to 85º Celsius
Radiation	30 kRad (gamma) 6 MeV 3000 kRad (protons)
Random vibration	14,1g @ 20-2000 Hz
Shock	3000 g @ 1-100 ms

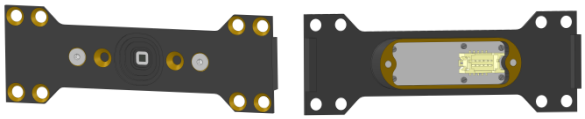
It includes MEMS technology of Solar MEMS with flight heritage.
Electronic components are space-grade, and microprocessor has been tested according to space environment, and has flight heritage.

More than **100 units** *included in more than 20 missions.*

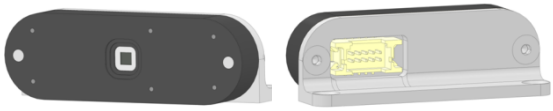
Nano-Satellite Accommodation:



Compatible with most cubesat structures.
Compatible with most OBCs.

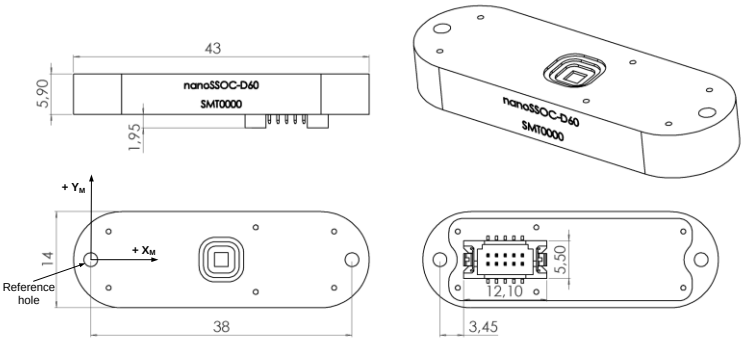


Accommodation with structure



Accommodation with vertical support

Mechanical Interface:



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