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#### For Immediate Release

## TRAI Assesses Network Quality Across Etawah City

The Telecom Regulatory Authority of India (TRAI) released its Independent Drive Test (IDT) findings for the UP West Licensed Service Area (LSA), covering extensive City routes during the month of August 2025. The drive tests, conducted under the supervision of the TRAI Regional Office, Delhi, were designed to capture real-world mobile network performance across diverse usage environments - Urban Zones, Institutional Hotspots, Public Transport Hubs, and High-Speed Corridors.

Between 11th August 2025 to 14th August 2025, TRAI teams conducted detailed tests across 346.9 km of City Drive Test, 12 Hotspot locations, 1.7 km of walk test, and Inter Operator Calling at 01 location. Technologies evaluated included 2G, 3G, 4G, and 5G, reflecting the service experience of users across multiple handset capabilities. The findings of IDT have already been intimated to all the TSPs concerned.

#### **Key Parameters Assessed:**

- a) Voice Services: Call Setup Success Rate (CSSR), Drop Call Rate (DCR), Call Setup Time, Call Silence Rate, Speech Quality (MOS), Coverage.
- b) Data Services: Download/Upload Throughput, Latency, Jitter, Packet Drop Rate, and Video Streaming Delay.

Call Setup Success Rate: Airtel, BSNL, RJIL and VIL have 100.00%, 64.25%, 99.64% and 100.00% Call Setup Success Rate respectively in Auto-selection mode (5G/4G/3G/2G).

Drop Call Rate: Airtel, BSNL, RJIL and VIL have Drop Call Rate of 0.00%, 6.90%, 0.18% and 0.18% respectively in Auto-selection mode (5G/4G/3G/2G).

## Performance against key QoS parameters

CSSR: Call Setup Success Rate (in %), CST: Call Setup Time (in seconds), DCR: Drop Call Rate (in %) & MOS: Mean Opinion Score.

CSSR	CST	DCR	Mute call	MOS	Avg. Download Speed (Mbps)	Avg. Upload Speed (Mbps)	Latency-50th Percentile (ms
Airtel 100.00%	VIL 0.69	Airtel 0,00%	VIL 0.24%	VIL 4.37	RJIL (184.53)	Airtel (25.83)	Airtel 18.30
VIL 100.00%	RJIL 0.71	RJIL 0.18%	BSNL 0.33%	Airtel 3.97	Airtel144.54	RIIL 20.35	RUIL 18.30
RJIL 99.64%	Airtel 1.31	VIL 0.18%	RJIL 0.97%	RJIL 3.84	VIL 28.16	VIL 11.55	BSNL 29.45
BSNL 64.25%	BSNL 3.39	BSNL 6.90%	Airtel 0.98%	BSNL 2.35	1 BSNL 3.30	BSNL 3.47	VIL 31.10

# **Summary-Voice services**

Call Setup Success Rate: Airtel, BSNL, RJIL and VIL have 100.00%, 64.25%, 99.64% and 100.00% call setup success rate respectively in Auto-selection mode (5G/4G/3G/2G).

Call Setup Time: Airtel, BSNL, RJIL & VIL have call setup time of 1.31, 3.39, 0.71 and 0.69 seconds respectively in Auto-selection mode (5G/4G/3G/2G).

**Drop Call Rate:** Airtel, BSNL, RJIL and VIL have drop call rate of 0.00%, 6.90%, 0.18% and 0.18% respectively in Auto-selection mode (5G/4G/3G/2G).

Call Silence/Mute Rate: Airtel, BSNL, RJIL and VIL have silence call rate of 0.98%, 0.33%, 0.97% and 0.24% respectively in packet switched network (4G/5G).

**Mean Opinion Score (MOS)**: Airtel, BSNL, RJIL and VIL have average MOS of 3.97, 2.35, 3.84 and 4.37 respectively.

#### Summary-Data services

**Data Download performance (Overall):** Average download speed of Airtel (5G/4G/2G) is 144.54 Mbps, BSNL (4G/3G/2G) is 3.30 Mbps, RJIL (5G/4G) is 184.53 Mbps and VIL (4G/2G) is 28.16 Mbps.

**Data Upload performance (Overall):** Average upload speed of Airtel (5G/4G/2G) is 25.83 Mbps, BSNL (4G/3G/2G) is 3.47 Mbps, RJIL (5G/4G) is 20.35 Mbps and VIL (4G/2G) is 11.55 Mbps.

**Latency (Overall):** Airtel, BSNL, RJIL & VIL 50th percentile latency is 18.30 ms, 29.45 ms, 18.30 ms & 31.10 ms respectively.

#### Data performance - Hotspots (in Mbps):

Airtel- 4G D/L: 36.88 4G U/L: 14.25 5G D/L: 241.34 5G U/L: 48.71

BSNL- 4G D/L: 5.50 4G U/L: 8.28

RJIL- 4G D/L: 34.91 4G U/L: 7.82

5G D/L: 242.56 5G U/L: 25.97

VIL- 4G D/L: 26.48 4G U/L: 14.62

Note- "D/L" Download speed, "U/L" Upload speed

The assessment in Etawah included high-density neighbourhoods such as Karhal, Kirthua, Jaswantnagar, Baidpura, Jaita, Basrehar, Udaypur, Balaiyapur, Jainpur Nagar, Lalpura, Vijay Nagar, Ekdil, Mugalpur Nraini, Sarai Jalal, Kunwara, Bakewar, Mahewa, Aheripur, Chakar Nagar etc. TRAI also evaluated real-world conditions at B.R. Ambedkar Engineering College, District Court, District Hospital, Etawah Bus Stand, Etawah Railway Station, Janta College Bakewar, Kali Temple Lakhuna, Kali Vahan Temple, LR Inter College Maheva, Saifai Medical College, Sant Marry School, Shashtri Chauraha.

The walk test, conducted on 14th August 2025 in Etawah City, focused on, Etawah Railway Station, capturing mobile network behaviour in crowded pedestrian environments.

The tests were conducted using TRAI suggested equipment and standardised protocols in real-time environments. The detailed report is available at TRAI website www.trai.gov.in. For any clarification/information, Shri Vivek Khare, Advisor (Regional Office, Delhi) TRAI may be contacted on email: adv.ca@trai.gov.in or at Tel. No. +91-11-20907772.

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