

4G LTE



**TENDER
NOTICE**

Title: Tender Notice for Upgrade of core nodes (Cloud EPC and Cloud HSS) and 5G Trial sites.

Tender No: KTRN/ADMIN/Network/2021/09/002

Date of issue: 7th September 2021

Date of bid submission: 8th October 2021

Time of Submission: 10:00AM

Kigali Heights, 7th Floor
Procurement@ktrn.rw | www.ktrn.rw

Also Find us at



1. Introduction

KT Rwanda Networks Ltd (KTRN) is the only 4G LTE infrastructure company in Rwanda, jointly invested by the Government of Rwanda and Korea Telecom (KT) exclusively for wholesale provision of universal mobile broadband network in Rwanda using 4G LTE technology. The wholesale network service for mobile broadband will help to promote healthy competition for advanced retail services and solutions, and will benefit consumers, enterprises and the nation in transforming Rwanda into the ICT hub of East Africa. The company also provides wholesale fixed services based on its national wide fiber infrastructure to licensed operators in Rwanda.

Project summary

KTRN is looking for a company that fulfils the requirements to bid for upgrade the Core nodes (Cloud EPC and Cloud HSS) and 5G Trial sites.

Below are the requirements and specifications

Technical Specifications for Core Upgrade				
Product	Quantity	Unit	Total Capacity	
			HW	SW
MME	2	SAU (Simultaneous Active User)	1M	400K
S/P-GW(With CUPS & DPI Capability)	2	PDN Sessions	1M	400K
		Throughput(Gbps)	80	40
MSC/HLR Emulator	2	Subs Count	100K (Registered)	50K(Active Users)
5G Core NSA [Mobility]	2	SAU (Simultaneous Active User)	50K	10K
5G Core NSA [Sessions]	2	PDN Session	50K	10K
NMS/OSS	2	Core Realtime and Aggregate KPI Stats	N/A	N/A
HSS	2	Subscriber	4M	400k active
VoLTE (IMS)	2	SAU (Simultaneous Active User)	1M	400K
VoLTE (Radio & OSS)		Per site (all required licenses for service)	N/A	Vendor propose

Technical Specifications for 5G Radio Trial Sites	
Product	Unit/Quantity
5G RAN (CU)	1 site
5G RAN (DU/RU)	5 sites
Radio MIMO	64 TRX
5G Spectrum supporting	3.4 ~ 3.6GHz (100MHz BW)
5G Capacity (no. of connected users, bandwidth)	No limitation by SW license
Modulation Scheme	Highest modulation (256QAM)
5G RAN OSS Upgrade (CM, FM, PM, AM, Reporting)	All required SW license and Capacity

Other Requirements:

- EN-DC (Dual Connectivity) supportive
- 5G NSA should support the 5G Option 3x
- Cloud deployment is preferred.
- HW and SW Maintenance Support (Should Include HW and SW Upgrades, Repair and Replacement)
- L3 Onshore Support
- Onshore commissioning/installation and integration of the New Systems.

Required from Bidders: -

1. Specification of proposed equipment to be supplied –
2. BOQ and prices for Hardware and software required –
3. This is a turn-key project. Supply and installation fee up to FAC stage
4. Maintenance and warranty conditions
5. Prices must include transport up to KTRN warehouse

Bids submission

Well, scanned bids, properly bound and presented in one file not exceed ten Megabytes (10MB) must be sent by email on procurement@ktrn.rw. No later than 8th October, 2021 at **10:00am** local time. Late bids will be rejected.

Please note that there will be no public opening due to the COVID-19 pandemic.

For any inquiry you can write to Mike.Bwatete@ktrn.rw. In at least 2 days before the bids submission deadline.

Done at Kigali, on 7th September 2021.

Management
KT Rwanda Networks Ltd.

