



Independent Quality of Service Survey in Pakistan – Roads

First Quarter 2025

Enforcement Division
PTA | F-5/1, Islamabad

Executive Summary

1. QUALITY OF SERVICE SURVEY

Pakistan Telecommunication Authority (PTA) has carried out independent Quality of Service (QoS) Survey at various Motorways and Highways of Pakistan during 1st Quarter 2025. During the survey, the performance of Cellular Mobile Operators (CMOs) has been assessed in accordance with the Cellular Mobile Network QoS Regulations 2021. The survey comprised approximately 5,300 Voice Calls and SMS while 36,000 samples were checked to measure the broadband performance of CMOs. Summary of the drive, road wise and overall results are below:



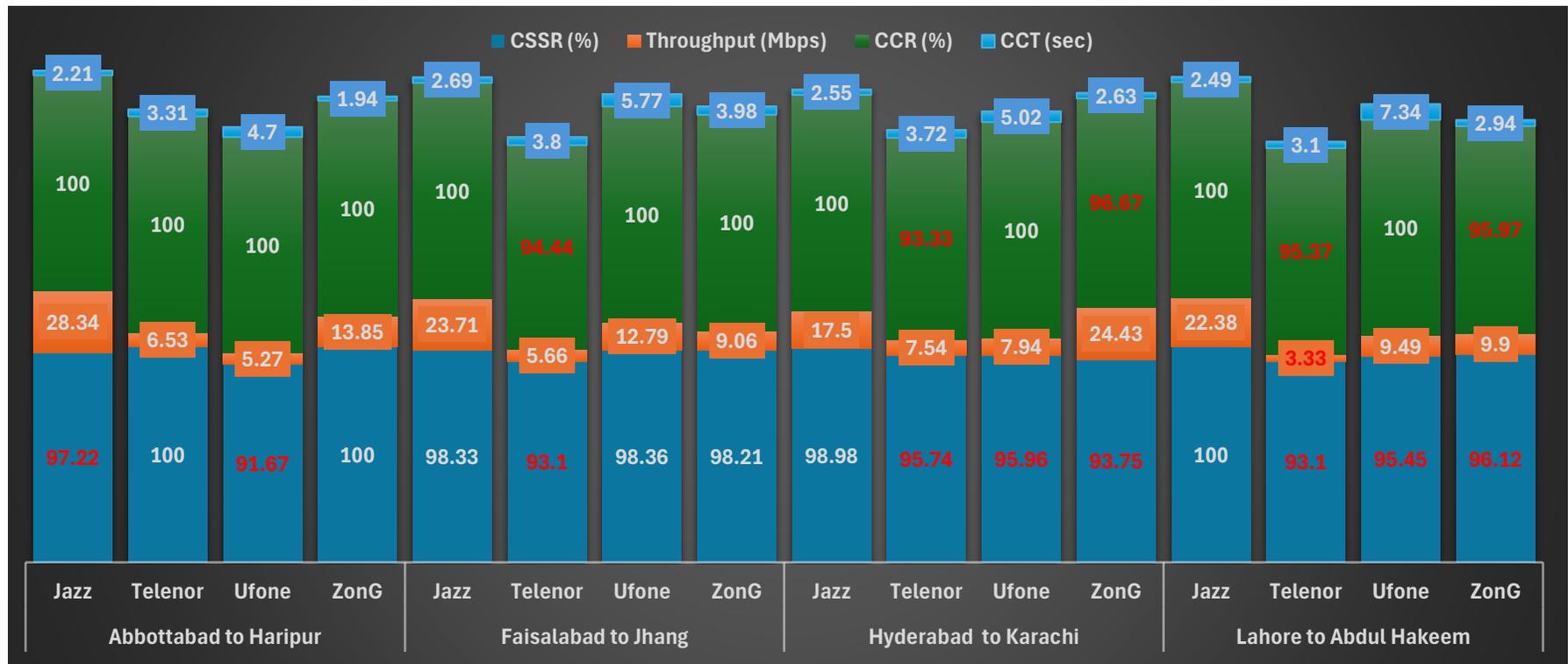
1930 KMs
Travelled



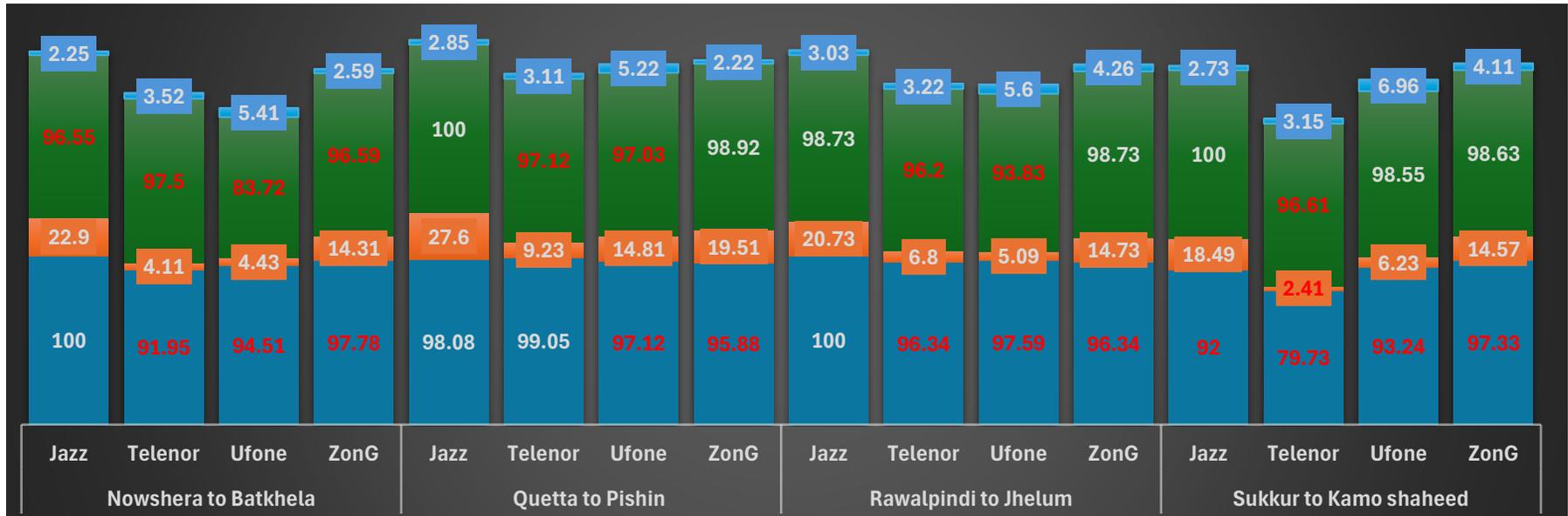
9 Days
Survey



8 Roads
Tested



Non-compliant KPIs are highlighted in **Red**



Non-compliant KPIs are highlighted in **Red**.

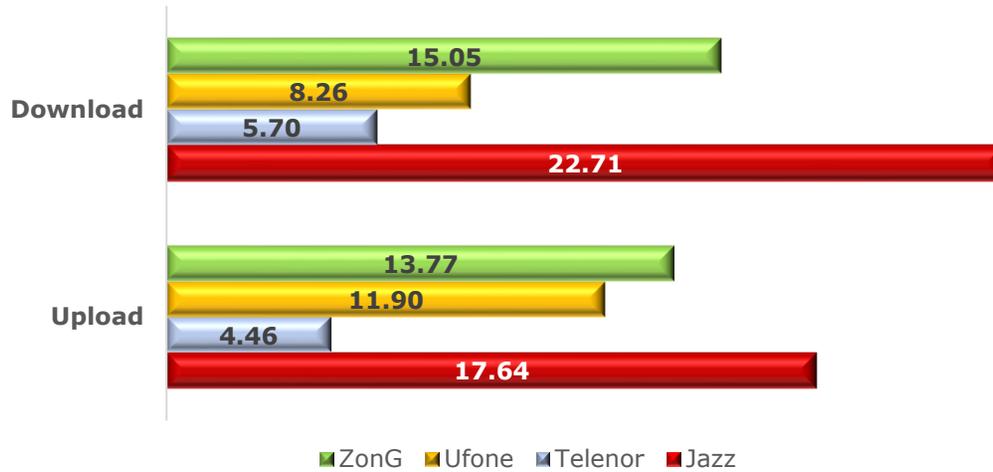
Call Setup Success Rate (CSSR), Call Connection Time (CCT), Call Completion Ratio (CCR)

City	Jazz			Telenor			Ufone			ZonG		
	Voice (%)	Data (%)	4G Coverage (%)	Voice (%)	Data (%)	4G Coverage (%)	Voice (%)	Data (%)	4G Coverage (%)	Voice (%)	Data (%)	4G Coverage (%)
Abbottabad to Haripur	75	100	91.85	100	50	90.75	75	75	97.84	100	50	92.26
Faisalabad to Jhang	100	75	97.06	50	50	88.67	100	100	85.44	100	75	95.92
Hyderabad to Karachi	100	75	94.97	50	50	82.02	75	75	86.11	50	50	92.02
Lahore to Abdul Hakeem	100	75	98.59	50	25	92.33	50	75	87.46	50	75	94.21
Nowshera to Batkhela	75	75	87.47	50	50	93.46	50	75	95.55	50	50	94.12
Quetta to Pishin	100	75	95.64	75	50	82.45	50	75	97.23	75	75	85.32
Rawalpindi to Jhelum	100	75	83.99	50	50	88.6	50	75	92.58	75	75	93.96
Sukkur to Kamo shaheed	75	75	97.14	50	25	70.17	75	75	67.68	75	75	92.15

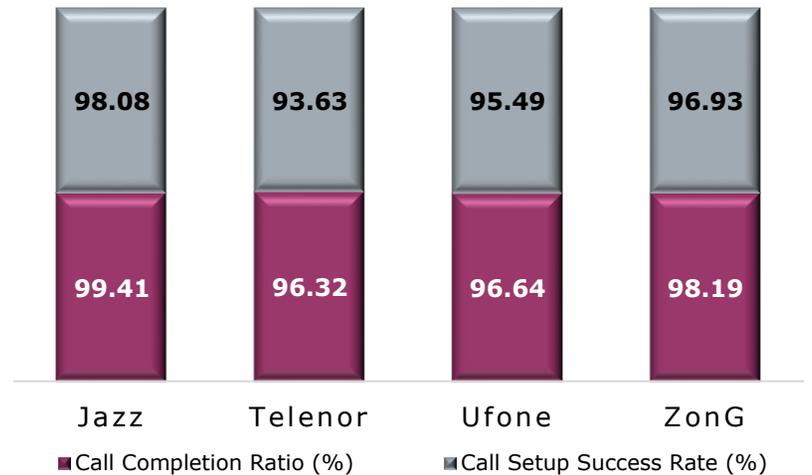
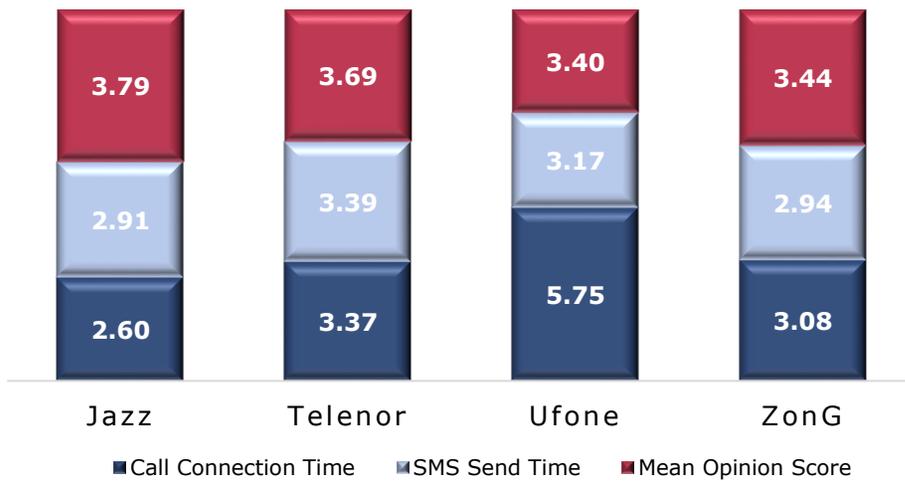
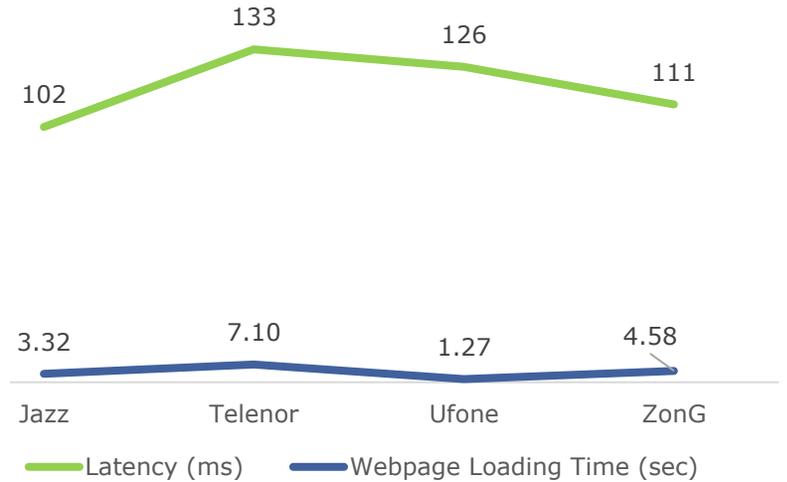
Voice compliance is the collective compliance of 4x KPIs i.e. Mean Opinion Score, Call Completion Ratio, Call Setup Success Rate and Call Connection Time. Data compliance is the collective compliance of 4x KPIs i.e. Automode Download, Upload, Latency and Webpage Loading Time.

Average Status – Overall Survey

Throughput (Mbps)



Webpage Loading Time and Latency



2. RANKING

Based upon the compliance level of each KPI on surveyed roads against threshold defined in QoS Regulations, CMOs have been ranked between 1st to 4th position in Mobile Network Coverage, Mobile Broadband, Voice and SMS Services as shown below:

Cellular Mobile Operator	Coverage	Mobile Broadband						Voice	SMS	
		Throughput				Latency		Browsing		
		Auto Mode		3 rd Party App		Auto Mode	3 rd Party App	Auto Mode		
										
	1 st	1 st	1 st	1 st	2 nd	1 st	1 st	1 st	2 nd	
	2 nd	2 nd	3 rd	2 nd	1 st	2 nd	2 nd	2 nd	1 st	
	3 rd	3 rd	2 nd	3 rd	3 rd	1 st	1 st	1 st	1 st	
	4 th	3 rd	1 st	3 rd	3 rd					

Quality of Service Survey

1. KEY PERFORMANCE INDICATORS (KPIs)

All CMOs are required to meet or exceed the benchmark of QoS KPIs as provided as per Cellular Mobile Network Quality of Service (QoS) Regulations 2021. To ensure accurate benchmarking, PTA is collecting and analyzing a statistically significant sample of minimum 200 calls and data sessions, enabling the evaluation of critical performance parameters.

2. SURVEY Motorways & Highways

Quality of Service Survey was conducted in 8x Motorways & Highways of Khyber Pakhtunkhwa, Punjab, Balochistan and Sindh during January to March 2025. The names of surveyed Motorways & Highways are mentioned in Table 1.1: QoS Survey Motorways & Highways:

S. #.	Motorways & Highways	Province
1.	Abbottabad to Haripur (N-35)	Khyber Pakhtunkhwa
2.	Nowshera to Batkhela (N-45)	
3.	Rawalpindi to Jhelum (N-5)	Punjab
4.	Faisalabad to Jhang (M-4)	
5.	Lahore to Abdul Hakeem (M-3)	
6.	Quetta to Pishin (N-25)	Balochistan
7.	Hyderabad to Karachi (M-9)	Sindh
8.	Sukkur to Kamo Shaheed (N-5)	

Table 1.1: QoS Survey Motorways & Highways

3. TEST STATISTICS

During the survey, Quality of Services tests were conducted in the areas of Voice, Mobile Broadband (Throughput, Latency and Web Browsing) and Short Messaging Service (SMS). Service-wise tests conducted for each CMO are shown in Table 2.1: Test Statistics.

Service	Jazz	Telenor	Ufone	Zong
3 rd Party App (Throughput + Latency)	4035	3624	3699	4020
Automode (Throughput + Latency)	3956	3186	3612	3796
Webpage Loading	1683	1330	1552	1607
Voice Calls	669	652	681	669
SMS	664	645	667	665

Table 2.1: Test Statistics

4. NETWORK COVERAGE – 4G

During the survey, while conducting data test in technology auto detect mode, 4G/LTE signal strength samples were recorded on survey routes. City wise compliance of 90% Confidence Level of signal strength is shown in Table 4.1: 4G Signal Confidence Level- Technology Auto Detect Mode.

4G Signal Confidence Level- Technology Auto Detect Mode								
City	Confidence Level (%)				Compliant (Yes/No)			
	Jazz	Telenor	Ufone	ZonG	Jazz	Telenor	Ufone	ZonG
N-5 (RWP)	83.99	88.60	92.58	93.96	No	No	Yes	Yes
N-5 (SKR)	97.14	70.17	67.68	92.15	Yes	No	No	Yes
N-45	87.47	93.46	95.55	94.12	No	Yes	Yes	Yes
M-9	94.97	82.02	86.11	92.02	Yes	No	No	Yes
N-35	91.85	90.75	97.84	92.26	Yes	Yes	Yes	Yes
M-4	97.06	88.67	85.44	95.92	Yes	No	No	Yes
M-3	98.59	92.33	87.46	94.21	Yes	Yes	No	Yes
N-25	95.64	82.45	97.23	85.32	Yes	No	Yes	No

Table 4.1: 4G Signal Confidence Level 90%- Technology Auto Detect Mode

5. NETWORK COVERAGE – 3G

During the survey, 3G signal strength samples were also recorded on survey routes, wherever network switched to 3G while keeping the mobile handset in technology auto detect mode. City wise compliance of 90% Confidence Level of signal strength is shown in Table 5.1: 3G Signal Confidence Level - Technology Auto Detect Mode.

3G Signal Confidence Level - Technology Auto Detect Mode								
City	Confidence Level (%)				Compliant (Yes/No)			
	Jazz	Telenor	Ufone	ZonG	Jazz	Telenor	Ufone	ZonG
N-5 (RWP)	N/A	41.6	91.9	73.8	N/A	No	Yes	No
N-5 (SKR)	N/A	100	90.7	100	N/A	Yes	Yes	Yes
N-45	N/A	94.4	97.6	87.6	N/A	Yes	Yes	No
M-9	N/A	65.4	97.1	74.5	N/A	No	Yes	No
N-35	N/A	100	100	N/A	N/A	Yes	Yes	N/A
M-4	N/A	100	100	100	N/A	Yes	Yes	Yes
M-3	N/A	100	100	100	N/A	Yes	Yes	Yes
N-25	N/A	N/A	98.4	95.4	N/A	N/A	Yes	Yes
<i>N/A indicates services did not fallback to 3G and remained connected to 4G services.</i>								

Table 5.1: 3G Signal Confidence Level - Technology Auto Detect Mode

6. MOBILE BROADBAND SERVICE – DATA SPEED

Automode Testing. In order to measure the performance of Mobile Broadband Services, Data Download and Upload tests were performed. During the test, a File of 10GB was downloaded and uploaded for 3 minutes duration. The Download and Upload Speed Results are shown in Table 6.1: Download Data Throughput and Table 6.2: Upload Data Throughput.

Download Data Throughput >4Mbps								
City	Download Data Throughput [Mbps]				Operator Position			
	Jazz	Telenor	Ufone	ZonG	Jazz	Telenor	Ufone	ZonG
N-5 (RWP)	20.73	6.80	5.09	14.73	First	Third	Fourth	Second
N-5 (SKR)	18.49	2.41	6.23	14.57	First	Fourth	Third	Second
N-45	22.90	4.11	4.43	14.31	First	Fourth	Third	Second
M-9	17.50	7.54	7.94	24.43	Second	Fourth	Third	First
N-35	28.34	6.53	5.27	13.85	First	Third	Fourth	Second
M-4	23.71	5.66	12.79	9.06	First	Fourth	Second	Third
M-3	22.38	3.33	9.49	9.90	First	Fourth	Third	Second
N-25	27.60	9.23	14.81	19.51	First	Fourth	Third	Second

Table 6.1: Download Data Throughput

3rd Party Application. Upload and Download Throughputs were tested using a 3rd Party Network Testing Application. The Download and Upload Speed Results are shown in Table 6.3: Download Data Throughput and Table 6.4: Upload Data Throughput respectively.

Upload Data Throughput ≥ 1Mbps								
City	Upload Data Throughput [Mbps]				Operator Position			
	Jazz	Telenor	Ufone	ZonG	Jazz	Telenor	Ufone	ZonG
N-5 (RWP)	15.11	5.25	9.81	13.54	First	Fourth	Third	Second
N-5 (SKR)	16.99	1.90	6.79	12.13	First	Fourth	Third	Second
N-45	16.05	4.18	10.72	14.34	First	Fourth	Third	Second
M-9	19.89	5.54	12.25	13.38	First	Fourth	Third	Second
N-35	17.25	4.90	10.82	12.93	First	Fourth	Third	Second
M-4	16.26	2.88	16.45	12.18	Second	Fourth	First	Third
M-3	18.72	4.90	15.57	17.07	First	Fourth	Third	Second
N-25	20.82	6.09	12.78	14.58	First	Fourth	Third	Second

Table 6.2: Upload Data Throughput

3 rd Party App Download Data Throughput >4Mbps								
City	Download Data Throughput [Mbps]				Operator Position			
	Jazz	Telenor	Ufone	ZonG	Jazz	Telenor	Ufone	ZonG
N-5 (RWP)	26.91	5.60	11.52	30.69	Second	Fourth	Third	First
N-5 (SKR)	25.00	3.47	8.14	26.67	Second	Fourth	Third	First
N-45	25.69	4.46	7.89	22.63	First	Fourth	Third	Second
M-9	31.85	9.27	10.56	38.21	Second	Fourth	Third	First
N-35	39.98	7.79	7.08	24.71	First	Third	Fourth	Second
M-4	34.80	6.49	20.54	27.37	First	Fourth	Third	Second
M-3	26.66	3.52	11.36	19.32	First	Fourth	Third	Second
N-25	59.46	15.28	15.44	27.45	First	Fourth	Third	Second

Table 6.3: 3rd Party App Download Data Throughput

3 rd Party App Upload Data Throughput ≥ 1Mbps								
City	Upload Data Throughput [Mbps]				Operator Position			
	Jazz	Telenor	Ufone	ZonG	Jazz	Telenor	Ufone	ZonG
N-5 (RWP)	17.33	5.17	11.92	21.93	Second	Fourth	Third	First
N-5 (SKR)	12.92	2.23	10.90	19.67	Second	Fourth	Third	First
N-45	18.90	3.88	10.19	18.06	First	Fourth	Third	Second
M-9	11.09	5.61	17.14	20.86	Third	Fourth	Second	First
N-35	20.18	5.38	8.90	17.89	First	Fourth	Third	Second
M-4	22.09	3.81	18.74	24.76	Second	Fourth	Third	First
M-3	20.96	4.74	17.07	23.30	Second	Fourth	Third	First
N-25	19.24	7.17	8.9	16.59	First	Fourth	Third	Second

Table 6.4: 3rd Party App Upload Data Throughput

7. MOBILE BROADBAND SERVICE – LATENCY

Latency, while not a traditional KPI (non-service KPI), is a vital metric for Mobile Broadband Performance, as it directly affects user experience. During the survey, Network Latency was measured by calculating the ping between different websites and 3rd Party Test servers. Results are shown in Table 7.1: Automode Latency and Table 7.2: 3rd Party App Latency.

Latency In Automode Testing								
City	Latency [milliseconds]				Compliant (Yes/No)			
	Jazz	Telenor	Ufone	ZonG	Jazz	Telenor	Ufone	ZonG
N-5 (RWP)	128	80	87	102	No	No	No	No
N-5 (SKR)	142.44	159.39	153.44	95.57	No	No	No	No
N-45	98.62	110.54	112.37	100.63	No	No	No	No
M-9	98.52	114.19	108.15	100.02	No	No	No	No
N-35	67.23	90.07	208.99	92.76	Yes	No	No	No
M-4	81.73	250.56	71.78	98.08	No	No	Yes	No
M-3	102.41	161.29	96.44	113.13	No	No	No	No
N-25	99.71	94.46	172.36	188.48	No	No	No	No

Table 7.1: Automode Latency

Latency in 3 rd Party App Testing								
City	Latency [milliseconds]				Compliant (Yes/No)			
	Jazz	Telenor	Ufone	ZonG	Jazz	Telenor	Ufone	ZonG
N-5 (RWP)	29.79	30.13	25.52	21.50	Yes	Yes	Yes	Yes
N-5 (SKR)	31.16	52.75	37.54	28.48	Yes	Yes	Yes	Yes
N-45	31.48	56.34	38.45	23.61	Yes	Yes	Yes	Yes
M-9	31.42	36.94	26.84	28.74	Yes	Yes	Yes	Yes
N-35	22.25	26.63	29.02	20.84	Yes	Yes	Yes	Yes
M-4	25.09	53.04	41.34	22.94	Yes	Yes	Yes	Yes
M-3	29.89	34.16	46.62	20.80	Yes	Yes	Yes	Yes
N-25	38.44	48.75	56.79	137.58	Yes	Yes	Yes	No

Table 7.2: 3rd Party App Latency

8. MOBILE BROADBAND SERVICE – WEB PAGE LOADING

Web Page Loading Time is an important Quality of Experience (QoE) metric, which, although not a traditional service KPI (non-service), provides

valuable insights into the performance of CMOs in delivering seamless web browsing experiences. Results of testing are shown in Table 8.1: Web Page Loading Time.

Webpage Loading Time in Technology Auto Detect Mode								
City	Webpage Loading Time [seconds]				Compliant (Yes/No)			
	Jazz	Telenor	Ufone	ZonG	Jazz	Telenor	Ufone	ZonG
N-5 (RWP)	2.87	5.58	1.47	4.09	Yes	No	Yes	Yes
N-5 (SKR)	3.33	7.35	1.50	4.78	Yes	No	Yes	Yes
N-45	3.43	6.67	1.58	5.26	Yes	No	Yes	No
M-9	4.82	6.26	1.34	5.05	Yes	No	Yes	No
N-35	2.45	10.66	1.28	5.18	Yes	No	Yes	No
M-4	2.95	6.50	0.81	4.23	Yes	No	Yes	Yes
M-3	3.42	7.07	1.27	3.98	Yes	No	Yes	Yes
N-25	3.302	6.71	0.899	4.096	Yes	No	Yes	Yes

Table 8.1: Web Page Loading Time

9. VOICE SERVICE

5 x QoS KPIs (i.e. Network Accessibility, Call Setup Success Rate, Call Setup Time, Call Completion Rate and Mean Opinion Score) have been measured while testing voice services in the surveyed cities. Compliance in each surveyed city is shown in Table 9.1: Voice QoS KPIs Compliance Level, Table 9.2: Voice QoS KPIs Compliance Level.

CMO	KPI	N-5 (RWP)	N-5 (SKR)	N-45	M-9
Jazz	NA	100	99.71	99.98	99.99
	CSSR	100	92.00	100.00	98.98
	CCT	3.03	2.73	2.25	2.55
	CCR	98.73	100	96.55	100
	MOS	3.6	4.02	3.92	3.64
Telenor	NA	99.87	99.96	99.92	100
	CSSR	96.34	79.73	91.95	95.74
	CCT	3.22	3.15	3.52	3.72
	CCR	96.20	96.61	97.50	93.33
	MOS	3.97	3.41	3.57	3.58
Ufone	NA	100	99.90	99.91	99.99
	CSSR	97.59	93.24	94.51	95.96
	CCT	5.60	6.96	5.41	5.02
	CCR	93.83	98.55	83.72	100
	MOS	3.68	3.30	3.48	3.39
ZonG	NA	99.94	100	99.97	99.92
	CSSR	96.34	97.33	97.78	93.75
	CCT	4.26	4.11	2.59	2.63
	CCR	98.73	98.63	96.59	96.67
	MOS	3.44	3.00	3.57	3.48

Table 9.1: Voice QoS KPIs Compliance Level

CMO	KPI	N-35	M-4	M-3	N-25
Jazz	NA	100	100	100	100.00
	CSSR	97.22	98.33	100	98.08
	CCT	2.21	2.69	2.49	2.85
	CCR	100	100	100	100
	MOS	3.90	3.65	3.68	3.87
Telenor	NA	100	99.98	99.97	99.98
	CSSR	100	93.10	93.10	99.05
	CCT	3.31	3.80	3.10	3.11
	CCR	100	94.44	95.37	97.12
	MOS	3.92	3.71	3.56	3.81
Ufone	NA	100	100	99.99	100
	CSSR	91.67	98.36	95.45	97.12
	CCT	4.70	5.77	7.34	5.22
	CCR	100	100	100	97.03
	MOS	3.59	3.32	2.96	3.48
ZonG	NA	100	99.97	100	100
	CSSR	100	98.21	96.12	95.88
	CCT	1.94	3.98	2.94	2.22
	CCR	100	100	95.97	98.92
	MOS	3.58	3.65	3.43	3.34

* Note Voice QoS KPIs: Network Accessibility (NA >99%), Call Setup Success Rate (CSSR >=98%), Call Connection Time (CCT <=7.5), Call Completion Ratio (CCR > 98), Mean Opinion Score (MOS >=3)
 *Non-Compliant KPI's are highlighted"

Table 9.2: Voice QoS KPIs Compliance Level

10. SMS SERVICE

2 x SMS QoS KPIs (i.e. Success Rate and Delivery Time) have been measured while testing SMS services in the surveyed cities. The compliance in each surveyed city is shown in Table 10.1: SMS QoS KPIs Compliance Level.

Operator	Jazz		Telenor		Ufone		ZonG	
SMS KPI	SR	DT	SR	DT	SR	DT	SR	DT
N-5 (RWP)	89.61	2.88	98.70	3.30	100	3.52	97.44	3.42
N-5 (SKR)	100	3.13	96.00	4.12	98.67	4.97	100	3.37
N-45	95.35	2.39	86.90	2.79	97.70	2.84	98.86	2.52
M-9	96.88	3.46	92.55	3.89	97.89	3.57	98.95	2.61
N-35	100	2.41	97.14	2.42	100	2.39	100	1.70
M-4	98.33	3.41	91.23	3.53	100	2.79	96.43	3.52
M-3	94.57	2.49	95.76	3.33	97.67	2.72	100	3.08
N-25	99.05	3.13	100	3.77	100	2.57	99.04	3.27

*SMS QoS KPIs: Success Rate (SR >=99%), Delivery Time (DT <=12)

Table 10.1: SMS QoS KPIs Compliance Level

11. SURVEY STANDING - MOBILE NETWORK COVERAGE

The categorization of CMOs in Mobile Network Coverage i.e. Signal Strength of 4G/LTE and 3G Networks (in case of fallback) measured in

Technology Auto Detect Mode is shown in Table 11.1: CMOs Standing in Mobile Network Coverage – Technology Auto Detect.

	Operator	Compliance Level – Number of Cities Technology Auto Detect Mode						Standing
		Compliant			Non-Compliant			
		4G	3G	Total	4G	3G	Total	
1.	Jazz	6	-	6	2	-	2	1 st
2.	Zong	7	4	11	1	3	4	2 nd
3.	Ufone	4	8	12	4	-	4	3 rd
4.	Telenor	3	5	8	5	2	7	4 th

Table 11.1: CMOs Standing in Mobile Network Coverage – Technology Auto Detect Mode

12. SURVEY STANDING - MOBILE BROADBAND SERVICE

The categorization of each CMOs in Mobile Broadband Service is as under:

- i. Download Data Throughput (Auto Mode). The Download Data Throughput, as per the highest to lowest obtained results, is shown in Table 12.1: CMOs Standing in Download Data Throughput – Auto Mode Testing.

S. #	Operator	Highest Download Throughput – Number of Cities (Automode)				Standing
		1 st	2 nd	3 rd	4 th	
1.	Jazz	7	1	-	-	1 st
2.	Zong	1	6	1	-	2 nd
3.	Ufone	-	1	5	2	3 rd
4.	Telenor	-	-	2	6	4 th

Table 12.1: CMOs Standing in Download Data Throughput- Auto Mode Testing

- ii. Upload Data Throughput (Auto Mode). The Upload Data Throughput, as per the highest to lowest obtained results, is shown in Table 12.2: CMOs Standing in Upload Data Throughput – Auto Mode Testing.

S. #	Operator	Highest Upload Throughput – Number of Cities (Automode)				Standing
		1 st	2 nd	3 rd	4 th	
1.	Jazz	7	1	-	-	1 st
2.	Ufone	1	-	7	-	2 nd
3.	Zong	-	7	1	-	3 rd
4.	Telenor	-	-	-	8	4 th

Table 12.2: CMOs Standing in Download Data Throughput- Auto Mode Testing

- iii. Webpage Loading Time. The categorization of each CMOs, as per the maximum compliant of Webpage Loading Time, is shown in Table 12.3: CMOs Standing in Webpage Loading Time.

S. #	Operator	Webpage Loading Time - Number of Cities		Standing
		Compliant	Non-Compliant	
1.	Jazz	8	-	1 st
2.	Ufone	8	-	1 st
3.	Zong	5	3	2 nd
4.	Telenor	0	8	3 rd

Table 12.3: CMOs Standing in Webpage Loading Time

- iv. Latency (3rd Party App). The categorization of each CMOs, as per the maximum compliant of cities in terms of Latency, is shown in Table 12.4: CMOs Standing in Latency (3rd Party App).

S. #	Operator	Latency - Number of Cities		Standing
		Compliant	Non-Compliant	
1.	Jazz	8	-	1 st
2.	Ufone	8	-	1 st
3.	Telenor	8	-	1 st
4.	Zong	7	1	2 nd

Table 12.4: CMOs Standing in Latency (3rd Party App)

- v. Latency (Automode). The categorization of each CMOs, as per the maximum compliant of cities in terms of Latency, is shown in Table 12.5: CMOs Standing in Latency (Automode).

S. #	Operator	Latency - Number of Cities		Standing
		Compliant	Non-Compliant	
1.	Jazz	1	7	1 st
2.	Ufone	1	7	1 st
3.	Zong	0	8	2 nd
4.	Telenor	0	8	2 nd

Table 12.5: CMOs Standing in Latency (Automode)

- vi. Download Data Throughput (3rd Party App). 3rd Party App Download Throughput, as per the highest to lowest obtained results, is shown in Table 12.6: CMOs Standing in Download Throughput – 3rd Party App.

S. #	Operator	Highest Download Throughput – Number of Cities				Standing
		1 st	2 nd	3 rd	4 th	
1.	Jazz	5	3	-	-	1 st
2.	Zong	3	5	-	-	2 nd
3.	Ufone	-	-	7	1	3 rd
4.	Telenor	-	-	1	7	4 th

Table 12.6: CMOs Standing in Download Throughput – 3rd Party App

- vii. Upload Data Throughput (3rd Party App). 3rd Party App Upload Throughput, as per the highest to lowest obtained results, is shown in Table 12.7: CMOs Standing in Upload Throughput – 3rd Party App.

S. #	Operator	Highest Upload Throughput – Number of Cities				Standing
		1 st	2 nd	3 rd	4 th	
1.	Zong	5	3	-	-	1 st
2.	Jazz	3	4	1	-	2 nd
3.	Ufone	-	1	7	-	3 rd
4.	Telenor	-	-	-	8	4 th

Table 12.7: CMOs Standing in Upload Throughput – 3rd Party App

13. SURVEY STANDING – VOICE & SMS SERVICE

The categorization of each CMOs, as per the maximum compliant of Voice and SMS QoS KPIs are shown in (i) Table 13.1: CMOs Standing in Voice Service & (ii) Table 13.2: CMOs Standing in SMS Service

S.#	Operator	Voice QoS KPIs		Standing
		Compliant	Non-Compliant	
1.	Jazz	37	3	1 st
2.	Zong	31	9	2 nd
3.	Ufone	29	11	3 rd
4.	Telenor	27	13	4 th

Table 13.1: CMOs Standing in Voice Service

S. #	Operator	SMS QoS KPIs		Standing
		Compliant	Non-Compliant	
1.	Zong	12	4	1 st
2.	Ufone	12	4	1 st
3.	Jazz	11	5	2 nd
4.	Telenor	9	7	3 rd

Table 13.2: CMOs Standing in SMS Service