TP9300 SPECIFICATIONS



Improved efficiency and enhanced usability.

Tait DMR is a highly reliable, modern, digital radio solution that is designed for mission critical environments. Tait DMR offers a digital communications solution based on the DMR Tier 3 trunking standard.

The TP9300 portables offer trunked DMR operation as well as full MPT 1327, and conventional FM functionality in one device. It can roam between DMR and MPT networks. The portable has inbuilt GPS, *Bluetooth®* wireless technology and IP67 protection.



KEY FEATURES

- ▶ Future proof multi-mode portable (DMR, MPT 1327 and conventional analog FM)
- Full adherence to DMR standards providing choice and interoperability
- ▶ Engineered for demanding environments with IP67 rating
- ▶ Increased voice usability with integrated *Bluetooth* wireless technology connectivity
- ▶ Integrated GPS to improve efficiency and safety
- ▶ Text messaging and status calls to enhance your communications environment
- ▶ Crystal-clear audio quality
- Available in a range of models and configurable to suit your application













FEATURES AND BENEFITS

Improve workforce safety with the following TP9300 features

- ► Man Down and Lone Worker as standard
- Integrated GPS will ensure that you always know where your workforce is
- Wireless audio accessories utilizing Bluetooth technology
- Crystal-clear voice ensuring the operator and user will understand the message
- Status messaging activated with one touch of a button for quick and easy notifications

Improve your organizations efficiency

- ▶ GPS location allows efficient allocation of resources to events
- ► Text messaging for enhanced and unambiguous communications
- Pre-defined status messages for a fast response in common situations

Privacy feature

 Trunked operation allows for individual and private calls within designated groups

Designed to perform in demanding environments

- Water shedding grille assists voice clarity and high audio volume is maintained in wet environments
- ▶ IP67 water and dust protection
- ▶ 4 and 16 keypad options
- ▶ 3 programmable function keys

- Programmable orange emergency key at base of antenna for ease of location in dark or restrictive environments
- ▶ Recessed lens provides screen protection
- Impact protected corners provide shock absorbing protection

Voice communications delivering on operational needs

- ► Trunked DMR, MPT 1327 and analog conventional FM
- ▶ Roaming between MPT 1327 and DMR
- Individual calls provide privacy between individuals
- ▶ Group calls allow separate teams to communicate amongst themselves without having to listen to irrelevant traffic
- Increased channel capacity with support of up to 2,000 channels
- Analog capability includes Priority and Dual Priority, Editable, Zone and Background Scan
- PSTN dialing allows a user to make phone calls on DMR systems that support telephone interconnect
- ▶ Crystal-clear voice quality
- Optional continuous channel control knob
- Shared menu structure between 9300 terminals

Facilities to improve network security

- ▶ In DMR mode all terminals must be authenticated on the network before they are given access
- Stun and Revive are implemented to temporarily deny a specific portable access to the network

Complete package with accessories portfolio

- Audio accessories including speaker-microphones, headsets and earpieces
- ▶ Chargers including in-vehicle, single fast chargers, and 6 way multi-chargers
- Standard and high capacity Li-lon batteries available
- ▶ Various carry cases are available





		+*

Frequency Ranges **Frequency Band** 136-174MHz VHF

Frequency stability ±0.5ppm (-22°F to 140°F/-30°C to 60°C) 1,000 - 2,000 channels/50-100 zones Channels/zones

26 talk group lists comprised of up to 1,000 - 2,000 members each Talk groups 300 with up to 50 members each, maximum of 2,000 members total Scan groups

Dimensions (DxWxH) 1.61 x 2.56 x 5.35in (41 x 65 x 136mm) excluding knobs with Li-lon standard battery

with Li-Ion high-capacity battery 1.77 x 2.56 x 5.35in (45 x 65 x 136mm) excluding knobs

11.46oz (325g) - no antenna with Li-Ion standard battery with Li-Ion high-capacity battery 13.12oz (372g) - no antenna

Options Black keypad, 3-way zone selector Channel spacing 6.25/12.5/15/20/25/30kHz

Frequency increment/channel step 2.5/3.125/5/6.25kHz

Operating temperature -22°F to 140°F (-30°C to 60°C)

Water and dust protection

+/-4kV contact discharge and +/-8kV air discharge ESD rating

0.5W Rated audio Speaker rating 2W

DMR: ETSI TS 102 361 Air interface standard

MDC1200, encode and decode, Two tone decode, PL (CTCSS), DPL (DCS), Selcall Signaling options (Analog)

Vocoder type AMBE+2™

TRANSMITTER**

VHF Output power 5W, 3W, 2W, 1W

FM hum and noise (Analog) -45dB 25kHz channel 12.5kHz channel -40dB

Conducted/radiated emissions -36dBm +1/-3dB Audio response

2.5% @1kHz, 60% deviation Audio distortion (Analog)

RECEIVER†*

VHF

Sensitivity (Analog) 12dB SINAD -120dBm (0.22µV) Sensitivity (DMR) 5% BER -119dBm (0.25µV)

Intermodulation rejection EIA603D

Intermodulation rejection

ETS 300

Spurious response rejection (Analog)

EIA603D

Spurious response rejection (DMR)

ETS 300-113

FM hum and noise (Analog)

12.5kHz: -41dB 25kHz: -45dB

Selectivity (Analog) 12.5kHz: 52dB EIA603D (2 Tone) 25kHz: 73dB 12.5kHz: 62dB Selectivity (Analog) ETS 300-086 25kHz: 73dB

0.5W (into 16ohm balanced speaker) Optional external speaker output

73dB

66dB

75dB

70dB

Audio distortion (rated audio)





	MILITARY	STANDAR	DS 810	C. D. E.	F and G
--	----------	---------	---------------	----------	---------

Applicable MIL-STD	Method	Procedure
Low pressure	500.5	2
High temperature	501.5	1, 2
Low temperature	502.5	1, 2
Temperature shock	503.5	1
Solar radiation	505.5	1
Rain	506.5	1, 3
Humidity	507.5	2
Salt Fog	509.5	1
Dust	510.5	1
Immersion	512.5	1
Vibration	514.6	1
Shock	516.6	1, 4, 5, 6

CHARGER

Charger options (Li-Ion)

Fast desktop single charger, 6-way multi charger, vehicle charger

TAIT DMR SOLUTION

Backed up by our proven radio network expertise, the TP9300 portable is part of our larger DMR offering. The Tait DMR 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 DMR standard in a mission critical environment.

Specifications are subject to change without notice and shall not form part of any contract. They are issued for guidance purposes only.

[†]All frequency bands and channel spacings may not be available in all markets. For further information please check with your nearest Tait office or authorized dealer.

*Additional frequency bands will be available in future releases.

The word "Tait" and the Tait logo are trademarks of Tait Ltd. Tait is an ISO 9001: 2008 and ISO 14001: 2004 certified supplier.

The Bluetooth® word mark and logos are registered trademarks owned by Bluetooth SIG, Inc. and any use of such marks by Tait Limited is under license. Other trademarks and trade names are those of their respective owners.









professional wireless communications

Head Office:

Emcom House, 1-5 Adrain Road, Stamford Hill, Durban. **Tel:** 031 312 9288

Fax: 031 312 9296

Johannesburg Office: TransAfrica House, 10 Benmore Road, Benmore, Johannesburg. Tel: 011 086 6750 Fax: 011 086 6757

Website: www.emcom.co.za
Email: sales@emcom.co.za