

# TWN4 MultiTech 3 HF

## Multi-frequency HF RFID module with NFC support



TWN4 MultiTech 3 HF (exemplary illustration\*)

The powerful reader modules of the ELATEC TWN4 MultiTech 3 family combine a compact form factor with optimized read/write performance. All devices integrate RFID (125 kHz and 13.56 MHz), NFC and, optionally, Bluetooth Low Energy (BLE) capabilities. Thanks to their reduced size, the modules can be easily used for almost all applications where small size and full performance matter. Furthermore, they are compatible with the most common host interfaces, such as USB, and they can also be configured with different connector options.

TWN4 MultiTech 3 HF is a single-frequency product model of the TWN4 MultiTech 3 family that allows users to read and write almost all common worldwide 13.56 MHz tags and/or labels. Further key features of the module include a powerful SDK for writing apps that are executed directly on the module, the possibility to upgrade the firmware in the field and transparent data exchange with the RFID media.

#### Special features:

- + Possibility to read many HF RFID technologies
- Cost-optimized single-frequency RFID solution (13.56 MHz) with integrated HF antenna
- + Powerful SDK for writing apps which are executed directly on the module
- Firmware update in the field possible
- On-board 18 kB flash storage, e.g. for storing user accessible non-volatile data
- + Supports transparent data exchange with RFID media
- + CCID and PC/SC 2.01
- + Excellent read/write performance combined with a compact form factor































<sup>\*</sup>The product image may show a product variant or additional components that are not available.

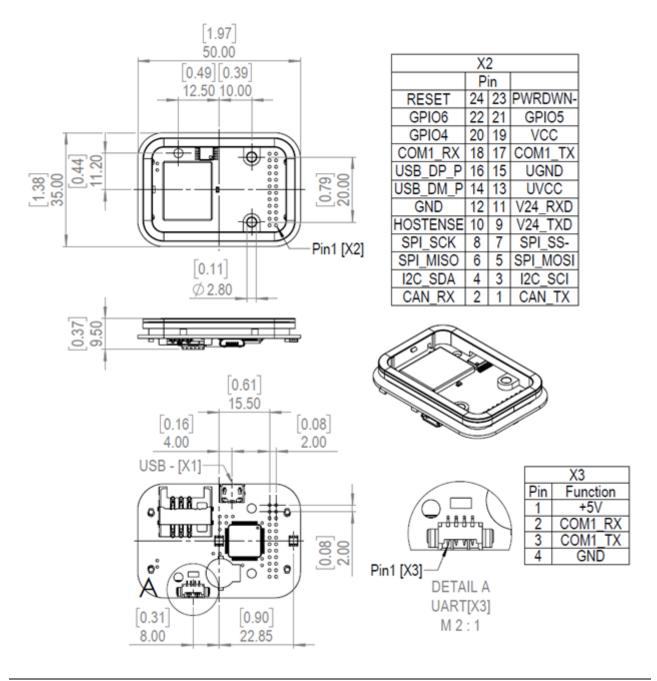


### **TECHNICAL DATA**

FREQUENCY	13.56 MHz (HF)
ANTENNA	Integrated
DIMENSIONS (L X W X H)	Approx. 50.00 x 35.00 x 7.00 mm, maximum diameter < 55.00 mm
	Approx. 1.97 x 1.38 x 0.28 inch, maximum diameter < 2.17 inch
	Refer to the technical drawings below for further information.
POWER	Micro USB (X1): 4.3 V - 5.5 V
	Generic interface (X2): 3.3 V (pin 19) or 4.3 V - 5.5 V (pin 13)
	UART (X3): 5 V
	PS2 classified power source according to IEC 62368-1, short-circuit current < 8 A
CURRENT CONSUMPTION	RF field on: 120 mA typically / Sleep: 500 µA typ.
TEMPERATURE RANGE	Operating: -25 °C up to +80 °C (-13 °F up to +176 °F)
	Storage: -40 °C up to +85 °C (-40 °F up to +185 °F)
RELATIVE HUMIDITY	5% to 95% non-condensing
READ/WRITE DISTANCE	Up to 100 mm / 4 inch, depending on environment and transponder
OPERATING MODES (USB)	USB keyboard emulation – USB virtual COM port – CCID / PC/SC 2.01
MTBF	500,000 hours
WEIGHT	Approx. 7 g / 0.25 oz
	Depending on the firmware version and installed options, ELATEC readers and modules
SUPPORTED OPTIONS AND	can support a wide range of RFID technologies. Please refer to the relevant ELATEC
TRANSPONDERS	transponder matrix (available at <a href="https://www.elatec-rfid.com/int/transponder-technology">www.elatec-rfid.com/int/transponder-technology</a> ) for more
	information about the available options and RFID technologies supported by the product.
OS SUPPORT	Windows 7 (32-/64-bit) and higher versions, Linux, Android <sup>1)</sup> , iOS <sup>1)</sup> , MAC OS X <sup>1)</sup>
PERIPHERAL INTERFACES	1 SAM slot (ID-000 card format)
	X1: micro USB, female
	X2: generic interface (refer to pin assignment in technical drawings below for more
	information about the available interfaces)
	X3: UART connector header 4 pos., 1.25 mm pitch, surface mount, right-angle
TRANSMISSION SPEED	Host: USB full speed (12 Mbit/s), RS-232: up to 115,200 baud, HF Air: up to 848 kbit/s
ORDER CODES	T43O-F2C0 Standard reader module
	T43O-F2C0-I Reader module with I option

¹)On request





#### All measures in mm [inch]

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