

Accurate and up-to-date data transfer in precise positioning systems is vital. SATEL's radio modems and modules offer a first-class solution e.g. for GNSS RTK, remote measurement and control applications. They combine quality, continuity, flexibility and low life cycle costs. Examples of GNSS systems that use SATEL's radio modems and modules include land surveying, precision farming, machine control, harbor logistics and port cranes.

SATEL have produced a range of OEM radio modules for system manufacturers to integrate into customer solutions. They are secure, customizable and flexible in mounting options. SATEL's solutions are widely compatible and also support other manufacturers' radio protocols.

SATELGO

Mission-Critical Connectivity

Read more: www.satel.com

SATEL - the world's leading expert and innovator in wireless networking technology.

Our solutions are used in wide range of industrial applications. We are known for our high quality, expertise, service and support.

You can contact us directly or get in touch with your local distributor.



# Small module on the move

SATEL-TR49 is compatible with SATELLINE / SATEL product lines on 410-475 MHz and on 902-928 MHz bands. SATEL-TR49 is a frequency hopping spread spectrum transceiver module that is, thanks to it's small size, easy to integrate into a host device.

### **SATEL-TR49**

#### RADIO TRANSCEIVER SPECIFICATIONS 902-928 MHZ

Frequency range

902 ... 928 MHz

**Spreading method** 

Frequency hopping

**Hopping bands** 

7, user selectable

**Hopping patterns** 

15 per band, 105 total, user selectable

**Hopping channels** 

50-112, user selectable

Sensitivity / Carrier power

-109 dBm / 1 W

Data speed

Radio / Serial 115200 bps

Modulation

2-GFSK

#### RADIO TRANSCEIVER SPECIFICATIONS 410...475 MHz

**Frequency range** 

410...475 MHz

**Tuning range** 

65 MHz

**Channel spacing** 

12.5 / 20 / 25 kHz, selectable

**Sensitivity / Carrier power** 

-120 dBm for 1% BER / 1 W

**Data speed** 

Radio 19200 bps / Serial 115200 bps

Modulation

GMSK, 4-GFSK

## GENERAL SPECIFICATIONS

Vibration tolerance

25 G, up to 2 kHz sinusoidal

**Operating voltage** 

+3.8 ... +5.5 Vdc

**Power consumption** 

900 MHz:

440 mW (RX) / 4.1 W (TX 1 W)

400 MHz:

440 mW (RX) / 4.8 W (TX 1 W)

Size / Weight

57 x 36 x 6.9 mm / 18 g

Connectors

1.27 mm pitch socket / U.FL

Interface

CMOS-UART



#### Temperature range

-40 ... +70 °C (operational)

Complies with requirements in:

EU

USA

Canada

Australia

New Zealand

Brazil

Values are subject to change without a notice.

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