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### Tait TM9400 Mobile Radio

Choose from UHF, VHF or 700/800 MHz. The mobile radio is the base item that can be configured to your specific requirements by selecting the appropriate model followed by the features and accessories listed in the 'Features/Options/Accessories' column.

VENDOR	BRAND/MODEL	MSRP
	TAIT MOBILE RADIOS – TM9400	
Communications International	Tait / TM9400B1DA-T - 136-174MHz MUHF 50Watts Body ExtAlm	\$1,050.00
	Only	
Communications International	Tait / TM9400H5DA-T - 400-470MHz MUHF 40Watts Body ExtAlm	\$1,050.00
	Only	
Communications International	Tait / TM9400K5DA-T - 762-870MHz MUHF 35Watts Body ExtAlm	\$1,050.00
	Only	
	FEATURES/OPTIONS/ACCESSORIES	
Communications International	Tait / T02-00026-2001 - Kit Mobile Mount U-Cradle	\$21.00
Communications International	Tait / T02-00026-1004 - Kit Mobile Cable MUHF 30-50Watts	\$67.00
Communications International	Tait / T02-00071-AAAB - TM9400 Large Control Head Local Black	\$242.00
Communications International	Tait / T02-00005-AAAA - TM Standard Microphone TDMA	\$80.00
Communications International	Tait / TMAS152 - SFE Key - P25 Trunking Services Phase 2	\$1,180.00
Communications International	Tait / TMAS154 - SFE Key - Non-CAP Encryption ARC4/DES	\$255.00
Communications International	Tait / TMAS156 - SFE Key -P25 OTAR	\$560.00
Communications International	Tait / TMAS158 - SFE Key - Data Bundle	\$350.00
Communications International	Tait / TMAS155 - SFE Key -Location Services	\$300.00
	Tait / TMAS058 - SFE Key - Multi Key AES Enc (TMAS050	
Communications International	Prerequisite; TMAS057 or TMAS109 Prerequisite)	\$600.00
	Tait / T02-00036-AACA - Desktop Power Supply 23A DC 120V AC	
Communications International	US/CAN	\$295.00
	Tait / T02-00026-4016 - Kit Desktop Install MUHF 30-50Watts	
<b>Communications International</b>	Plinth	\$150.00





# Instant, reliable communications is just the beginning.

First responders around the world trust Tait for multi-agency coordination in the most challenging environments.

The flexible TM9400 mobiles offer both analog and digital modes including P25 Phase 2, and strong encryption management capability.



Improve workforce safety with smart features such as Location Services\*, Tait GeoFencing, and Lone Worker functionality.

Supercharge the performance of your TM9400 with Tait Unified Vehicle options to provide edge computing and applications processing, WiFi vehicle area networks and LTE connectivity.\*\*



\* Not all features are supported in all models or modes of operation. Contact Tait or an authorized channel partner for more details.

\*\* Please refer to Tait Unified Vehicle documentation, or contact Tait or an authorized channel partner for more details.







### FEATURES AND BENEFITS

#### Delivers on the P25 standards

Benefit from the spectral efficiency, multi-vendor interoperability, security, migration and data capability demanded by the P25 standards.

- TIA-102 P25 CAP tested and certified, providing multi-vendor interoperability
- 12.5kHz P25 Phase 1 FDMA and 6.25kHz equivalent P25 Phase 2 TDMA capable
- Product compliances satisfy FCC 2015 and 2017 ultra- narrowbanding mandates
- FCC and IC compliances include P25 Phase 2 emission designator (8K10F1W)

# Designed for demanding environments

Designed with users to ensure effective every-day operation

- IP54 rated: protected against dust and splashing water
- Exceeds MIL-STD-810G
- Large four-line LCD with icons to display key parameters
- Configurable to suit your needs: dual head and remote mount (6m and 12m options)
- Four programmable function keys on the standard mobile head
- Programmable orange emergency key

### High-performing, voice communications

Robust design delivers clear, mission-critical voice communications

- Future proof multi-mode flexibility offering analog, P25 Phase 1 conventional/ trunked and P25 Phase 2 trunked
- Automatic dual mode between analog and P25 Phase 1 conventional
- Programmable power level options
- Option to operate with dual band functionality
- AMBE+2 enhanced vocoder reduces background noise in demanding environments
- Voting ensures priority selection of the channel with optimum receive quality
- Dynamic regrouping and supergroup operation for mission-critical workforce management
- Increased channel capacity with up to 2,000 channels
- Scanning modes include: priority, dual priority, editable, zone, background scan

#### Keeping your people safe

- Supports end-to end encryption, including AES encryption
- Lone Worker, covert microphone and stealth emergency mode as standard
- Radio inhibit and uninhibit to allow management of radios during vehicle servicing
- Trunked failsoft reverts to conventional operation during trunked network failure

### Effective operations with voice and data

- Support for a variety of simulcast modes such as LSM and C4FM
- Pre-set status messages
- P25 data such as emergency GPS location
- Conventional and trunked IP data
- Location services over a conventional network
- Software configurable, including feature upgrades through software licenses
- Flexibility with an options slot for expansion and addition of future capabilities

## Efficient, security-focused management

The TM9400 management facilities and applications allow you to efficiently manage your radio fleet

- OTAR (Over-the-air Rekeying)
- EnableProtect Key Fill Device (KFD) for quick, reliable encryption key programming
- Programming application for efficient fleet programming
- EnableProtect Advanced System Key allows administrators to authorize and restrict subscriber units on their network

### **TM9400 Accessories**

Digital and analog interfaces allow a range of accessory options for the TM9400

### TM**9400 SPECIFICATIONS**



### GENERAL

Frequency stability	±0.5ppm (-22°F to +140°F/-30°C to +60°C)		
Channels/zones	1,000 channels/50 zones		
	(2,000 channels/100 zones optional enhancement with software license)		
Talk groups	1000 talk groups, up to 1,000 members total		
	(2,000 members optional enhancement with software license)		
Scan groups	300 with up to 50 members each, maximum of 2,000 members total		
Power supply	10.8-16VDC		
Active standby current	0.15A		
Channel spacing	12.5/15/20/25/30kHz		
Frequency increment	2.5/5/6.25		
Dimensions (DxWxH)			
Control head	1.38 x 7.24 x 2.8in (35 x 184 x 71mm)		
Radio body - 25W	6.9 x 6.3 x 2.1in (175 x 160 x 52mm)		
Radio body - 30/35/50W	7.7 x 6.3 x 2.1in (195 x 160 x 52mm)		
Weight			
Control head	0.73lb (0.33kg)		
Radio body - 25W	2.6lb (1.2kg)		
Radio body - 30/35/50W	3.1lb (1.4kg)		
Supported Languages	English (default), German, French, Spanish, Portuguese, Czech, Russian		
Operating temperature	-22°F to +140°F (-30°C to +60°C)		
Water and dust protection	IP54		
RF connector	50 ohm BNC or mini UHF		
Interface connectors	3 interface connectors with serial ports		
Signaling options (analog)	MDC1200 encode and decode, Two Tone decode, PL (CTCSS), DPL (DCS)		

TRANSMITTER**	VHF	VHF	UHF	700/800MHZ	
Frequency range	136-174MHz	136-174MHz	378-470MHz (HK)* 400-470MHz (H5)" 450-520MHz (H7)	762–870MHz	
Transmit power	25W, 12W, 5W, 1W	50W, 25W, 15W, 10W	25W, 10W, 5W, 1W 40W, 20W, 15W, 10W	<806MHz: 30W, 25W, 10W, 2W >806MHz: 35W, 15W, 5W, 2W	
Transmit current	5.5A max.	10.5A max	(25W, 10W, 5W, 1W) <6A (40W, 20W, 15W, 10W) <10.5A (<7A)^	10A max	
Modulation limiting					
12.5/15kHz channel	±2.5kHz	2.5kHz	2.5kHz	±2.5kHz	
25/30kHz channel	±5kHz	±5kHz	±5kHz	±5kHz	
FM Hum and noise (Analog)					
12.5kHz channel	-45dB	-45dB	-40dB	-40dB	
25kHz channel	-48dB	-48dB	-45dB	-45dB	
Radiated and conducted emissions	-85dBc	-80dBc	-80dBc	-80dBc	
Audio response (Analog)	+1/-3dB	+1/-3dB	+1/-3dB	+1/-3dB	
Audio distortion (Analog)	1.5% @ 1kHz, 60% deviation				
Duty cycle	25W: 2min Tx, 4min R	x for 8 hrs @ +140°F (+60°C			
	35/50W: 1min Tx, 4min Rx for 8 hrs @ +140°F (+60°C)				
	5W: continuous @ +10	04°F (+40°C)			

\*\*Contact your local Tait representative for more information.

<sup>+</sup> 40W model only. <sup>^</sup> 40W HK model only. <sup><sup>10</sup> 25W model only.</sup>

### TM9400 SPECIFICATIONS



RECEIVER**	VHF	UHF	700/800MHZ	
Frequency range	136–174MHz	378-470MHz 400-470MHz <sup>3</sup> 450-520MHz	762-776MHz 850-870MHz	
Sensitivity (Analog)				
12dB SINAD	0.22uV (-120dBm)	0.22uV (-120dBm)	0.28uV (-118dBm)	
Sensitivity (P25)				
5% BER	0.22uV (-120dBm)	0.22uV (-120dBm)	0.22uV (-120dBm)	
Intermodulation rejection (P25 TIA-102)	76dB	75dB	75dB	
Adjacent channel rejection				
12.5kHz (P25) TIA-102	60dB	60dB	60dB	
25kHz TIA-603 (2-tone)	73dB	70dB	70dB	
Spurious response rejection (P25) TIA-102	80dB	80dB	80dB	
Residual audio noise ratio (P25) TIA-102	45dB	45dB	45dB	
FM hum and noise				
12.5kHz channel	-45dB	-40dB	-40dB	
25kHz channel <b>1</b>	-48dB	-45dB	-45dB	
Audio distortion (3W rated audio)	1.5% at 1kHz 60% mo	dulation		
Optional external speaker output	10W (into 4 ohm)			

MILITARY STANDARDS 810C, D, E, F AND G

Applicable MIL-STD Method	Method	Procedure	Applicable MIL-STD Method	Method	Procedure
Low Pressure	500.5	2	Humidity	507.5	2
High temperature	501.5	1,2	Salt Fog	509.5	1
Low temperature	502.5	1,2	Sand & Dust	510.5	1, 2
Temperature shock	503.5	1	Vibration	514.5	1
Solar radiation	505.5	1	Shock	516.5	1,5,6
Rain	506.5	1,3			

REGULATORY DATA	USA	CANADA	EUROPE <sup>3</sup>	AUSTRALIA/NEW ZEALAND <sup>3</sup>	
VHF (136-174MHz)	CFR 47	RSS-119	EN300-086, EN300-113, EN300-219, EN301-489, EN6095(	AS/NZS4295 0	
UHF (378-470MHz and 400-470MHz)	CFR 47	RSS-119	EN300-086, EN300-113, EN	AS/NZS4295 1300-219, EN301-489, EN60950 AS/NZS4365 <b>2</b>	
UHF (450-520MHz)	CFR 47	RSS-119	NA	AS/NZS4295 AS/NZS4365 <b>2</b>	
700/800MHz	CFR 47	RSS-119	NA	NA	
900MHz	CFR 47	RSS-119	NA	NA	
Emissions Designators**	11K0F3E, 16K0F3E <sup>1</sup> , 6K60F2D, 7K80F2D, 9K60F2D <sup>1</sup> , 10K8F2D <sup>1</sup> , 7K60FXW, 7K60FXD				

\*\*Contact your local Tait representative for more information.

<sup>1</sup>Wideband operation is not available in the USA in some bands.

<sup>2</sup> The 25W UHF band radios are approved for use in Citizen Band in Australia and New Zealand when programmed to meet the requirements of AS/NZS4365. Tait cannot guarantee full performance to the published specifications when the 400-470MHz band radios is operating at the CB frequencies.

<sup>3</sup> 25 Watt models only.

#### **TAIT P25 PHASE 2 SOLUTION**

Backed up by our proven radio network expertise, the TP9400 base station/repeater is part of our larger P25 Phase 2 offering. This solution consists of terminals, infrastructure, applications, services and integration with third party interfaces to ensure that your organization can reap all the benefits of the spectrally-efficient P25 standard.

Tait has taken every care in compiling this specification sheet, but we're always innovating and therefore changes to our models, designs, technical specification, visuals and other information included in this specification sheet could occur. For the most up-to-date information and for a copy of our terms and conditions please visit our website www.taitradio.com.

For further information please check with your nearest Tait office or authorized dealer.

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Tait International Limited facilities are certified for ISO 9001:2015 (Quality Management System), ISO 14001:2015 (Environmental Management System) and ISO 45001:2018 (Occupational Health and Safety Management System) for aspects associated with the design, manufacture and distribution of radio communications and control equipment, systems and services. In addition, all our Regional Head Offices are certified to ISO 9001.







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