

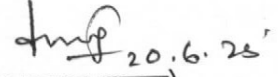
उत्तर प्रदेश पुलिस रेडियो मुख्यालय, महानगर,  
संख्या: पी-609/2025

लखनऊ - 226006  
दिनांक : जून 20, 2025

कार्यालय ज्ञाप

सर्वसम्बन्धित को सूचित किया जाता है कि वित्तीय वर्ष: 2025-26 हेतु क्रय किये जाने वाले संचार उपकरण, जिनकी (QR/TD) Qualitative Requirement/Trial Directive, BIS (Bureau of Indian Standards) रक्षा मंत्रालय, गृह मंत्रालय या अन्य मंत्रालय (केन्द्र/राज्य) द्वारा उपलब्ध नहीं है, पीओसीओ (पुश टू टाक ओवर सेल्यूलर) का क्यूआर (QR/TD) Qualitative Requirement/Trial Directive यूपीओ पुलिस की वेबसाइट पर संशोधित करते हुए पुनः अपलोड किया जा रहा है।

अतएव, पीओसीओ से सम्बन्धित ओईओएम से अनुरोध है कि यूपीओ पुलिस के वेबसाइट पर अपलोड किये गये (QR/TD) Qualitative Requirement पर अपनी आपत्तियां ई-मेल आईडी: radiohq@nic.in पर 15 दिवस के अन्तर्गत उपलब्ध कराना सुनिश्चित करें।



(सुनील कुमार शुक्ल)

उपमहानिरीक्षक (पुलिस दूरसंचार) प्रशिक्षण  
उओपीओ पुलिस रेडियो मुख्यालय,  
महानगर-लखनऊ।

**UP POLICE RADIO HEADQUARTERS  
MAHANAGAR-LUCKNOW**



**Request For Proposal  
for Supply, Installation, Testing  
and Commissioning of Push to  
Talk Over Cellular (PoC) Solution  
for the State of Uttar Pradesh**

# Scope of Work

## 1.0 INTRODUCTION

The purpose of the proposed work in this contract document is to setup a new latest generation Push to Talk over Cellular (POC) Phone with IMS solution for the State of Uttar Pradesh for mission-critical communication facilitating services over MAP .

Bidder shall offer manufacturer's standard practice meeting the specified design standards and performance requirement acceptable to owner.

### 1.1 Limit of Contract

Equipment furnished shall be complete in every respect with all mountings, fittings, fixtures and standard accessories for IMS Solution i which is normally provided with such equipment's and/or needed for Installation, Commissioning completion and safe operation of the equipment's as required by applicable codes though they may not have been specifically detailed in the technical specification, unless included in the list of exclusions. All similar standard components/parts of similar standard equipment's provided shall be interchangeable with one another. Power & space will be provided by department. Rest all will be scope of Bidder.

### 1.2 Intent of Specification

Equipment and accessories to be furnished by the bidders in accordance with this specification shall include inspection, testing, packing, transportation, insurance and carrying out further activities at sites viz. unloading, storage (space to be provided by the department), further handling, testing and commissioning including successful completion of acceptance tests and any other services specified in these specifications.

a) This specification is intended to cover the following activities and services executed at State of Uttar Pradesh.

The Activities are:

1. Latest generation POC phone with IMS Solution for MCX service to be installed in State of UP and other designated location to monitor and communicate with all officer, teams who are working in State of UP. Communication service is most critical part for the RADIO Police department. This work shall be in compliance with all applicable standard, statutory regulations and safety requirements in force on the date of award of this contract.
  2. Requisite Network Solution to be placed for providing uninterrupted service for POC phone to facilitate MCX Service through this phone for State of UP.
  3. Since the system is expected to serve the requirement of State of UP, it must have the flexibility, Modularity and scalability to adapt the changing technology, without replacing major equipment.
  4. Packing and transportation from the Bidder's place to the site. All costs/taxes to be borne by the Bidder.
  5. Complete system in a planned and systematic manner only is acceptable to department.
- b) The bidder shall be responsible for providing all material, equipment and services, specified or otherwise which are required to ensure and fulfill the intent of operability, maintainability and the reliability of the complete scope of work covered under this specification.
- c) All aspects of design and construction of equipment, nevertheless, the equipment shall conform in all workmanship and shall be capable of performing continuous operation round the clock.
- d) **The bidder's offer should not carry any section like clarifications, interpretations and/or assumptions.**

- e) If the bidder feels that, in his opinion, certain features brought out in his offer are superior to what has been specified, these may be highlighted separately.
- g) Bidders should provide the following:
  - 1) Any Special tools & tackles required during installation, commissioning, and testing.
  - 2) All relevant data, documents, drawings, and instruction Manuals etc.
  - 3) All safety gadgets required for installation and commissioning as per UP Police norms.
  - 4) Any minor civil work required is the responsibility of the bidder.
  - 5) All other accessories and consumables required for the completion of job.

### **1.3 Scope of work**

The scope of work mentioned here is not exhaustive and includes all supply items & miscellaneous works required for completion of the work in all respects. The details of scope of work are as follows:

- 1) The Scope of work includes Supply, Installation, Integration, Testing and Commissioning, of Push to talk over cellular with IMS based solution for MCX service using captive network.
- 2) Network Solution to be setup by bidder. Place for installation of servers, Dispatcher console and power supply of 220V, 50Hz at all locations will be provided by UP Police.
- 3) The supplier should be responsible for providing adequate dispatcher console with camera so controller can make a video call.
- 4) Supply, Installation & Maintenance of Web & application based Centralized software with GUI for configuring, administering, and monitoring of the system with facility for enabling & disabling features online with user authentication.
- 5) Supply, Installation & Configuration of Management. Offered solution must be based on 3GPP or better standards with support of bearer for Voice and video call.
- 6) All necessary interconnecting cables and accessories required for the installation such as CAT 6 UTP cable, OFC Cable, RJ45 Jacks, patch cords, casings, conduits etc. needs to be supplied by Bidder.
- 7) All the servers & gateways shall have duplicated IP Ethernet (10/100/1000 Base-T) port for network redundancy. In case of failure of one network path it shall be possible to select another network path automatically without human intervention.
- 8) All Software supplied should have a valid **perpetual license** and should be **customizableScalable** for the requirements of UP Police. OEM support for this has to be ensured. All licenses for this project for wired and wireless end points is to be included.
- 9) Vendor has to strictly follow the Guidelines of MHA, Dept. of Telecommunications & Dept. of Electronics & IT, Govt. of India wherever applicable.
- 10) Providing training to 50 Personnel of UP police all aspects of the system, operation, programming and maintenance.
- 11) **The Bidder should attend to all breakdown jobs 24x7.**

### **2.0 TECHNICAL SPECIFICATIONS**

Detailed Technical Specifications for each item is given in **Annexure-A**

### 3.0 TEST & TRIAL

The Bidder's representatives, as required, shall inspect all supplied equipment upon arrival on site. All observed damage to equipment shall be reported to the Owner and will be replaced if required.

After completion of installation and **integrated testing** of the system, a trial run of 7 days in continuous operation round the clock shall commence. The bidder shall demonstrate all the features. After successful completion of the trial run, work will be considered completed.

### 4.0 WARRANTY

The **warranty period** will be **THREE (03) year** from date of completion of trial run and system acceptance by UP POLICE . The warranty shall be comprehensive and includes the complete system. During the warranty period bidder should engage experienced technical person for breakdown & preventive maintenance job.

During the warranty the bidder shall promptly attend to any complaint and get the fault rectified in the shortest possible time at the owner's site and make the system operational. Any parts found defective during the warranty period shall be replaced by the Bidder without any charges whatsoever. The bidder shall be responsible for maintaining all required tools & consumables and providing necessary services, including repair for ensuring the above availability. Required spares of all critical equipment shall be kept to ensure system availability. Bidder has to provide software version updates of the complete system including applications during the warranty. Necessary upgradation of the system in case obsolescence shall be the responsibility of the bidder during warranty period.

### 5.0 TECHNICAL EVALUATION

- a) **Technical Compliance Statement for IMS solution & POC phone must be submitted by Bidder on OEM's Letterhead. It is required to fill the compliance column of each row of technical specs otherwise bids are liable to be rejected.**
- b) Brand Name: Make/brand of items offered must be specified and detailed. The bidder shall submit a technical Brochure/Data Sheet for each of the offered item along with the technical bid. All the required/relevant specifications shall be highlighted in the data sheet.
- c) Test Certificate: Wherever applicable, the Bidder shall submit the relevant test certificate/ guarantee certificate along with the supplies.
- d) **Bidder should submit Certificate/MANUFACTURER'S AUTHORIZATION FORM (along with bid document) from the OEM to confirm that the system offered are not end of life /discontinued products.**
- e) **The offered hardware & software should be guaranteed by the OEM for availability of system spares for a period not less than 5 years from the date of system handover.**
- f) **The offered IMS switching System must have TEC certificate. In case of non-submission of TEC, Bidder shall be liable for rejection.**
- g) UP Police reserves the right to reject any or all the bids received without assigning any reasons whatsoever.

### 6.0 OTHER CONDITIONS OF CONTRACT

- a) The Bill of quantity is tentative which does not absolve bidder the responsibility of supplying item/items which is/are required for successful installation/ commissioning/testing and smooth operation/maintenance of the system. Integrated operation will be the responsibility of the bidder. **Any other component required to complete the system, not explicitly mentioned in the Bill of Material, will be the responsibility of the bidder. Such additional items shall be quoted by the bidder in their offer without any additional cost.**

- b) The bidder ensures proper selection of all equipment, correct estimation of material and identifying all the material required for making the system complete in all aspects.
- c) **Delivery of material on site to be done within 4 weeks from the date of supply order. The duration of the period for completion of installation & commissioning shall be done 4 weeks from date of supply order. Installation may be in a phase manner as per the progress of setup and other requirements.**

## 7.0 PAYMENT TERMS

Payment will be made after SITC (Supply, Installation, Testing and Commissioning) of the Project.

**8.0 Security Deposit:** A EPG 5% of total PO value which shall be valid for Initial Warranty of 3 year + 2 months validity.

**9.0** The decision of the department is final and binding in all respects.

Annexur-A

## Minimum Technical Specification of POC

### 1. Introduction:

UP is most populated state of **India consisting of 75 Distts**. The Push to Talk over Cellular (POC) will be used during for mission-critical communication. The Uttar Pradesh Police Department, as one of the largest and dynamic law enforcement agencies in India, requires robust, real-time communication solutions to enhance operational efficiency, and respond swiftly to emergencies across urban and rural terrains. In response to this need, we propose the deployment of a **Push-to-Talk over Cellular (PoC)** communication system—a next-generation solution that leverages 4G/5G and broadband networks to provide mission-critical voice, video, and data connectivity.

### 2. Details:

1. The Scope of Work shall include design, supply, delivery at the site, unloading, and any other services associated with the delivery of equipment and materials, hardware and software, product accessories, etc.
2. Providing **service support to the equipment, hardware, software, etc., supplied under the GeM contract for the functioning of** the entire system (with no hidden cost) for a period of 5 years w.e.f. the date of acceptance of the system.
3. To install and commission the LTE servers as well as DR setup on the cloud. The LTE server will have sufficient compute power and all software required for the smooth functioning of the system. Server will be setup at specified location in UP. Management, configuration call control of the entire solution should be with UP Police Radio. (Minimum Server specs : Intel Xeon Gold processor, 32 Core, 64 GB RAM, 4 TB SSD Storage, Dual Power supply). These should support IMS / CORE / MCX / Geo Spatial Map / Command & Control Centre / Network Management system / limited recording facility, and all services intended in the tender.
4. Installation, commissioning, and software optimization, etc.
5. Providing warranty and post-warranty services for the equipment.
6. The successful bidder shall assume full responsibility for all the supplied hardware, equipment, and software during the warranty period.
7. The related licenses for the IMS system, servers, dispatch consoles, and handheld sets, etc., shall be the responsibility of the bidder.
8. M2M SIM cards for handheld sets with a 3-year subscription shall be the responsibility of the final selected bidder as part of the bid.
9. Enabling GIS application with locations of all users.

10. The communication must be secured . Solution should be capable of operating on Mission critical bearers (MCX Bearers like 65 or equivalent , for mission critical voice, 67 or equivalent for MC Video and 69 or equivalent, for Signaling & bearer 70 or equivalent, for MC data) at least in captive network set up by Police.
11. The handheld devices would be used to send/receive short video clips, images, messaging, and Push-To-Talk for audio.
12. Dispatch capabilities include the management of user groups, user permission, etc., as well as the management of situations in the field by viewing video clips, personnel locations, and voice communications with the police personnel.
13. System should be capable of providing dispatcher console at minimum two numbers of command & control centres.
14. Each Command and Control centre should be able to view Geo spatial maps, View GSM Cameras, Make Calls to a defined group of users and make announcements and extend / interact for citizen services.
15. Recording, archiving, and retrieval of information and use as evidence as needed.
16. **Open standard and interoperability:** The SUPPLIER will provide all equipment, hardware, and software based on open standards, and the handheld devices will be interoperable with similar products manufactured by other OEMs with open standards.
17. Prequalified bidders may be called for a presentation and demonstration of the offered solution.

**3. Minimum Technical Specifications of POC System:**

S. No	Specification
<b>1</b>	<b>SERVER</b>
	a) Minimum Server specs : Intel Xeon Gold processor, 32 Core, 64 GB RAM, 4 TB SSD Storage, Dual Power supply). These should support IMS / CORE / MCX / Geo Spatial Map / Command & Control Centre / Network Management system / limited recording facility, and all services intended in the tender.
	b) Server Should be in premises of UP Police with DR Server over Cloud in duplicated mode with disaster recovery setup. In case of failure, complete control will be shift to Cloud
	c) Server must be in premises of UP Police.
	<b>SERVER SOFTWARE</b>
<b>2</b>	a) Share resources among clients on request and provides reliable communication with excellent performance. IMS and should have the following sub-systems with a provision to install them in a single server or in Different server whenever required. i) IMS- Group Management Server (GMS) ii) Identity Management Server (IdMS) iii) Key Management Server (KMS) iv) Configuration Management Server (CMS) v) Participating Server vi) Controlling Server vii) Media Control Server (MCS) Vii) Geo Spatial MAP Server viii) MCX/ PPDR Server
<b>3</b>	The System shall support the following minimum Mission Critical Push to Talk (MCPTT) functionalities as mentioned below: I. User authentication and service authorization. II. Group, individual, priority calls, and Dynamic group call. III. Messages, file exchange, and alerts.

	IV. Should support Mission critical bearers as per 3GPP or better standards . No OTT based as per DCPW Guidelines, individual key management.
	V. GPS location, GPS route.
	VI. Geo-fencing & Advanced Geo-Fence (TX, RX Auto Disable upon breach of Geo Fence).
	VII. Remote camera and mic control.
	VIII. Push to video for situational awareness.
	IX. Voice recording and call history.
	X. Ease of administration.
	XI. Task management system.
	XII. Multiplatform clients and accessories.
	XIII. Emergency solution alarming, man down, lone worker protection.
	XIV. Broadcasting.
4	<b>DATA SECURITY:</b> Should provide the ability to selectively manage access to a variety of services and features and administer the rights of each user and group.
5	<b>SCALABILITY:</b> Should be enormously scalable and can run on a range of computing hardware. The system architecture should support multi-server connectivity and be designed with cost efficiency and system redundancy in mind.
6	<b>DATA &amp; VOICE ENCRYPTION:</b> The solution should support a full encryption portfolio that provides persistent protection of voice and data for a higher security level of communication.
7	<b>OEM Authorisation:</b> Vendor shall obtain and submit the Tender specific OEM Authorisation Certificate and shall get the necessary support of OEM for the successful commissioning of the system and further support for carrying out necessary updates/modifications required on a later date. Certificate should be enclosed.
8	<b>FLEET MANAGEMENT:</b> The server should provide monitoring and tracking of tools. Ability to trace and record the movements of mobile assets and workforce, store accurate GPS data and keep voice and data recordings in history for at least 6 months.
9	<b>Web-based software:</b> Web-based application to control the resources and features on servers. This allows flexible maintenance and system expansion, deployment of new servers and nodes. In particular, acts as an administrator to create, delete, and edit users, teams, and groups. It also gives you tools to manage the set of functionalities for each individual user. All the features that Mobile client software and Dispatcher provide can be individually managed, enabled, and disabled through Commander Software.
10	Server configuration: The server should configure multiple server ports at client devices.
11	<b>Specifications of Mobile Client Software for POC Application</b>
a	Should be designed for all types of smartphones or tablets. This should run on IP networks (4G/5G/wi-fi) powered by the operating systems: Android/ iOS/Windows.
b	Should grant users maximum operational capability with a user-friendly interface and keep high availability even on slow data networks.
c	This should provide always-on PTT operation, messaging, status messages, voice recording, and GPS location management.
d	It can run alongside your other business applications, enabling device integration capabilities.
e	It should support the following minimum features:
	a. Group call
	b. Individual call



	c. Priority call
	d. Emergency call and Lone worker protection
	e. Status messages, Text, and Data Exchange
	f. End-to-End encryption
	g. Dynamic group call
	h. Remote control
	i. Video
	j. Voice recording and call history
	k. GPS localization
	l. GPS history tracker
	m. GPS route
	n. Task management
	o. Provision for SOS Button
<b>12</b>	<b>Specifications of Dispatcher Software (Command and Control Centre Solution)</b>
<b>a</b>	It is a command and control center solution that provides powerful and flexible features. It can be deployed as a desktop application on minimum 43 Inch Windows Touch Screen Panel. It should support the following minimum features:
	a. Group call
	b. Individual call
	c. Priority call
	d. Dynamic group call
	e. Emergency call receiving
	f. Remote control
	g. Status messages, Text, and Data Exchange
	h. Lone worker protection
	i. End-to-End encryption
	j. Voice recording and call history
	k. Map tools
	l. GPS localization
	m. Guard tour
	n. Task management

	o. Call transfer by drag and drop of the icon.
<b>13</b>	<b>Specifications of Voice Logger and Call Recorder Software</b>
<b>a</b>	It should support secure recording and replay of voice, video and data communications that occurred within the POC network.
<b>b</b>	It should have a set of tools to sort, search, and replay voice records, view message history, and monitor user activity in channels.
<b>c</b>	It should provide the ability to analyse user movements based on the GPS location history.
<b>d</b>	All data and voice records must be stored on the server.
<b>e</b>	Should have provision to back up all voice communication on a local drive.
<b>f</b>	Designed to be a user-friendly application, it offers easy ways to navigate recorded data. It should support the following features:
<b>g</b>	<b>GPS recording:</b> An operator can quickly access the user movement history and keep track of specific users. The coordinates are displayed with reference to the time of change. It should support export of GPS data so that you can import the data into mapping software, such as Google Earth, Open Street Map, etc. to create a 2D virtual artwork on a large scale.
<b>h</b>	<b>Channel changing:</b> To view users' movements through channels. This feature allows you to track a user's actions, the names of the visited channels, and the times of the visits.
<b>i</b>	<b>Name changing:</b> To view the history of login changes. This helps to keep track of the activity of users who might not be recognized otherwise.
<b>j</b>	<b>Connection status:</b> To view the login history of POC clients and know exactly who logged in and out at what times.
<b>k</b>	<b>Individual &amp; group call recording:</b> It can track every individual and group call and export them to files. The call details are also available: time, duration, channel data, login, and alias. This data can be provided by both the calling user and the answering user.
<b>l</b>	<b>Message recording:</b> To view data about all written communication on a server. We can view the sender and recipient information and read the text of each message. All emergency messages are highlighted in red to help quickly evaluate the severity status. We can export the text messages or transferred files to a local drive.
<b>m</b>	<b>Emergency calls recording:</b> All emergency calls should be tracked and recorded and can be examined for compliance with applicable procedures in critical situations. Data for each call is displayed and can be exported.
<b>n</b>	<b>Data export:</b> It should support the export of all data and allow you to download recordings.
<b>14</b>	<b>System Expansion/Scalability</b>
<b>a</b>	Any future system expansions to the POC design & solution within the area defined will be supported under mutually agreed terms and conditions. The proposed architecture will be capable of handling up to 2000 users and scalable up to 5000 radio users. These users will be inclusive of all users at Uttar Pradesh Police department.
<b>b</b>	Proposed IMS Based MCPTT solution will have capabilities to seamless integrate with subsystems e.g., Voice Telephony like SIP Audio & Video phone and Gateway. There should be seamless Video & Audio Call between Mobile Phone and Video phone. All telephony features like BLF, Camp on, Barge-in should work between Wired & Wireless Phone. Other features must support as mentioned below. 1. Should support Public Address System where announcements could be made by any of the authorized POC devices and also from Head Quarters.

	<p>2. Integrated NMS to view active / registered and unregistered devices.</p> <p>3. Dispatcher system with drag and drop option to initiate and transfer calls.</p> <p>4. Call &amp; ticket record system.</p> <p>The bidder shall conduct a thorough assessment and audit before providing the solution &amp; support services.</p>
<b>c</b>	System design shall guarantee an operational life of at least 5 years and guaranteed availability of service, technology, software updates, and support for at least 5 years from the date of the start of operations.
<b>d</b>	Provide specifications and as-built documentation for all POC hardware and software components with test plans, test scripts, system testing, and commissioning.
<b>e</b>	All issues such as coverage, reliability, call drop, quality of voice, latency, downtime, etc., shall be noted, measured, and remedied by the bidder to the satisfaction of Uttar Pradesh Police. All such issues will be provided with root cause analysis and evidence of satisfactory closure.
<b>f</b>	If the system performance is not found to be satisfactory and/or the operational POC is delayed beyond the planned duration, the department solely, at its discretion, may terminate the contract.
<b>15</b>	<b>Operations &amp; Maintenance of POC Setup</b>
<b>a</b>	The bidder shall provide O&M services at Uttar Pradesh Police for the system on a 24x7x365 basis throughout the term of the contract.
<b>b</b>	The bidder shall deploy competent technical personnel at sites to attend to faults within the defined response time as per SLA.
<b>c</b>	O&M from the date of final acceptance includes spares, technical services, and software maintenance, up-gradation/replacement, etc., of the system, as required during the tenure of the contract.
<b>d</b>	The bidder shall upgrade the PTT server OS, software & LTE client applications, security patches, etc., as & when required to keep the system up & running without any additional cost during the Operations & Maintenance period.
<b>e</b>	The bidder's personnel shall maintain an operational logbook daily and submit the report to the department. These maintenance logs will be available for observation & audit purposes.
<b>f</b>	The bidder shall extend the services to the new user groups and accounts for POC services as per department instructions.
<b>16</b>	<b>System Performance Requirements</b>
<b>a</b>	GPS accuracy — min. 5 meters or better, GPS cadence — 30 Seconds.
<b>b</b>	Database Transactions — 95% ≤ 0.5 sec. or better
<b>17</b>	<b>Standards &amp; Certifications</b>
<b>a</b>	MCPTT/POC Solution should be based on 3GPP or better standards with IMS complying to TEC standards.
<b>b</b>	Offered Application should not be available on Google Play and iOS app store . Solution be on standard COTS Server and software-based solution with suitable encryption & secured VPN will be acceptable with closed OS.
<b>c</b>	MCPTT Client should have successfully passed the review and is available in the store.
<b>d</b>	OEM's MCPTT/POC Platform should have an India-based on-premises & cloud installation which will work as DR in case of failure of in premise server setup.

#### 4. Hand Held POC Device Specifications

Sl. No.	Specification	Minimum Requirement Description
1	Processor	Qualcomm Snapdragon, Octa core, 2.2 GHz or better
2	Memory	RAM at least 4 GB
3	Storage	At least 64 GB or higher
4	Operating System	Android Enterprise with 13 or higher OS version upgradable to Android Enterprise 15.
5	Security	Certified as Android Enterprise Recommended (AER) Rugged Device. OEM should provide OS security updates every quarter for a minimum of 3 years after OS End of Service. Password of the device should be set and reset by the central IT helpdesk. Multi-level security for remotely accessing the application. Provision to disable unwanted Google applications, data transmission. Application lock; no third-party application should be installed. Ability to fetch IMEI number.
6	Generation	4G, LTE, True 5G
7	GSM	Yes, Nano SIM or better
8	Ruggedness	<ul style="list-style-type: none"> <li>• IP 67 or better</li> <li>• Minimum 4 ft. drop</li> <li>• MIL-STD 810G</li> </ul>
9	Screen Display	<ul style="list-style-type: none"> <li>• 5 inch or better</li> <li>• Minimum 450 NITS and above</li> <li>• Corning Gorilla Glass display with both finger &amp; stylus support.</li> </ul>
10	Display Resolution	720 x 1600 pixel or better
11	Voice	<ul style="list-style-type: none"> <li>• Voice recording facility</li> <li>• Built-in microphone</li> <li>• Built-in Speaker</li> <li>• Voice calling from the device</li> </ul>
12	Dedicated Hard (Physical) PTT Button	Dedicated hard PTT button on the device
13	Camera	>= 5MP Front & 10 MP rear with LED Flash (integrated)
14	Speaker output	01 Watt or better
15	Hands free Support	Yes (Hands free Kit to be provided)
16	Keyboard	Virtual on screen

17	GPS	Inbuilt GPS
18	Audio Playing Format	MP4, wav files format or better
19	Environment Specification	0degree C to 50 degree C or better
		• Humidity 95% RH, Non-condensing
20	Ports	USB C 2.0 and above
		• Charging port, Headset port / BT Support
		• DC charging support, etc.
21	Expansion Slots	Integrated
22	Adapter	AC Input: 150-240V or better
23	Power Supply	230V, 50 AC supply
24	Battery	• Minimum 5,000 mAh capacity
		User Removable / Replaceable / Rechargeable battery
25	Battery backup Time	8 hours or better
26	Charger	Electric Charger (DC charger). Built-in rechargeable battery.
27	Carrying Pouch	Yes, Rugged Holder for each device to be Provided.
28	Wireless	Minimum 802.11 or better
29	IPv6 Compliant	Yes
30	Weight	Not more than 300 Grams including battery
31	Mobile Device Monitoring	Access User Status and Statistics or ability to review mobile user and mobile environment activity, such as sent/received items, last connection time, etc. Ability to disable access to public App Stores based on a policy configuration. Configuration Policies to allow individual components of the mobile device to be enabled or disabled. Login and logout support and provide secured access through unique username and password.
32	Certification	Certification from Bureau of Indian Standards (BIS).
33	Warranty	1 Year.

## BOQ for Push to Talk Over Cellular System(POC)

S. No	Equipments	QTY.
1	<b>POC Perpetual License</b>	
1.1	LTE Communication Client application Software for Android capable Mobile Set with required functionality and <b>one-time license fee.</b>	1250
1.2	LTE Communication Client application module for remote monitoring with <b>one-time license fee.</b>	1250
2	<b>POC Floating License for 03 Years.</b>	
2.1	LTE Communication Client application Software for Android capable Mobile Set with required functionality and <b>03 Yrs. license fee.</b>	1000
2.2	LTE Communication Client application module for remote monitoring <b>with 03 Years. license fee.</b>	1000
3	Mobile Set with Rugged Cover & Data SIM (M to M) with opex for 03 Years.	1250
4	Console Dispatch Software with Redundancy: One-time Cost. (i) Min 43-inch Touch panel for MCX/ Geo spatial map monitoring and operation- (ii) 2 no's with each console	02
5	Network Management Software with one-time License Fee.	1
6	COTS Server for IMS/ MCX & Cloud Storage Cost: Opex for 03 year	1
7	One-time Installation, Testing, Commissioning and onsite operational support Charges.	1

## Check List

<b>S.No</b>	<b>Document</b>	<b>Details</b>
<b>1</b>	<b>Minimum Technical Specification</b>	All mentioned parameter to be complied & Signed by Bidder, and Undertaking to be submitted accordingly.
<b>2</b>	<b>Scope of work</b>	All mentioned parameter to be complied & Signed by Bidder, and Undertaking to be submitted accordingly.
<b>3</b>	<b>Required necessary Documents</b>	All required certificates to be attached by Bidder.
<b>4</b>	<b>EMD</b>	A Digital copy of required EMD has to enclosed in the bid and to be submitted physically within 3 days of bid submission at RHQ.
<b>5</b>	<b>All terms and condition</b>	All Gem terms and condition to be complied and undertaking have to submitted accordingly.

जेमपोर्टलपर की जानेवाली पी0ओ0सी0 बिड में चयनित किये जाने वालेमानक

- 1) **Bid Life Cycle (From Publish Date)** - **10 DAYS**
- 2) **Bid Offer Validity (From End Date)** - 180(Days)
- 3) **Minimum Average Annual Turnover of the bidder (For 3 Years)** - 50% of Estimated Bid Value
- 4) **OEM Average Turnover (Last 3 Years)** - 400% of Estimated Bid Value
- 5) **Years of Past Experience required** - 3 Year (s)
- 6) **Past Performance** -50%
- 7) **MSE Exemption for Years of Experience and Turnover** - YES FOR TURNOVER ONLY
- 8) **Startup Exemption for Years of Experience and Turnover** - No
- 9) **Document required from seller**
  - Experience Criteria
  - Bidder Turnover
  - Certificate (Requested in ATC)
  - OEM Authorization Certificate
  - OEM Annual turnover
- 10) **Past Project Experience** - 03 year
- 11) **Bid to RA enabled** - YES
- 12) **RA Qualification rule** - H1 Elimination  
technically qualified **bidders**
- 13) **Evaluation Method** - Total value wise evaluation
- 14) **Time allowed for Technical Clarifications during technical evaluation** - 2 Days
- 15) **EMD Detail** - EMD Percentage (%) 1.00
- 16) **ePBG Detail** - ePBG Percentage (%) 5.00
- 17) **Duration of ePBG required (Months).** - 14 Months
- 18) **Splitting** - No
- 19) **MSE Purchase Preference** - YES
- 20) **MII Purchase Preference** - YES
- 21) **Brand Type** - As per GeM
- 22) **Delivery Period** - 15 Days
- 23) **Inspection** - THIRD PARTY/BOO
- 24) **Inspection Agency** - THIRD PARTY/BOO



## Buyer Added Bid Specific Terms and Conditions

1. **Bidder financial standing:** The bidder should not be under liquidation, court receivership or similar proceedings, should not be bankrupt. Bidder to upload undertaking to this effect with bid.
2. Bidders shall quote only those products in the bid which are not obsolete in the market and has at least **5 year** residual market life i.e. the offered product shall not be declared end-of-life by the OEM before this period.
3. Bidders are advised to check applicable GST on their own before quoting. Buyer will not take any responsibility in this regards. GST reimbursement will be as per actuals or as per applicable rates (whichever is lower), subject to the maximum of quoted GST %.
4. Data Sheet of the product(s) offered in the bid, are to be uploaded along with the bid documents. Buyers can match and verify the Data Sheet with the product specifications offered. In case of any unexplained mismatch of technical parameters, the bid is liable for rejection.
5. Experience Criteria: The Bidder or its OEM {themselves or through reseller(s)} should have regularly, manufactured and supplied same or similar Category Products to any Central / State Govt Organization / PSU / Public Listed Company for **3 year** before the bid opening date. Copies of relevant contracts to be submitted along with bid in support of having supplied some quantity during each of the year. In case of bunch bids, the primary product having highest value should meet this criterion.
6. Past Project Experience The Bidder / OEM {themselves or through reseller(s)}, should have executed project for supply and installation / commissioning of same or similar Category Products during preceding 3 financial years (i.e. current year and three previous financial years) as on opening of bid, as per following criteria:
  - (i) Single order of at least 35% of estimated bid value; or
  - (ii) Two orders of at least 20% each of estimated bid value; or
  - (iii) Three orders of at least 15% each of estimated bid value. Satisfactory Performance certificate issued by respective Buyer Organization for the above Orders should be uploaded with bid. In case of bunch bids, the Category related to primary product having highest bid value should meet this criterion
7. OPTION CLAUSE: The Purchaser reserves the right to increase or decrease the quantity to be ordered up to 25 percent of bid quantity at the time of placement of contract. The purchaser also reserves the right to increase the ordered quantity by up to 25% of the contracted quantity during the currency of the contract at the contracted rates. Bidders are bound to accept the orders accordingly.
8.
  - (i) The Seller shall not assign the Contract in whole or part without obtaining the prior written consent of buyer.
  - (ii) The Seller shall not sub-contract the Contract in whole or part to any entity without obtaining the prior written consent of buyer.
  - (iii) The Seller shall, not with standing the consent and assignment/sub-contract, remain jointly and severally liable and responsible to buyer together with the assignee/ sub-contractor, for and in respect of the due performance of the Contract and the Sellers obligations there under.

**9. Upload Manufacturer authorization:** Wherever Authorized Distributors are submitting the bid, Manufacturers Authorization Form (MAF)/Certificate with OEM details such as name, designation, address, e-mail Id and Phone No. required to be furnished along with the bid.

10. Without prejudice to Buyer's right to price adjustment by way of discount or any other right or remedy available to Buyer, Buyer may terminate the Contract or any part thereof by a written notice to the Seller, if:

- i) The Seller fails to comply with any material term of the Contract.
- ii) The Seller informs Buyer of its inability to deliver the Material(s) or any part thereof within the stipulated Delivery Period or such inability otherwise becomes apparent.
- iii) The Seller fails to deliver the Material(s) or any part thereof within the stipulated Delivery Period and/or to replace/rectify any rejected or defective Material(s) promptly.
- iv) The Seller becomes bankrupt or goes into liquidation.
- v) The Seller makes a general assignment for the benefit of creditors.
- vi) A receiver is appointed for any substantial property owned by the Seller.
- vii) The Seller has misrepresented to Buyer, acting on which misrepresentation Buyer has placed the Purchase Order on the Seller.

11. Scope of supply (Bid price to include all cost components) : Only supply of Goods

12. Bidder Turn Over Criteria: The minimum average annual financial turnover of the bidder during the last three years, ending on 31st March of the previous financial year, should be as indicated in the bid document. Documentary evidence in the form of certified Audited Balance Sheets of relevant periods or a certificate from the Chartered Accountant / Cost Accountant indicating the turnover details for the relevant period shall be uploaded with the bid. In case the date of constitution / incorporation of the bidder is less than 3 year old, the average turnover in respect of the completed financial years after the date of constitution shall be taken into account for this criteria.

13. OEM Turn Over Criteria: The minimum average annual financial turnover of the OEM of the offered product during the last three years, ending on 31st March of the previous financial year, should be as indicated in the bid document. Documentary evidence in the form of certified Audited Balance Sheets of relevant periods or a certificate from the Chartered Accountant / Cost Accountant indicating the turnover details for the relevant period shall be uploaded with the bid. In case the date of constitution / incorporation of the OEM is less than 3 year old, the average turnover in respect of the completed financial years after the date of constitution shall be taken into account for this criteria. In case of bunch bids, the OEM of CATEGORY RELATED TO primary product having highest bid value should meet this criterion.

14. IMPORTED PRODUCTS: In case of imported products, OEM or Authorized Seller of OEM should have a registered office in India to provide after sales service support in India. The certificate to this effect should be submitted.

15. Availability of Service Centers: Bidder/OEM must have a Functional Service Centre in the State of each Consignee's Location in case of carry-in warranty. (Not applicable in case of goods having on-site warranty). If service center is not already there at the time of bidding, successful bidder / OEM shall have to establish one within 30 days of award of contract. Payment shall be released only after submission of documentary evidence of having Functional Service Centre.

16. Dedicated /toll Free Telephone No. for Service Support: BIDDER/OEM must have Dedicated/toll Free Telephone No. for Service Support.

17. **Inspection Nominated Inspection Agency:** On behalf of the Buyer organization, any one of the following Inspection Agency would be conducting inspection of stores before acceptance:

Pre-dispatch Inspection at Seller Premises (applicable only if pre-dispatch inspection clause has been selected in ATC): Not Applicable

Post Receipt Inspection at consignee site before acceptance of stores: **Post Dispatch Inspection at Consignee site by Board of Radio Headquarter Officers.**

18. Bidder's offer is liable to be rejected if they don't upload any of the certificates / documents sought in the Bid document, ATC and Corrigendum if any.

19. The bidder is required to upload, along with the bid, all relevant certificates such as BIS licence, type test certificate, approval certificates and other certificates as prescribed in the Product Specification given in the bid document.

20. Warranty period of the supplied products shall be 3 years from the date of final acceptance of goods or after completion of installation, commissioning & testing of goods (if included in the scope of supply), at consignee location. OEM Warranty certificates must be submitted by Successful Bidder at the time of delivery of Goods. The seller should guarantee the rectification of goods in case of any break down during the guarantee period. Seller should have well established Installation, Commissioning, Training, Troubleshooting and Maintenance Service group in INDIA for attending the after sales service. Details of Service Centres near consignee destinations are to be uploaded along with the bid.

21. Timely Servicing / rectification of defects during warranty period: After having been notified of the defects / service requirement during warranty period, Seller has to complete the required Service / Rectification within **7 days** time limit. If the Seller fails to complete service / rectification with defined time limit, a penalty of 0.5% of Unit Price of the product shall be charged as penalty for each week of delay from the seller. Seller can deposit the penalty with the Buyer directly else the Buyer shall have a right to recover all such penalty amount from the Performance Security (PBG). Cumulative Penalty cannot exceed more than 10% of the total contract value after which the Buyer shall have the right to get the service / rectification done from alternate sources at the risk and cost of the Seller besides forfeiture of PBG. Seller shall be liable to re-imburse the cost of such service / rectification to the Buyer.

22. Bidders can also submit the EMD with Account Payee Demand Draft in favour of **IGP/DIRECTOR TELECOM UP** payable at **LUCKNOW**.

Bidder has to upload scanned copy / proof of the DD along with bid and has to ensure delivery of hardcopy to the Buyer within 5 days of Bid End date / Bid Opening date.

23. Successful Bidder can submit the Performance Security in the form of Account Payee Demand Draft also (besides PBG which is allowed as per GeM GTC). DD should be made in favour of IGP/DIRECTOR TELECOM UP payable at LUCKNOW. After award of contract, Successful Bidder can upload scanned copy of the DD in place of PBG and has to ensure delivery of hard copy to the original DD to the Buyer within 15 days of award of contract.

24. Scope of supply includes Training: Number of employees to be trained  
20, Place for Training  
POLICE RHQ MAHANAGAR LUCKNOW  
and Duration of training  
7days.

**Buyer Added Bid Specific ATC-**

1. Bidder has to submit affidavit for Non-blacklisting from any Government / PSU at the time of bid.
2. Bidder should not be in litigation with Department.
3. The Bidder / OEM should have experience of commissioning of communication networks with minimum 625 nos. end device in India, before opening of Techno & commercial Bid.