QUETTA	30.12	46.1	47.17	27.12	Yes	Yes	Yes	Yes
RAWALPINDI	21	42.5	23.7	16.5	Yes	Yes	Yes	Yes
CHUNIAN	38.56	46.26	36.96	16.78	Yes	Yes	Yes	Yes
SHARAQPUR	29.19	22.51	35.58	15.68	Yes	Yes	Yes	Yes
KOTRI	24.99	26.83	38.25	23.3	Yes	Yes	Yes	Yes

Table 7.3: Ookla Latency

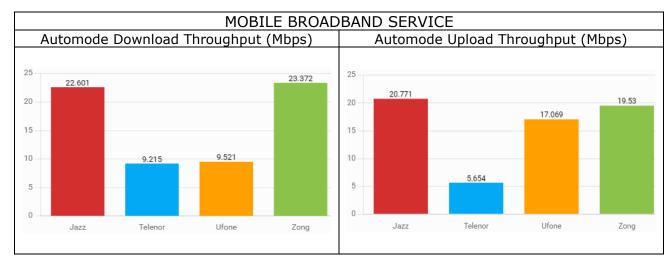
## 8. <u>MOBILE BROADBAND SERVICE - WEB PAGE LOADING</u>

Web Page Loading Time of different national and international websites were tested. Results of testing are shown in  $\underline{\text{Table 8.1: Web Page}}$   $\underline{\text{Loading Time}}$ .

WEBPAGE LOADING TIME IN IN TECHNOLOGY AUTO DETECT MODE								
City	Webpage Loading Time [seconds]			Compliant (Yes/No)				
City	Jazz	Telenor	Ufone	ZonG	Jazz	Telenor	Ufone	ZonG
BAHWALNAGAR	0.12	0.88	0.89	0.14	Yes	Yes	Yes	Yes
D.I KHAN	2.20	6.60	2.80	1.9	Yes	No	Yes	Yes
LAHORE	3.26	1.68	1.62	1.24	Yes	Yes	Yes	Yes
MARDAN	2.9	5.2	2.6	1.9	Yes	No	Yes	Yes
SAMUNDARI	0.68	0.31	0.34	0.14	Yes	Yes	Yes	Yes
SHIKARPUR	3.9	2.70	2.90	1.9	Yes	Yes	Yes	Yes
HYDERABAD	4.9	6.7	6.5	4.9	Yes	No	No	Yes
JHELUM	1.9	2.5	2.3	2.1	Yes	Yes	Yes	Yes
KARACHI MALIR	4.4	7.2	6.2	4.7	Yes	No	No	Yes
NAWABSHAH	4.6	2.5	3.1	1.7	Yes	Yes	Yes	Yes
NUSHKI	N/A	6.6	7.6	5.3	N/A	No	No	No
QUETTA	5	7.5	6.5	5.4	No	No	No	No
RAWALPINDI	2.3	2.7	2.3	2.1	Yes	Yes	Yes	Yes
CHUNIAN	6.6	7.1	7.1	6.5	No	No	No	No
SHARAQPUR	5.3	6.4	6.9	5.9	No	No	No	No
KOTRI	4.5	6.9	6.6	5.1	Yes	No	No	No

Table 8.1: Web Page Loading Time

Overall survey results of Mobile Broadband Services for each Mobile Operator are shown in the below graphs.



CMO	KPIS	HYDERABAD	JHELUM	MALIR	NAWABSHAH	NUSHKI	QUETTA
	CCR	Yes	Yes	Yes	Yes	Yes	Yes
	MOS	Yes	Yes	Yes	Yes	Yes	Yes
	NA	Yes	Yes	Yes	Yes	Yes	Yes
	CSSR	Yes	Yes	Yes	Yes	No	No
ZonG	CCT	Yes	Yes	Yes	Yes	Yes	Yes
	CCR	Yes	Yes	Yes	Yes	Yes	Yes
	MOS	Yes	Yes	Yes	Yes	Yes	Yes

<sup>\*</sup> Note Voice QoS KPIs: Network Accessibility (NA), Call Setup Success Rate (CSSR), Call Connection Time (CCT), Call Completion Ratio (CCR), Mean Opinion Score (MOS)

Table 9.3: Voice QoS KPIs Compliance Level

CMO	KPIS	CHUNIAN	SHARAQPUR	KOTRI	RAWALPINDI
Jazz	NA	Yes	Yes	Yes	Yes
	CSSR	Yes	Yes	Yes	Yes
	CCT	Yes	Yes	Yes	Yes
	CCR	Yes	Yes	Yes	Yes
	MOS	Yes	Yes	Yes	Yes
	NA	Yes	Yes	Yes	Yes
	CSSR	No	Yes	Yes	Yes
Telenor	CCT	Yes	Yes	Yes	Yes
	CCR	No	Yes	Yes	Yes
	MOS	Yes	Yes	Yes	Yes
	NA	Yes	Yes	Yes	Yes
	CSSR	No	Yes	Yes	Yes
Ufone	CCT	Yes	Yes	Yes	Yes
	CCR	No	Yes	No	Yes
	MOS	Yes	Yes	Yes	Yes
	NA	Yes	Yes	Yes	Yes
ZonG	CSSR	Yes	Yes	Yes	Yes
	CCT	Yes	Yes	Yes	Yes
	CCR	Yes	Yes	Yes	Yes
	MOS	Yes	Yes	Yes	Yes

<sup>\*</sup> Note Voice QoS KPIs: Network Accessibility (NA), Call Setup Success Rate (CSSR) > 98%, Call Connection Time (CCT), Call Completion Ratio (CCR), Mean Opinion Score (MOS)

Table 9.4: Voice QoS KPIs Compliance Level

Overall survey results of Voice Services for each Mobile Operator are shown in the below graphs.

