MOTOROLA CEP400
Portable TETRA Radio and Accessories
In demanding environments, an effective and reliable communications infrastructure is vital to ensuring the safety of the workforce and achieving service continuity. That’s why business-critical users value the advanced features and capabilities offered by Motorola’s CEP400 portable radio.

The CEP400 leverages advanced capabilities to deliver the reliable and robust communications platform required by oil and gas, utilities, hospitality, transportation and other commercial businesses.
Setting a new standard in performance

The CEP400 TETRA portable enables the high performance required for critical communications. This rugged yet lightweight radio delivers easy-to-use advanced features to ensure that employees in demanding workplaces stay safe, informed and productive.

*Enhanced Personnel Safety*

With its high quality audio, large emergency ‘panic’ button and built-in GPS, the CEP400 supports a wide range of sophisticated safety features:

- Hot ‘Mic’ activates the microphone so that surrounding audio is captured without having to press the PTT button. At the same time, the dispatcher is notified of the user’s location.

- Ambience listening allows the microphone to be remotely activated so that audio is captured and the dispatcher’s situational awareness increased.

*Built to Last*

The CEP400 provides uncompromising durability and has been made to the highest quality levels, exceeding all 11 categories in the stringent MIL-810 standard.

*Superior Audio Quality*

The CEP400 incorporates advanced noise reduction digital technology. This helps to accurately filter out background noise from the caller’s voice. By virtually eliminating background noise, the need to repeat messages is minimised, increasing operational efficiency.

*Longer battery life*

Leveraging advanced power management technology, the CEP400’s standard Li ion battery provides more than 23 hours operational use (5/5/90 duty cycle) to meet the demands of a high performance workforce.

A customised solution for you

*A full line of Motorola Original accessories including headsets, carry cases, antennas, batteries, charging systems and vehicular car kits are available to meet your specific business needs. For enhanced investment security, all accessories are shared with the market proven MTP850 product.*

**D-Shell Earpiece**

Ultra lightweight and stylish earpiece designed to ensure comfort needed when working long shifts. In-line push-to-talk and microphone enhance ease of use.

**Leather Carry Cases**

Constructed of top-grain leather to protect the radio from harsh working environments. Keeps the radio secure in high activity applications while allowing the radio to swing freely with body movements.
Instant Familiarity

To minimise training costs, the CEP400 incorporates a familiar cellular phone style user interface. It also includes a large colour display option that supports 65,536 vivid colours and large scalable fonts. For fast and intuitive device interaction, the radio includes a customisable menu and programmable One Touch buttons.

Operational Resilience

The CEP400 allows users to leverage reliable TETRA networks for internal and external workgroup communications through its support for private, group, PABX and PSTN calls. This enables independence from public networks and improved operational resilience.

Performance matched accessories with the quality you expect

Motorola accessories are performance matched to guarantee the same high standards of quality that you enjoy with your Motorola Tetra terminal. When you buy a Motorola accessory, you know the accessories are built and tested to meet the highest standards that you expect.

Dual Unit Charger
Rapid charging solution that allows you to quickly charge your radio along with a spare battery at the same time to ensure your radio is charged and ready to go when you are.

Digital Car Kit
For a seamless communications experience, Motorola’s vehicle kits provide convenience and easy access to key portable functions while in a vehicle.
Ensuring Maximum Performance

Motorola has sold and supports more TETRA terminals in the field than any other manufacturer. With over 75 years experience of delivering mission critical and business critical solutions, Motorola has the expertise to ensure the optimal performance of your TETRA terminals.

To get the maximum benefit from your investment, Motorola provides a comprehensive suite of applications and terminal services.

Service Centre Excellence

With our proven same day repair capability, you can be sure your equipment is expertly repaired and back in your end users' hands quickly.

Technical Expertise

Get answers to your technical questions, reduce downtime and improve issue resolution times. Experienced technical support engineers work with you to diagnose and resolve hardware and software problems resulting in swift resolution of issues for your end users.

Customer Service

A single source for support delivered through our new state of the art call centre, available 24x7 to track customer issues and 8x5 for technical support. Ready to assist by telephone, e-mail or fax.

Certified solutions

All our services are fully certified to comply with ISO, ATEX / FM and CENELEC thereby providing the peace of mind that can only come from an experienced and trusted supplier.

Customised applications

To deliver highly tailored solutions for customers, we work with technology partners that are leaders in their field of expertise. Our solutions include personnel and vehicle tracking, video surveillance and a variety of tools for enhanced situational awareness.
Specifications

### GENERAL
- **Dimensions HxWxD mm**:
  - 125 x 50 x 37.5 (with standard battery)
- **Weight g**:
  - 170 (radio only)
  - 240 (with standard battery)
- **Battery Performance**:
  - Standard Li Ion mAh: 1850
- **Duty Cycle (5/5/90) hours**
  - > 23 hours
- **Duty Cycle (5/35/60) hours**
  - > 17 hours
- **Talk time hours**
  - 3.5 hours

### RF SPECIFICATIONS
- **Frequency Bands MHz**
  - 380-430
- **Transmitter RF Power**
  - Class 4 (1W)
- **RF Power Level Accuracy dB**
  - 2
- **Adaptive Power Control**
  - A and B
- **Receiver Class**
  - A and B
- **Receiver Static Sensitivity**
  - -112 dBm (-115 dBm typical)
- **Receiver Dynamic Sensitivity**
  - -103 dBm (-107 dBm typical)

### ENVIRONMENTAL SPECIFICATIONS
- **Operating Temperature °C**
  - -30 to +60
- **Storage Temperature °C**
  - -40 to +85
- **Humidity**
  - ETS 300-019-1-7 class 7.3E
- **Dust and Water Ingress Protection**
  - IP54 per IEC 60529
- **Shock, drop and vibration**
  - ETS 300-019-1-7 class 5M3

### OPTIONS
- **GPS License**
- **Local Language Options**
- **Colour and Greyscale Display Option**

### PERIPHERALS AND ACCESSORIES
- **Audio**
  - Earpieces, headsets and remote speaker microphones
- **Batteries**
  - 1850 mAh battery
- **Carrying & In-Vehicle Solutions**
  - Various carrying solutions and vehicle adapters
- **Antenna**
  - Includes stub, whip options
- **Remote Programming**
  - Via Intelligent terminal management solution

### SECURITY SERVICES
- **Authentication**
  - Mutual
- **DATA SERVICES**
  - **Short Data**
    - STATUS messaging in TMO & DMO
    - Short Data Service messaging in TMO & DMO
    - Short Data applications
  - **AT Commands**
    - Reduced set of AT commands
      - (excludes voice control)

### LOCATION SERVICES
- **Simultaneous Satellites**
  - 12 GPS Antenna
- **Helical integrated into TETRA antenna**
- **Sensitivity**
  - -162 dBm / -182 dBW
- **Accuracy**
  - 5 meter (60% probable); 10 meter (95% probable)
- **Protocols**
  - ETSI LIP & Motorola LRRP

### USER INTERFACE
- **Display**
  - Colour (or Gray Scale) 130x130 pixels with
    - 65,536 vivid colours
- **Screen Saver**
  - GIF image & text
  - Backlight | Flip screen and scalable text font options
- **Universal Time Display**
- **Multiple Languages**
- **Keypad Lock**
- **Contacts Management**
  - Customisable to user needs
  - Menu Shortcuts
- **Contacts List**
  - Up to 1000 contacts
- **Multiple Dialling Methods**
  - Up to 6 numbers per contact, max. 2000 entries
  - User defined
- **Fast/Flexible Call Response**
  - Private Call Response to a Group Call via
    - One Touch button
- **Alerting Modes**
  - Vibrator and Multiple ringtones
- **Message Manager**
  - Cellular phone style
- **Text Message Inbox**
  - 20 messages
- **Intelligent Keypad Text input**
- **Status List**
  - 100 alias messages
- **Country/Network Code List**
  - 100
- **Scan lists**
  - 40 lists of 20 talkgroups
- **User Controls**
  - Volume, Talkgroup scroll and/or selection
  - Single button activation for multiple functions
- **Multi-function Rotary Knob**
- **One Touch Buttons**
- **Adaptive Audio Control**
- **Selection of best audio profile for a given environment**
- **Authentication**
  - Mutual

### VOICE SERVICES
- **Full Duplex**
  - TMO
  - Private, PABX, PSTN, Emergency
- **Half Duplex**
  - TMO
  - Private, Group, Emergency
  - DMO
  - Private, Group, Emergency
  - Inter-MNI, Gateway, Repeater
- **Dialling**
  - Direct, Scroll, Speed, One Touch button/key
  - Call History Redial
- **Emergency and Safety**
  - Tactical Emergency Group Call to ATTACHED talkgroup
  - Non-Tactical Emergency Group Call to DEDICATED talkgroup
  - Individual Emergency Call to PREDEFINED party
  - HOT MIC
- **Status Message**
  - Message sent to dispatch console
- **Pre-emptive Priority Calls**
  - DMO to TMO
  - Enter DMO emergency (without gateway) or enter TMO emergency